Hitachi Air Conditioning

Engineered for tomorrow.

Utopia Split Systems
VRF Systems
Ventilation
Domestic Heating
Chiller
Control Systems

GENERAL CATALOGUE

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Why Hitachi?

With so much to choose from in the market, here are some key reasons to buy from Hitachi's extensive range of products:

Utopia Splits

Improved connectivity, zone-by-zone individual control, fully ErP compliant and excellent A++ seasonal efficiency. The new IVX range ticks all the right boxes.

Set Free VRF

Comfort protection function across the range – so you won't hear complaints about cold draughts!

Ventilation

Capacities of up to 2000m^3 per hour from a unit that's less than 650mm high (the lowest height on the market); a compact solution where installation space is limited.

System Free

Our System Free indoor units can mix and match with any outdoors from our Utopia splits or VRF ranges.

Domestic Heating

Market-leading COP combined with great energy savings (5kW output from 1kW input) – fantastic news for the domestic market when fuel costs are on the increase.

InstallerLive AWARDS 2011 winner

Heating Manufacturer of the Year

"The judges felt Hitachi provided an excellent submission, a great product and the way forward."

Hitachi's Yutaki-M Heat Pump

Control Systems and Accessories

H-LINK II across the entire Hitachi product range means you can use Hitachi system free controls for any mix of products.

Samurai Chiller

High efficiency Chiller with flexible modular design.

Flexibility built in

Hitachi's System Free indoor units can be combined with outdoor units from either our Utopia splits or Set Free VRF ranges for ultimate flexibility.

Energy saving technology

http://etl.decc.gov.uk/etl

Many Hitachi systems have an energy rating of A and are listed on the Energy Technology register: making them eligible for 100% first year enhanced capital allowances. (System cost and reasonable cost of installation).

World-renowned technology

Hitachi manufactured the first screw and scroll compressors in the world (230 patents on 6 components). The performance of Hitachi air conditioning products is greatly improved by the high efficiency high pressure scroll compressors. Hitachi pioneered 'DC' Inverter PAM driven Room Air Conditioners and uses this technology to drive its compressors and fans.

Nominal & UK Conditions

Nominal conditions cooling	
Indoor temperature	27ºC DB, 19ºC WB
Outdoor temperature	35ºC DB , 24ºC WB
Nominal conditions heating	
Indoor temperature	20ºC DB
Outdoor temperature	7ºC DB, 6ºC WB
Indoor temperature	23ºC DB, 16ºC WB
Outdoor temperature	30ºC DB

Quality control

Hitachi's Japanese factories and its overseas affiliates have acquired International Standard Quality Management System ISO9001 and ISO14001 authorisation. The factories perform thorough product quality control using various environmental tests. Hitachi Room Air Conditioning indoor and outdoor units are manufactured according to this ISO certification system.

Hitachi products all carry the necessary 'CE' declaration markings, and also feature in the extensive Eurovent Listing programme. Listing in the Eurovent directory helps ensure peace of mind for the installer and the end user, as it certifies the important operating parameters and performance of the units.

Ready for ErP?

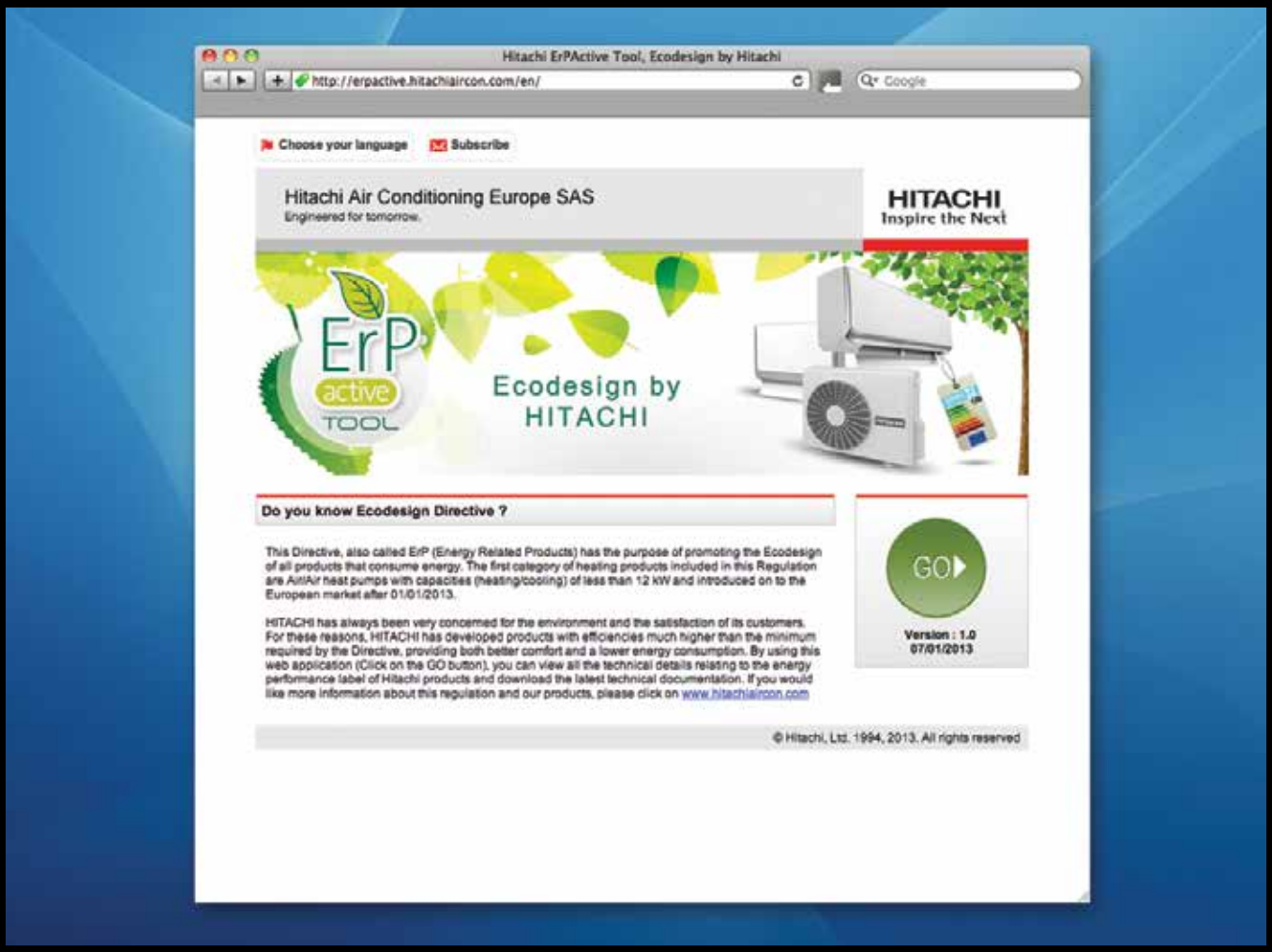
Helping you specify and install ErP-compliant products

The Eco-Design of Energy-related products (ErP) Directive provides consistent EU-wide rules for improving the environmental performance of energy-related products (ErP) – ensuring reduced energy consumption to benefit both businesses and consumers.

These regulations include air conditioning products - which are a major source of energy consumption in buildings - and require all manufacturers to calculate energy usage in a more realistic way, moving from nominal to seasonal calculations (SCOP and SEER).

Hitachi has always engineered the most environmentally-friendly heating and cooling products from its factories, and is delighted that its new product ranges already exceed the 2014 ErP Lot 10 standards.

Look for the ErP Active icon on all pages featuring ErP-compliant products.

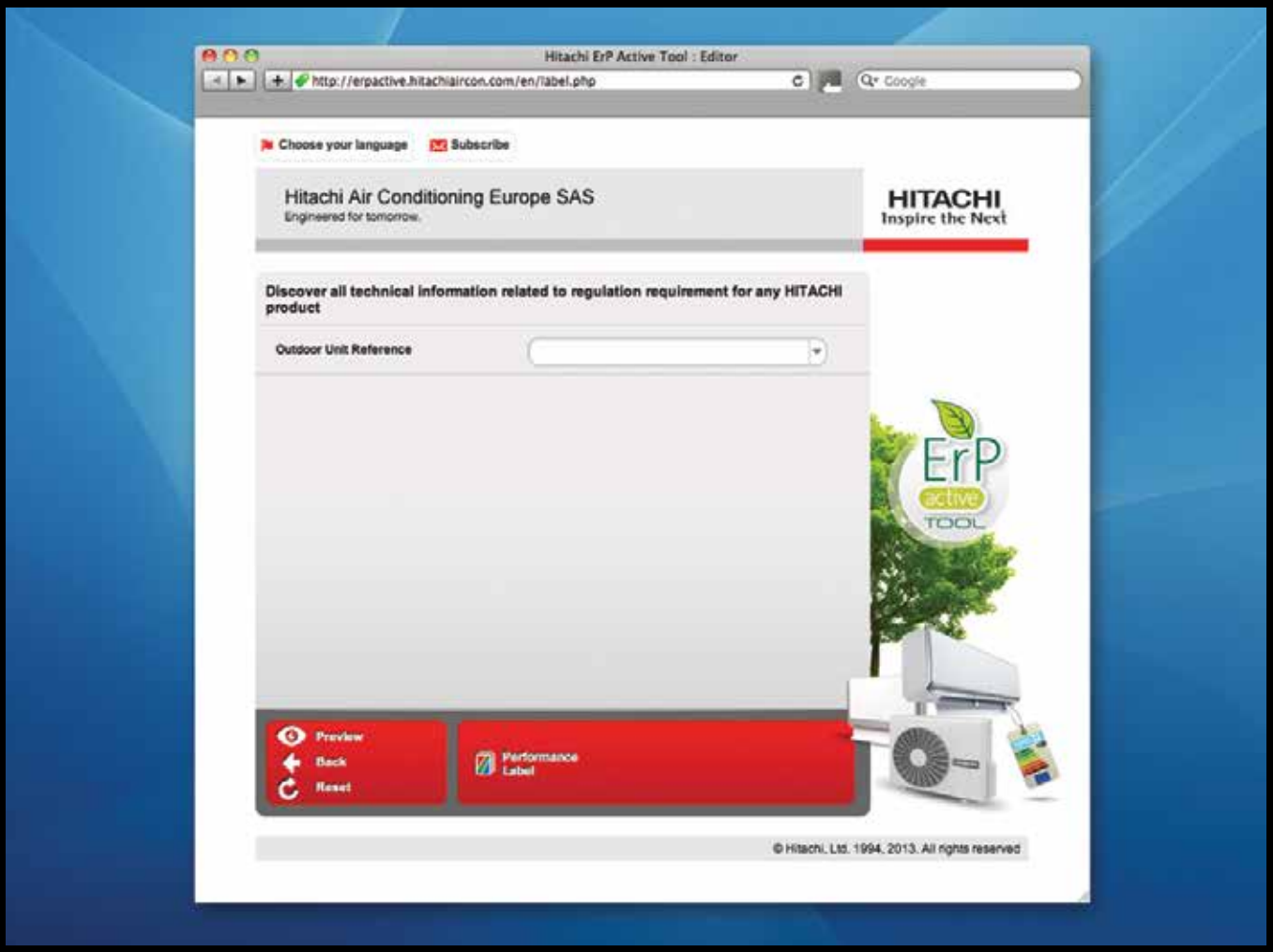


ErP active tool

Hitachi has also launched an online resource tool for engineers and contractors to create and download energy performance labels and technical data for Hitachi's ErP-compliant products.

Designed to be simple to use, each outdoor/indoor combination can be specified to create an energy performance label – assuming average European climate conditions - which can be previewed on screen, and product combinations adjusted before downloading and printing.

To find out more, visit hitachiaircon.com/erpactive



Product Range

System Free Indoor Units (kW)	(Set Free Connection)	2.2	2.8	4.0	5.6	7.1	8.0	11.2	14.0	16.0	22.4	28.0
	(Utopia Connection)	2.0	2.5	3.6	5.0	5.6	7.1	10.0	12.5	14.0	20.0	25.0
Wall Mounted		●	●	●	●	●	●	●				
Cassettes Mini 600x600		●	●	●	●							
Cassettes High efficiency 4-way		●	●	●	●	●	●	●	●	●		
Cassettes 4-way		●	●	●	●	●	●	●	●	●		
Cassettes 2-way		●	●	●	●	●	●	●	●			
Ceiling Suspended					●	●	●	●	●	●		
Ducted in the ceiling Slim Width		●	●	●								
Ducted in the ceiling Low Height		●	●	●								
Ducted in the ceiling Standard					●	●	●	●	●	●		
Ducted in the ceiling High Capacity											●	●
Floor Mounted (Cabinet & Concealed)		●	●	●	●	●						

Utopia Split Systems (kW)	5.0	5.6	7.1	10.0	12.5	14.0	20.0	25.0	30.0	
IVX Comfort	●	●	●	●	●	●	●	●	●	A++ SCOP 4.7
IVX Premium			●	●	●	●	●	●	●	A++ SCOP 4.7
ES			●	●	●	●	●	●		A SCOP 3.9
IVX Centrifugal					●			●		D COP 3.1 (Energy Label)

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Set Free VRF (kW)	11.0	14.0	16.0	22.0	28.0	33.5	100.0	150.0	
Mini 2 pipe	●	●	●						A COP 4.1
Side Flow heat pump (2-pipe)				●	●	●			A COP 4.2
Modular heat pump (2-pipe)				●	●	●	●	●	A COP 4.2
Modular heat recovery (3-pipe)				●	●	●	●	●	A COP 4.2
Modular High efficiency heat pump (2-pipe)		●	●	●	●	●	●		A COP 4.8
Modular High efficiency heat recovery (3-pipe)		●	●	●	●	●	●		A COP 4.8

Ventilation (m³/hr)*	250	500	800	1000	1500	2000
Total Energy Recovery	●	●	●	●	●	●
Heat Recovery		●	●	●	●	●
Active Total Energy Recovery		●	●	●		

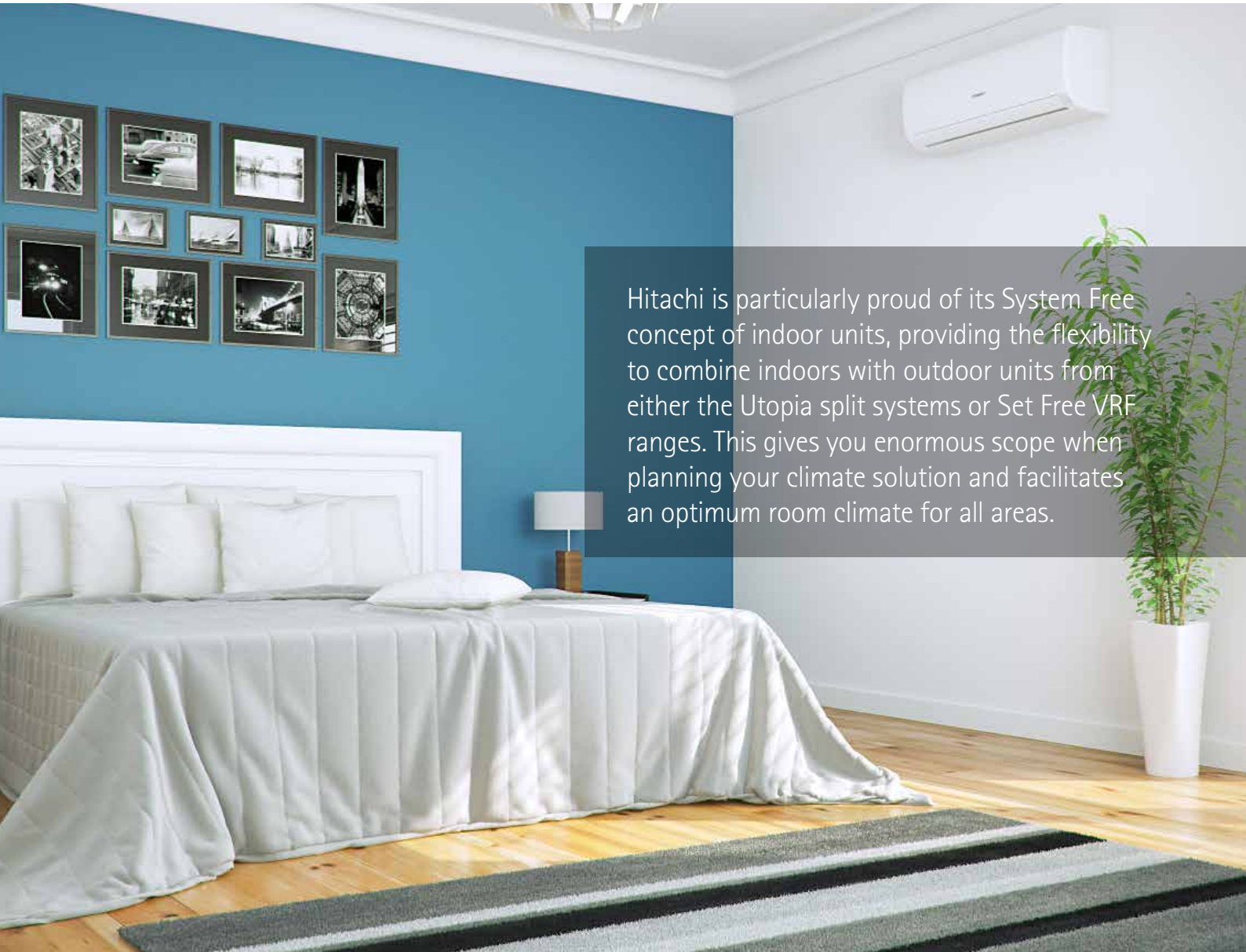
Domestic Heating (kW)	2.5	5.1	7.5	9.8	12.0	14.0	19.6	24.0	
Yutaki-M			●	●	●	●			A COP 4.4
Yutaki-S		●	●	●	●	●	●	●	A COP 5.0
Yutaki-S80				●	●	●			A COP 4.4
Yutampo	●								A COP 3.1

Samurai Chillers (kW)	106	112	120	134	360	585	696	1030	1280	
High efficiency, Air Cooled Cooling Only	●	●	●	●	●	●	●	●	●	ESEER 5.0
Air Cooled, Cooling Only		●	●	●	●	●	●	●		ESEER 3.5
Air Cooled, Heat Pump	●	●	●	●	●	●				ESEER 3.4
Water Cooled				●	●	●	●			ESEER 4.8
Condenserless, Air Cooled Cooling Only			●	●	●					ESEER 4.3

For full details, refer to Technical Manual

System Free – complete flexibility

	Wall Mounted		Cassette (600x600)	4-Way Cassette		2-Way Cassette
				Standard	Hi-Efficiency	
	RPK 0.6~4.0FSN3M	RPK 0.6~1.5FSNH3M	RCIM 0.6~2.0FSN2	RCI 0.8~6.0FSN3Ei	RCI 0.8~6.0FSN3	RCD 0.8~5.0FSN2
Nominal Cooling Capacity (Utopia System) (kW)	2.0 ~ 10.0	2.0 ~ 3.6	2.0 ~ 5.0	2.0 ~ 14.0	2.0 ~ 14.0	2.0 ~ 12.5
Nominal Heating Capacity (Utopia System) (kW)	2.2 ~ 11.2	2.2 ~ 4.0	2.2 ~ 5.6	2.2 ~ 16.0	2.2 ~ 16.0	2.2 ~ 14.0
Nominal Cooling Capacity (Set Free System) (kW)	1.7 ~ 11.2	1.7 ~ 4.0	1.7 ~ 5.6	1.7 ~ 16.0	1.7 ~ 16.0	1.7 ~ 14.0
Nominal Heating Capacity (Set Free System) (kW)	1.9 ~ 12.5	1.9 ~ 4.8	1.9 ~ 6.3	1.9 ~ 18.0	1.9 ~ 18.0	1.9 ~ 16.0
Remote Controller Type	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired



Hitachi is particularly proud of its System Free concept of indoor units, providing the flexibility to combine indoors with outdoor units from either the Utopia split systems or Set Free VRF ranges. This gives you enormous scope when planning your climate solution and facilitates an optimum room climate for all areas.

SYSTEM FREE

Ducted In the Ceiling			Ceiling Suspended	Floor Mounted	
Slim Width	Low Height	Standard		Concealed	Cabinet
RPIM 0.6~1.5FSN4E	RPI 0.6~1.5FSN4E	RPI 2.0~10.0FSN3/4E	RPC 2.0~6.0FSN2E	RPFI 0.8~2.5FSN2E	RPF 0.8~2.5FSN2E
2.0 ~ 3.6	2.0 ~ 3.6	5.0 ~25.0	5.0 ~14.0	2.0 ~ 6.3	2.0 ~ 6.3
2.2 ~ 4.0	2.2 ~ 4.0	5.6 ~ 28.0	5.6 ~ 16.0	2.2 ~ 7.0	2.2 ~ 7.0
1.7 ~ 4.0	1.7 ~ 4.0	5.6 ~ 28.0	5.6 ~ 16.0	1.7 ~ 7.1	1.7 ~ 7.1
1.9 ~ 4.8	1.9 ~ 4.8	6.3 ~ 31.0	6.3 ~ 18.0	1.9 ~ 8.5	1.9 ~ 8.5
Infra Red or Wired	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired

Utopia outdoor units

Hitachi's Utopia Split systems range is available in capacities from 5.0kW to 33kW. Models include Utopia ES and IVX, which have a common cabinet appearance allowing them to be installed together. The Utopia Centrifugal units are designed to be installed indoors with field supplied ductwork. System free indoor units and controls are compatible across the entire range.

Indoor units

- Wall-mounted
- Cassette
- Ceiling-suspended
- Ducted In the ceiling
- Floor-mounted
- Total heat exchanger

Set Free outdoor units

Hitachi's Set Free range of air conditioning systems with variable refrigerant flow (VRF) is available in capacities from 8kW to 165kW. Models include Mini 2-pipe, Side Flow 2-pipe and Modular 2 or 3-pipe system allowing heat pump or heat recovery options from one unit to suit customer requirements. System free indoor units and controls are compatible across the entire range.

System Free remote controls and accessories

PC-ARF

PC-ART

PC-ARH

PC-LH3A

System Free – complete flexibility

SYSTEM FREE

Features and Benefits

Did you know?

System Free indoor units can be combined with our Utopia Splits or Set Free VRF ranges for ultimate flexibility

Wall mounted
RPK-FSN3M

- New elegant design
- Compact and lightweight for easy installation
- Integrated infra red receiver for use with infra red remote controller, or optional hard wired remote control (PC-ARF, PC-ART or PC-ARH)
- RPK FSNH3M model also available with Remote expansion valve ensures very low noise – ideal for hotels.

4-way mini cassette
RCIM-FSN2

- Compact 600mm x 600mm design fits standard ceiling module
- Only 295mm high and weighing just 17kg - easy to install in restricted spaces
- Built-in condensate drain pump
- Improved efficiency and low noise levels.

2-way cassette
RCD-FSN2

- Extremely quiet thanks to innovative new front panel and small vertical profile
- Super High Stream turbo fan with 3D curved blades for 20% increased efficiency with noise levels as low as 30dB(A)
- Compact vertical profile for installation in restricted spaces
- Suitable for installation in areas with very high ceilings – ideal for retail and shopping centres.

4-way cassette
RCI-FSN3EI

- Standard 900mm x 900mm design
- Built-in condensate drain pump
- Super High Stream turbo fan with 3D curved blades for 20% increased efficiency with noise levels as low as 28dB(A)
- Compact and lightweight for easy installation
- Suitable for installation in areas with very high ceilings – ideal for retail and shopping centres.

High efficiency model (RCI FSN3) also available:

- New heat exchanger and turbo fan with 3D curved blades for increased efficiency
- Motion sensor reduces energy consumption and adjusts direction of airflow for high efficiency
- Built-in condensate drain pump with ionic silver antibacterial pads to prevent mould and bacteria.

Ceiling suspended
RPC-FSN2E

- Compact, modern design complements any interior
- Unit height only 150mm, particularly suitable for lowered ceilings
- Drain lines connectable in two alternate locations for easy installation
- Centrifugal multi-blade fan and outflow deflector with automatic movement creates a powerful and quiet, evenly distributed airflow.

Mini in the ceiling
RPIM-FSN4E

- DC Inverter fan motors deliver up to 70% reduction in energy consumption compared to previous model
- Very low noise
- Designed for small spaces with maintenance access through the underside of the unit
- Easy maintenance, very compact and low noise – ideal for hotels
- Available with (or without) built-in condensate pump.

Ducted In the ceiling (Slim-height)
RPI-FSN3/4E

- DC Inverter fan motors deliver up to 40% reduction in energy consumption compared to previous model
- Very low noise
- Unit height less than 200mm, particularly suitable for lowered ceilings
- Adjustable return air configuration
- Automatic drainage pump eliminates condensation build up
- 2HP-6HP.

Ducted In the ceiling
RPI-FSN3E

- Adjustable static pressure depending on installation requirements
- Built-in drain pump

Floor Mounted Cased
RPF-FSN2E

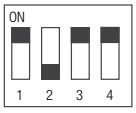
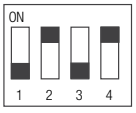
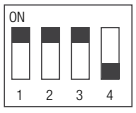
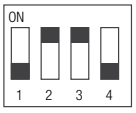
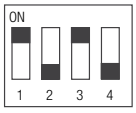
- Space saving design with a depth of 220mm and height of 630mm for easy installation – perfect for below window sills
- Storage slot for PC-ART remote controller
- Adjustable direction of airflow.

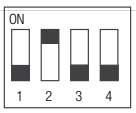
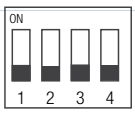
Floor Mounted Uncased model (RPFI) also available.

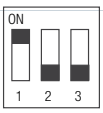
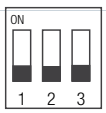
All Hitachi System Free indoor units are compatible with H-LINK II and CS Net Web and allow for optional integration with all leading BMS protocols.

Capacity adjustment of each unit using DIP switches

In certain situations, it is convenient to adjust the capacity of indoor units, adapting the power yield to the demands of the actual needs of the system. The power of each system free indoor unit in the range can be precisely adjusted with a DIP switch located on the internal electronic circuit. The DIP switch allows precise adjustments, even after installation, during start up or at any time, optimising overall system performance.

Power (HP)	0.8		1.3		1.8		2.3	
Power variation	0.8 ←	1.0	1.3 ←	1.5	1.8 ←	2.0	2.3 ←	2.5
Cooling Capacity (Kw)	2.2	2.8	3.8	4.0	5.2	5.6	6.7	7.1
Heating Power (Kw)	2.5	3.2	4.2	4.8	5.6	6.3	7.5	8.5
Change via Dip Switch (DSW3)	0.8HP	1.0HP	1.3HP	1.5HP	1.8HP	2.0HP	2.3HP	2.3HP
								
	Reduced set-up	Standard set-up	Reduced set-up	Standard set-up	Reduced set-up	Standard set-up	Reduced set-up	Reduced set-up

Power (HP)	0.6	
Power variation	0.6 ←	0.8
Cooling Capacity (Kw)	1.7	2.2
Heating Power (Kw)	1.9	2.8
RPK-FSN3M Change via Dip Switch (DSW2)	0.6HP	0.8HP
		
	Reduced set-up	Reduced set-up

Power (HP)	0.6	
Power variation	0.6 ←	0.8
Cooling Capacity (Kw)	1.7	2.2
Heating Power (Kw)	1.9	2.8
RCIM-FSN2 Change via Dip Switch (DSW8)	0.8HP	1.0HP
		
	Reduced set-up	Reduced set-up

Power (HP)	0.6	
Power variation	0.6 ←	0.8
Cooling Capacity (Kw)	1.7	2.2
Heating Power (Kw)	1.9	2.8
RPIM-FSN4E Change via Dip Switch (DSW9)	0.8HP	1.0HP
	Reduced set-up	Standard set-up

0.8HP > 0.6HP Dip Switching only applicable to RPK-FSN3M, RCIM-FSN2 and RPIM-FSN4E units, when connected to Series 2 Mini Set Free systems

SYSTEM FREE

Wall Mounted

RPK-FSN3M

Indoor Unit		RPK 0.8FSN3M	RPK 1.0FSN3M	RPK 1.5FSN3M	RPK 2.0FSN3M
Nominal Cooling Capacity (Utopia System)(1)	kW	2.0	2.5	3.6	5.0
Nominal Heating Capacity (Utopia System)(2)	kW	2.2	2.8	4.0	5.6
UK Cooling Capacity (sensible) (Utopia System)	kW	2.1 (1.9)	2.6 (2.0)	3.7 (3.0)	5.3 (3.8)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.2	2.8	4.0	5.6
Nominal Heating Capacity (Set Free System)(2)	kW	2.5	3.2	4.8	6.3
UK Cooling Capacity (sensible) (Set Free System)	kW	2.1 (1.9)	2.6 (2.0)	3.9 (3.2)	5.2 (3.7)
Noise Level (sound pressure) (L / M / H / H2)(3)	dB(A)	30/32/35/39	30/32/35/39	33/36/40/46	33/38/40/42
Noise level (sound power)	dB(A)	53	53	58	57
Air flow cooling mode (L / M / H / H2)(4)	m^3/h	390/420/480/600	390/420/480/600	450/540/660/840	600/780/840/900
Dimensions (H x W x D)	mm	300x790x230	300x790x230	300x790x230	333x1150x245
Weight	kg	10	10	11	17
Included Condensate Pump		no	no	no	no
Drain Diameter (ext)		φ16mm	φ16mm	φ16mm	φ16mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 1/2	1/4 / 5/8
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 12.70	6.35 / 15.88
Power Input	W	20	20	50	40
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5

Indoor Unit		RPK 2.5FSN3M	RPK 3.0FSN3M	RPK 4.0FSN3M
Nominal Cooling Capacity (Utopia System)(1)	kW	5.6	7.1	10.0
Nominal Heating Capacity (Utopia System)(2)	kW	6.3	8.0	11.2
UK Cooling Capacity (sensible) (Utopia System)	kW	5.9 (4.4)	7.7 (5.9)	10.6 (7.5)
Nominal Cooling Capacity (Set Free System)(1)	kW	7.1	8.0	11.2
Nominal Heating Capacity (Set Free System)(2)	kW	8.5	9.0	12.5
UK Cooling Capacity (sensible) (Set Free System)	kW	6.4 (4.7)	7.5 (5.7)	10.5 (7.5)
Noise Level (sound pressure) (L / M / H / H2)(3)	dB(A)	36/40/43/49	36/40/43/49	41/46/49/51
Noise level (sound power)	dB(A)	59	59	64
Air flow cooling mode (L / M / H / H2)(4)	m^3/h	720/840/1020/1140	720/840/1020/1140	900/1020/1140/1320
Dimensions (H x W x D)	mm	333x1150x245	333x1150x245	333x1150x245
Weight	kg	18	18	18
Included Condensate Pump		no	no	no
Drain Diameter (ext)		φ16mm	φ16mm	φ16mm
Piping Diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Power Input	W	70	70	80
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.

(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.

(3) Sound pressure level measured at 1.0 meter below the unit and 1.0 meter from the air inlet (measured in anechoic room)

(4) 4 step fan speed only available with PC-ARF remote controller

Unit Capacity Dipswitch available

SYSTEM FREE

System Free

RPK-FSNH3M

Wall Mounted (Remote Expansion Valve Kit)

Indoor Unit		RPK 0.8FSNH3M	RPK 1.0FSNH3M	RPK 1.5FSNH3M
Nominal Cooling Capacity (Utopia System)(1)	kW	2.0	2.5	3.6
Nominal Heating Capacity (Utopia System)(2)	kW	2.2	2.8	4.0
UK Cooling Capacity (sensible) (Utopia System)	kW	2.1 (1.9)	2.6 (2.0)	3.7 (3.0)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.2	2.8	4.0
Nominal Heating Capacity (Set Free System)(2)	kW	2.5	3.2	4.8
UK Cooling Capacity (sensible) (Set Free System)	kW	2.1 (1.9)	2.6 (2.0)	3.9 (3.2)
Noise Level (sound pressure) (L / M / H / H2)(3)	dB(A)	30/32/35/39	30/32/35/39	33/36/40/46
Noise level (sound power)	dB(A)	53	53	58
Air flow cooling mode (L / M / H / H2)(4)	m^3/h	390/420/480/600	390/420/480/600	450/540/660/840
Dimensions (H x W x D)	mm	300x790x230	300x790x230	300x790x230
Weight	kg	10	10	11
Included Condensate Pump		no	no	no
Drain Diameter (ext)		φ16mm	φ16mm	φ16mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 1/2
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 12.70
Power Input	W	20	20	50
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.

(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.

(3) Sound pressure level measured at 1.0 meter below the unit and 1.0 meter from the air inlet (measured in anechoic room)

(4) 4 step fan speed only available with PC-ARF remote controller

Unit Capacity Dipwitch available

Expansion Valve Kit		EV-1.5N1
Dimensions (H x W x D)	mm	164x360x109
Weight	kg	tbc
Piping Diameter (Liquid)(5) L < 15m / (15m < L < 30m)	Inch	1/4 / (3/8)
	mm	6.35 / (9.52)
Piping Length (Expansion Valve Kit to I/U)	m	3 ~ 5
Power supply		Fed from I/U

EV-1.5N

(5) Total piping length from Joint Kit to indoor unit < 30m
(restrictions apply see Technical Catalogue)

Did you know?

System Free indoor units can be combined with our Utopia Splits or Set Free VRF ranges for ultimate flexibility

SYSTEM FREE

RCIM-FSN2

Mini (600x600) Cassette

Indoor Unit		RCIM 0.8FSN2	RCIM 1.0FSN2	RCIM 1.5FSN2	RCIM 2.0FSN2
Nominal Cooling Capacity (Utopia System)(1)	kW	2.0	2.5	3.6	5.0
Nominal Heating Capacity (Utopia System)(2)	kW	2.2	2.8	4.0	5.6
UK Cooling Capacity (sensible) (Utopia System)	kW	2.1 (1.6)	2.6 (1.9)	3.7 (2.7)	5.3 (3.8)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.2	2.8	4.0	5.6
Nominal Heating Capacity (Set Free System)(2)	kW	2.5	3.2	4.8	6.3
UK Cooling Capacity (sensible) (Set Free System)	kW	2.1 (1.6)	2.6 (1.9)	3.9 (2.9)	5.2 (3.7)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	28/34/36	28/34/36	33/35/38	37/39/42
Noise level (sound power)	dB(A)	56	56	58	60
Air flow cooling mode (L / M / H)	m^3/h	600/720/780	600/720/780	720/810/900	720/840/960
Dimensions (H x W x D)	mm	295x570x570	295x570x570	295x570x570	295x570x570
Weight	kg	17	17	17	17
Included Condensate Pump		yes	yes	yes	yes
Condensate Pump Lift	mm	650 mm from the bottom edge of the unit			
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 1/2	1/4 / 5/8
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 12.70	6.35 / 15.88
Power Input	W	60	60	70	70
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5

Panel reference		P-N23WAM
Panel dimensions (H x W x D)	mm	35X700X700
Panel weight	kg	3.5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.

(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.

(3) Sound pressure level measured at 1.5 meters below the unit (measured in anechoic room)

Unit Capacity Dipwitch available

Did you know?

System Free indoor units can be combined with our Utopia Splits or Set Free VRF ranges for ultimate flexibility

SYSTEM FREE

System Free

RCI-FSN3Ei

4-way Cassette

Indoor Unit		RCI 1.0FSN3Ei	RCI 1.5FSN3Ei	RCI 2.0FSN3Ei	RCI 2.5FSN3Ei
Nominal Cooling Capacity (Utopia System)(1)	kW	2.5	3.6	5.0	5.6
Nominal Heating Capacity (Utopia System)(2)	kW	2.8	4.0	5.6	6.3
UK Cooling Capacity (sensible) (Utopia System)	kW	2.6 (2.1)	3.7 (2.8)	5.3 (4.1)	5.9 (4.3)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.8	4.0	5.6	7.1
Nominal Heating Capacity (Set Free System)(2)	kW	3.2	4.8	6.3	8.5
UK Cooling Capacity (sensible) (Set Free System)	kW	2.6 (2.1)	3.9 (3.0)	5.2 (4.1)	6.4 (4.7)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	28/30/32	28/30/32	28/30/32	28/30/32
Noise level (sound power)	dB(A)	54	54	54	54
Air flow cooling mode (L / M / H)	m^3/h	660/720/780	720/840/900	720/840/960	900/1020/1200
Dimensions (H x W x D)	mm	248x840x840	248x840x840	248x840x840	248x840x840
Weight	kg	23	23	24	24
Included Condensate Pump		yes	yes	yes	yes
Condensate Pump Lift	mm	850 mm from the bottom edge of the unit			
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 5/8	3/8 / 5/8
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 15.88	9.53 / 15.88
Power Input	W	40	50	50	60
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5

Indoor Unit		RCI 3.0FSN3Ei	RCI 4.0FSN3Ei	RCI 5.0FSN3Ei	RCI 6.0FSN3Ei
Nominal Cooling Capacity (Utopia System)(1)	kW	7.1	10.0	12.5	14.0
Nominal Heating Capacity (Utopia System)(2)	kW	8.0	11.2	14.0	16.0
UK Cooling Capacity (sensible) (Utopia System)	kW	7.7 (6.1)	10.6 (8.3)	13.2 (9.8)	15.7 (11.5)
Nominal Cooling Capacity (Set Free System)(1)	kW	8.0	11.2	14.0	16.0
Nominal Heating Capacity (Set Free System)(2)	kW	9.0	12.5	16.0	18.0
UK Cooling Capacity (sensible) (Set Free System)	kW	7.5 (5.9)	10.5 (8.2)	12.7 (9.4)	14.8 (10.8)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	30/32/34	33/35/38	35/37/39	36/40/42
Noise level (sound power)	dB(A)	56	60	61	64
Air flow cooling mode (L / M / H)	m^3/h	1200/1380/1560	1440/1680/1920	1500/1740/2040	1620/1920/2220
Dimensions (H x W x D)	mm	298x840x840	298x840x840	298x840x840	298x840x840
Weight	kg	26	29	29	29
Included Condensate Pump		yes	yes	yes	yes
Condensate Pump Lift	mm	850 mm from the bottom edge of the unit			
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Power Input	W	90	110	140	180
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5

Panel reference		P-N23NA
Panel dimensions (H x W x D)	mm	37x950x950
Panel weight	kg	6.0

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.
(3) Sound pressure level measured at 1.5 meters below the unit (measured in anechoic room)
Unit Capacity Dipswitch available

SYSTEM FREE

RCI-FSN3

High efficiency 4-way Cassette

Indoor Unit		RCI 1.0FSN3	RCI 1.5FSN3	RCI 2.0FSN3	RCI 2.5FSN3
Nominal Cooling Capacity (Utopia System)(1)	kW	2.5	3.6	5.0	5.6
Nominal Heating Capacity (Utopia System)(2)	kW	2.8	4.0	5.6	6.3
UK Cooling Capacity (sensible) (Utopia System)	kW	2.6 (2.2)	3.7 (3.3)	5.3 (4.7)	5.9 (5.1)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.8	4.0	5.6	7.1
Nominal Heating Capacity (Set Free System)(2)	kW	3.2	4.8	6.3	8.5
UK Cooling Capacity (sensible) (Set Free System)	kW	2.6 (2.2)	3.9 (3.5)	5.2 (4.6)	6.4 (5.6)
Noise Level (sound pressure) (L / M / H / H2)(3)	dB(A)	27/28/30/33	27/30/31/35	27/30/32/37	28/32/36/42
Noise level (sound power)	dB(A)	52	53	55	56
Air flow cooling mode (L / M / H / H2)(4)	m^3/h	540/660/780/900	660/840/1020/1260	660/840/1020/1320	840/1080/1380/1620
Dimensions (H x W x D)	mm	248x840x840	248x840x840	248x840x840	248x840x840
Weight	kg	20	21	21	22
Included Condensate Pump		yes	yes	yes	yes
Condensate Pump Lift	mm	850 mm from the bottom edge of the unit			
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 5/8	3/8 / 5/8
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 15.88	9.53 / 15.88
Power Input	W	40	60	80	150
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5

Indoor Unit		RCI 3.0FSN3	RCI 4.0FSN3	RCI 5.0FSN3	RCI 6.0FSN3
Nominal Cooling Capacity (Utopia System)(1)	kW	7.1	10.0	12.5	14.0
Nominal Heating Capacity (Utopia System)(2)	kW	8.0	11.2	14.0	16.0
UK Cooling Capacity (sensible) (Utopia System)	kW	7.7 (6.2)	10.6 (8.2)	13.2 (9.5)	15.7 (10.8)
Nominal Cooling Capacity (Set Free System)(1)	kW	8.0	11.2	14.0	16.0
Nominal Heating Capacity (Set Free System)(2)	kW	9.0	12.5	16.0	18.0
UK Cooling Capacity (sensible) (Set Free System)	kW	7.5 (6.1)	10.5 (8.1)	12.7 (9.1)	14.8 (10.2)
Noise Level (sound pressure) (L / M / H / H2)(3)	dB(A)	28/32/36/42	33/39/43/48	35/40/45/48	37/41/46/48
Noise level (sound power)	dB(A)	57	64	64	65
Air flow cooling mode (L / M / H / H2)(4)	m^3/h	840/1080/1380/1620	1200/1440/1860/2220	1260/1560/1980/2220	1320/1680/2100/2220
Dimensions (H x W x D)	mm	298x840x840	298x840x840	298x840x840	298x840x840
Weight	kg	26	26	26	26
Included Condensate Pump		yes	yes	yes	yes
Condensate Pump Lift	mm	850 mm from the bottom edge of the unit			
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Power Input	W	150	180	200	200
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5

Standard Panel Reference		P-AP160NA1
Panel dimensions (H x W x D)	mm	37x950x950
Panel weight	kg	6.5

Optional Panel Reference (with motion sensor)		P-AP160NAE
Panel dimensions (H x W x D)	mm	37x950x950
Panel weight	kg	6.5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.
(3) Sound pressure level measured at 1.5 meters below the unit (measured in anechoic room)
(4) 4 step fan speed and movement sensor are only available with PC-ARF remote controller
Unit Capacity Dipswitch available

SYSTEM FREE

System Free

RCD-FSN2

2-way Cassette

Indoor Unit		RCD 1.0FSN2	RCD 1.5FSN2	RCD 2.0FSN2
Nominal Cooling Capacity (Utopia System)(1)	kW	2.5	3.6	5.0
Nominal Heating Capacity (Utopia System)(2)	kW	2.8	4.0	5.6
UK Cooling Capacity (sensible) (Utopia System)	kW	2.6 (2.1)	3.7 (2.7)	5.3 (4.0)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.8	4.0	5.6
Nominal Heating Capacity (Set Free System)(2)	kW	3.2	4.8	6.3
UK Cooling Capacity (sensible) (Set Free System)	kW	2.6 (2.1)	3.9 (2.8)	5.2 (3.9)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	30/32/34	30/32/35	30/32/35
Noise level (sound power)	dB(A)	55	56	56
Air flow cooling mode (L / M / H)	m^3/h	480/540/600	540/660/780	660/780/900
Dimensions (H x W x D)	mm	298x860x620	298x860x620	298x860x620
Weight	kg	27	27	27
Included Condensate Pump		yes	yes	yes
Condensate Pump Lift	mm	600 mm from the bottom edge of the unit		
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 5/8
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 15.88
Power Input	W	50	70	70
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5

Indoor Unit		RCD 2.5FSN2	RCD 3.0FSN2	RCD 4.0FSN2	RCD 5.0FSN2
Nominal Cooling Capacity (Utopia System)(1)	kW	5.6	7.1	10.0	12.5
Nominal Heating Capacity (Utopia System)(2)	kW	6.3	8.0	11.2	14.0
UK Cooling Capacity (sensible) (Utopia System)	kW	5.9 (4.4)	7.7 (5.7)	10.6 (7.7)	13.2 (9.1)
Nominal Cooling Capacity (Set Free System)(1)	kW	7.1	8.0	11.2	14.0
Nominal Heating Capacity (Set Free System)(2)	kW	8.5	9.0	12.5	16.0
UK Cooling Capacity (sensible) (Set Free System)	kW	6.4 (4.7)	7.5 (5.6)	10.5 (7.7)	12.7 (8.8)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	31/34/38	31/34/38	33/36/40	36/40/43
Noise level (sound power)	dB(A)	59	59	60	62
Air flow cooling mode (L / M / H)	m^3/h	840/960/1140	840/960/1140	1260/1440/1740	1500/1740/2040
Dimensions (H x W x D)	mm	298x860x620	298x860x620	298x1420x620	298x1420x620
Weight	kg	30	30	48	48
Included Condensate Pump		yes	yes	yes	yes
Condensate Pump Lift	mm	600 mm from the bottom edge of the unit			
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Power Input	W	90	90	120	180
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5
Price (£) (exc. Remote Controller)		**£875**	**£977**	**£1,078**	**£1,219**

Standard Panel Reference		P-N23DNA (1.0 ~ 3.0)	P-N46DNA (4.0 ~ 5.0)
Panel dimensions (H x W x D)	mm	40x1100x710	40x1660x710
Panel weight	kg	6.0	8.0

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.
(3) Sound pressure level measured at 1.5 meters below the unit (measured in anechoic room)
Unit Capacity Dipswitch available

SYSTEM FREE

Ceiling Suspended

RPC-FSN2E

Indoor Unit		RPC 2.0FSN2E	RPC 2.5FSN2E	RPC 3.0FSN2E
Nominal Cooling Capacity (Utopia System)(1)	kW	5.0	5.6	7.1
Nominal Heating Capacity (Utopia System)(2)	kW	5.6	6.3	8.0
UK Cooling Capacity (sensible) (Utopia System)	kW	5.3 (3.8)	5.9 (4.2)	7.7 (5.5)
Nominal Cooling Capacity (Set Free System)(1)	kW	5.6	7.1	8.0
Nominal Heating Capacity (Set Free System)(2)	kW	6.3	8.5	9.0
UK Cooling Capacity (sensible) (Set Free System)	kW	5.2 (3.7)	6.4 (4.6)	7.5 (5.4)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	38/42/44	31/43/46	42/45/48
Noise level (sound power)	dB(A)	60	60	65
Air flow cooling mode (L / M / H)	m^3/h	600/780/900	720/960/1080	900/1020/1260
Dimensions (H x W x D)	mm	163x1094x625	163x1314x625	163x1314x625
Weight	kg	28	31	31
Included Condensate Pump		no	no	no
Drain Diameter (ext)		φ25mm	φ25mm	φ25mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	6.35 / 15.88	9.53 / 15.88	9.53 / 15.88
Power Input	W	130	130	170
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5

Indoor Unit		RPC 4.0FSN2E	RPC 5.0FSN2E	RPC 6.0FSN2E
Nominal Cooling Capacity (Utopia System)(1)	kW	10.0	12.5	14.0
Nominal Heating Capacity (Utopia System)(2)	kW	11.2	14.0	16.0
UK Cooling Capacity (sensible) (Utopia System)	kW	10.6 (7.6)	13.2 (9.5)	15.7 (11.2)
Nominal Cooling Capacity (Set Free System)(1)	kW	11.2	14.0	16.0
Nominal Heating Capacity (Set Free System)(2)	kW	12.5	16.0	18.0
UK Cooling Capacity (sensible) (Set Free System)	kW	10.5 (7.6)	12.7 (9.1)	14.8 (10.7)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	39/45/49	41/46/49	44/48/50
Noise level (sound power)	dB(A)	65	65	66
Air flow cooling mode (L / M / H)	m^3/h	1140/1440/1800	1260/1680/2100	1620/1920/2220
Dimensions (H x W x D)	mm	225x1314x625	225x1574x625	225x1574x625
Weight	kg	35	41	41
Included Condensate Pump		no	no	no
Drain Diameter (ext)		φ25mm	φ25mm	φ25mm
Piping Diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Power Input	W	180	230	230
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.
(3) Sound pressure level measured at 1.5 meters below the unit (measured in anechoic room)
Unit Capacity Dipwitch available

Did you know?

System Free indoor units can be combined with our Utopia Splits or Set Free VRF ranges for ultimate flexibility

SYSTEM FREE

System Free

RPIM-FSN4E

Ducted In the Ceiling (slim-width hotel style)

Indoor Unit		RPIM 0.8FSN4E-(DU)	RPIM 1.0FSN4E-(DU)	RPIM 1.5FSN4E-(DU)
Nominal Cooling Capacity (Utopia System)(1)	kW	2.0	2.5	3.6
Nominal Heating Capacity (Utopia System)(2)	kW	2.2	2.8	4.0
UK Cooling Capacity (sensible) (Utopia System)	kW	2.1 (1.7)	2.6 (2.1)	3.7 (2.6)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.2	2.8	4.0
Nominal Heating Capacity (Set Free System)(2)	kW	2.5	3.2	4.8
UK Cooling Capacity (sensible) (Set Free System)	kW	2.1 (1.7)	2.6 (2.1)	3.9 (2.8)
Noise Level (sound pressure) (L / M / H)(3) (SP-00)	dB(A)	27/29/31	27/29/31	28/30/33
Noise level (sound power) (SP-00)	dB(A)	59	59	61
Air flow cooling mode (L / M / H) (SP-00)	m³/h	360/480/480	360/480/480	480/600/600
Static Pressure Nom. (min ~ max)	Pa	32 (0 - 50)	32 (0 - 50)	27 (0 - 58)
Dimensions (H x W x D)	mm	275x702x600	275x702x600	275x702x600
Weight	kg	26	26	26
Included Condensate Pump (DU model only)		yes	yes	yes
Condensate Pump Lift	mm	850 mm from the bottom edge of the unit (DU model only)		
Drain Diameter (ext)		φ25mm	φ25mm	φ25mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 1/2
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 12.70
Power Input	W	20	20	30
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5

RPI-FSN4E

Ducted In the Ceiling (low-height hotel style)

Indoor Unit		RPI 0.8FSN4E	RPI 1.0FSN4E	RPI 1.5FSN4E
Nominal Cooling Capacity (Utopia System)(1)	kW	2.0	2.5	3.6
Nominal Heating Capacity (Utopia System)(2)	kW	2.2	2.8	4.0
UK Cooling Capacity (sensible) (Utopia System)	kW	2.1 (1.7)	2.6 (2.1)	3.7 (2.7)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.2	2.8	4.0
Nominal Heating Capacity (Set Free System)(2)	kW	2.5	3.2	4.8
UK Cooling Capacity (sensible) (Set Free System)	kW	2.1 (1.7)	2.6 (2.1)	3.9 (2.8)
Noise Level (sound pressure) (L / M / H)(3) (SP-00)	dB(A)	29/31/33	29/31/33	29/31/34
Noise level (sound power) (SP-00)	dB(A)	61	61	62
Air flow cooling mode (L / M / H)(3) (SP-00)	m³/h	360/420/480	360/420/480	480/540/600
Static Pressure Nom. (min ~ max)	Pa	32 (0 - 50)	32 (0 - 50)	27 (0 - 52)
Dimensions (H x W x D)	mm	197x1084x600	197x1084x600	197x1084x600
Weight	kg	29	29	30
Included Condensate Pump		yes	yes	yes
Condensate Pump Lift	mm	850 mm from the bottom edge of the unit		
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 1/2
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 12.70
Power Input	W	30	30	40
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.
(3) SP: Static Pressure settings via optional functions in the remote controller (SP-00 = Std; SP-01 High static pressure; SP-02 low static pressure)
Unit Capacity Dipswitch available

SYSTEM FREE

RPI-FSN4E

Ducted In the Ceiling (Standard)

Indoor Unit		RPI 2.0FSN4E ⊙	RPI 2.5FSN4E ⊙	RPI 3.0FSN4E	RPI 4.0FSN4E	RPI 5.0FSN4E	RPI 6.0FSN4E
Nominal Cooling Capacity (Utopia System)(1)	kW	5.0	5.6	7.1	10.0	12.5	14.0
Nominal Heating Capacity (Utopia System)(2)	kW	5.6	6.3	8.0	11.2	14.0	16.0
UK Cooling Capacity (sensible) (Utopia System)	kW	5.3 (4.0)	5.9 (4.5)	7.7 (5.8)	10.6 (7.7)	13.2 (9.5)	15.7 (11.3)
Nominal Cooling Capacity (Set Free System)(1)	kW	5.6	7.1	8.0	11.2	14.0	16.0
Nominal Heating Capacity (Set Free System)(2)	kW	6.3	8.5	9.0	12.5	16.0	18.0
UK Cooling Capacity (sensible) (Set Free System)	kW	5.2 (4.2)	6.4 (4.9)	7.5 (5.6)	10.5 (7.7)	12.7 (9.1)	14.8 (10.7)
Noise Level (sound pressure) (L / M / H)(3) (SP-00)	dB(A)	27/29/29	28/30/30	29/31/31	25/28/30	28/32/35	29/33/36
Noise level (sound power) (SP-00)	dB(A)	55	56	57	62	65	66
Air flow cooling mode (L / M / H)(3) (SP-00)	m^3/h	780/900/960	900/1020/1140	1020/1200/1320	1500/1680/1800	1680/1920/2100	1740/1980/2160
Static Pressure Nom. (min ~ max)	Pa	30 (0 - 120)	30 (0 - 140)	30 (0 - 150)	45 (0 - 110)	50 (0 - 140)	50 (0 - 150)
Dimensions (H x W x D)	mm	275x1084x600	275x1084x600	275x1084x600	275x1474x600	275x1474x600	275x1474x600
Weight	kg	35	36	36	48	48	48
Included Condensate Pump		yes	yes	yes	yes	yes	yes
Condensate Pump Lift	mm	850 mm from the bottom edge of the unit					
Drain Diameter (ext)		φ32mm	φ32mm	φ32mm	φ32mm	φ32mm	φ32mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	6.35 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Power Input	W	40	80	110	160	200	220
Power supply		230V / 1Ph / 50Hz					
Recommanded fuse size	A	5	5	5	5	5	5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.
(3) SP: Static Pressure settings via optional functions in the remote controller (SP-00 = Std; SP-01 High static pressure; SP-02 low static pressure)
⊙ Unit Capacity Dipwitch available

RPI-FSN3E

Ducted In the Ceiling (Large capacity)

Indoor Unit		RPI 8.0FSN3E	RPI 10.0FSN3E
Nominal Cooling Capacity (Utopia System)(1)	kW	20.0	25.0
Nominal Heating Capacity (Utopia System)(2)	kW	22.4	28.0
UK Cooling Capacity (sensible) (Utopia System)	kW	21.1 (16.2)	26.1 (20.6)
Nominal Cooling Capacity (Set Free System)(1)	kW	22.4	28.0
Nominal Heating Capacity (Set Free System)(2)	kW	25.0	31.0
UK Cooling Capacity (sensible) (Set Free System)	kW	18.4 (14.2)	22.9 (18.1)
Noise Level (sound pressure) (L / M / H)	dB(A)	51/54/54	25/55/55
Noise level (sound power)	dB(A)	77	78
Air flow cooling mode (L / M / H) (SP-High)	m^3/h	3600/3960/3960	4110/4500/4500
Air flow cooling mode (L / M / H) (SP-Low)	m^3/h	3570/3960/3960	4056/4500/4500
Static Pressure (SP-High)	Pa	180/220/220	180/220/220
Static Pressure (SP-Low)	Pa	140/180/180	140/180/180
Dimensions (H x W x D)	mm	432x 1592x600	432x 1592x600
Weight	kg	85	87
Included Condensate Pump		no	no
Condensate Pump Lift	mm	-	
Drain Diameter (ext)		φ25mm	φ25mm
Piping Diameter (Liquid / Gas)	Inch	3/8 / 3/4	3/8 / 7/8
	mm	9.53 / 19.05	9.53 / 22.2
Power Input	W	970	1060
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	10	10

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.

SYSTEM FREE

System Free

RPF-FSN2E

Floor Mounted (cased)

Indoor Unit		RPF 1.0FSN2E	RPF 1.5FSN2E	RPF 2.0FSN2E	RPF 2.5FSN2E
Nominal Cooling Capacity (Utopia System)(1)	kW	2.5	3.6	5.0	5.6
Nominal Heating Capacity (Utopia System)(2)	kW	2.8	4.0	5.6	6.3
UK Cooling Capacity (sensible) (Utopia System)	kW	2.6 (1.9)	3.7 (2.7)	5.3 (3.8)	5.9 (4.3)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.8	4.0	5.6	7.1
Nominal Heating Capacity (Set Free System)(2)	kW	3.2	4.8	6.3	8.5
UK Cooling Capacity (sensible) (Set Free System)	kW	2.6 (1.9)	3.9 (2.8)	5.2 (3.8)	6.4 (4.7)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	29/32/35	31/35/38	32/36/39	34/38/42
Noise level (sound power)	dB(A)	57	60	60	60
Air flow cooling mode (L / M / H)	m^3/h	360/420/510	540/600/720	660/840/960	660/840/960
Dimensions (H x W x D)	mm	630x1045x220	630x1170x220	630x1420x220	630x1420x220
Weight	kg	25	28	33	34
Included Condensate Pump		no	no	no	no
Condensate Pump Lift	mm	-			
Drain Diameter (ext)		φ18.5mm	φ18.5mm	φ18.5mm	φ18.5mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 5/8	3/8 / 5/8
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 15.88	9.53 / 15.88
Power Input	W	40	50	90	90
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.
(3) Sound pressure level measured at 1.5 meters below the unit (measured in anechoic room)
Unit Capacity Dipwitch available

RPFI-FSN2E

Floor Mounted (uncased)

Indoor Unit		RPFI 1.0FSN2E	RPFI 1.5FSN2E	RPFI 2.0FSN2E	RPFI 2.5FSN2E
Nominal Cooling Capacity (Utopia System)(1)	kW	2.5	3.6	5.0	5.6
Nominal Heating Capacity (Utopia System)(2)	kW	2.8	4.0	5.6	6.3
UK Cooling Capacity (sensible) (Utopia System)	kW	2.6 (1.9)	3.7 (2.7)	5.3 (3.8)	5.9 (4.3)
Nominal Cooling Capacity (Set Free System)(1)	kW	2.8	4.0	5.6	7.1
Nominal Heating Capacity (Set Free System)(2)	kW	3.2	4.8	6.3	8.5
UK Cooling Capacity (sensible) (Set Free System)	kW	2.6 (1.9)	3.9 (2.8)	5.2 (3.8)	6.4 (4.7)
Noise Level (sound pressure) (L / M / H)(3)	dB(A)	29/32/35	31/35/38	32/36/39	34/38/42
Noise level (sound power)	dB(A)	57	60	60	60
Air flow cooling mode (L / M / H)	m^3/h	360/420/510	540/600/720	660/840/960	660/840/960
Dimensions (H x W x D)	mm	620x848x220	620x973x220	620x1223x220	620x1223x220
Weight	kg	25	28	33	34
Included Condensate Pump		no	no	no	no
Condensate Pump Lift	mm	-			
Drain Diameter (ext)		φ18.5mm	φ18.5mm	φ18.5mm	φ18.5mm
Piping Diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	1/4 / 5/8	3/8 / 5/8
	mm	6.35 / 12.70	6.35 / 12.70	6.35 / 15.88	9.53 / 15.88
Power Input	W	40	50	90	90
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Recommended fuse size	A	5	5	5	5

(1) Cooling: Internal ambient 27°C (19°C WB) - Ambient 35°C; Refrigerant piping length 7.5m, level difference 0m.
(2) Heating: Internal ambient 20°C - Ambient 7°C (6°C WB); Refrigerant piping length 7.5m, level difference 0m.
(3) Sound pressure level measured at 1.5 meters below the unit (measured in anechoic room)
Unit Capacity Dipswitch available

SYSTEM FREE

E XV-E1

AHU Interface

Control Box		EXV-2.0E1	EXV-2.5E1	EXV-3.0E1	EXV-4.0E1	EXV-5.0E1	EXV-6.0E1	EXV-8.0E1	EXV-10.0E1
Nominal Heat Exch. Cooling Capacity (min-max)	kW	5.0 (4.0 - 5.6)	6.0 (4.8 - 6.3)	7.1 (5.7 - 8.0)	10.0 (8.0 - 11.2)	12.5 (10.0 - 14.0)	14.0 (11.2 - 16.0)	20.0 (16.0 - 22.4)	25.0 (20.0 - 28.0)
Nominal Heat Exch. Heating Capacity (min-max)	kW	5.6 (4.5 - 7.1)	7.0 (5.6 - 7.1)	8.0 (6.4 - 9.0)	11.2 (9.0 - 12.5)	14.0 (11.2 - 16.0)	16.0 (12.8 - 18.0)	22.4 (17.9 - 25.0)	28.0 (22.4 - 31.5)
Heat Exchanger Volume (min - max)	dm^3	0.57 - 1.06	0.89 - 1.35	1.03 - 1.57	1.51 - 2.37	1.92 - 2.37	1.92 - 2.92	2.92 - 3.89	3.89 - 4.76
Power Supply		230V / 1Ph / 50Hz							
Allowed Fan Current (A)		2.5	2.5	2.5	2.5	2.5	2.5	15	15
Dimensions (H x W x D)	mm	291/241/87	291/241/87	291/241/87	291/241/87	291/241/87	291/241/87	291/241/87	291/241/87
Weight	kg	4.5	4.5	4.5	4.5	4.5	4.5	4.5	4.5
Recommended fuse size	A	10	10	10	10	10	10	10	10
Expansion Valve Box		**EXV-2.0E1**	**EXV-2.5E1**	**EXV-3.0E1**	**EXV-4.0E1**	**EXV-5.0E1**	**EXV-6.0E1**	**EXV-8.0E1**	**EXV-10.0E1**
Piping Diameter (Liquid / Liquid)	Inch	1/4	3/8	3/8	3/8	3/8	3/8	3/8	3/8
	mm	6.35	9.53	9.53	9.53	9.53	9.53	9.53	9.53
Dimensions (H x W x D)	mm	431/199/103	431/199/103	431/199/103	431/199/103	431/199/103	431/199/103	431/199/103	431/199/103
Weight	kg	2	2.5	2.5	2.5	2.5	2.5	4.5	4.5

Note:- Include PC-ART Remote Controller if field supplied Thermostats are not to be used.

Did you know?

System Free indoor units can be combined with our Utopia Splits or Set Free VRF ranges for ultimate flexibility

Premium efficiency splits

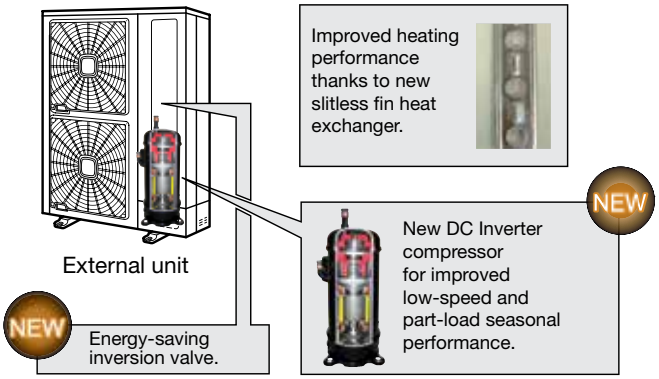
New Utopia IVX is fully ErP compliant, has excellent A++ seasonal efficiency and is compatible with our highly-efficient System Free indoor units as well as the KPI-Energy heat recovery system

Utopia Split Systems

Introducing our new IVX Premium and IVX Comfort outdoor units, compatible with all system free indoor units

Energy saving

Thanks to the new DC Inverter-controlled compressor, the redesigned cooling circuit and slitless fin heat exchanger, power consumption has been reduced achieving excellent A++ seasonal efficiency as required by the new Eco-Design Directive (ErP Lot 10).

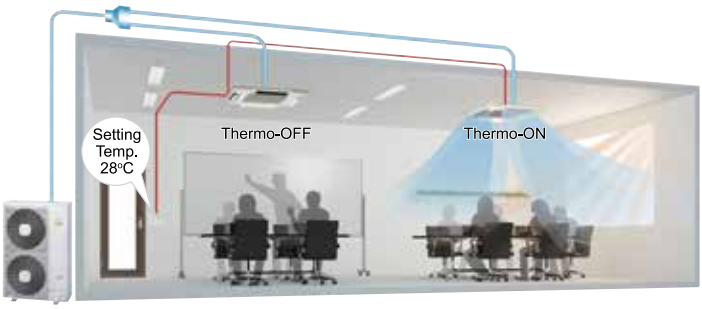


Comfort and ease of installation

Improved connectivity (up to 8 indoors per outdoor unit, minimising pipework required) and zone-by-zone individual control make IVX Premium and IVX Comfort the perfect solution where VRF flexibility is needed but at a lower cost.

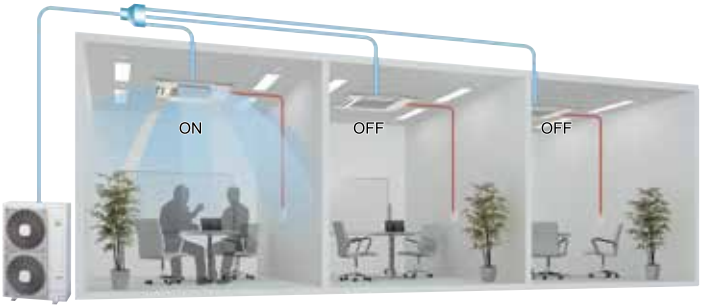
The individual Thermo-on and Thermo-off is possible even when the remote control is connected to multiple internal units. The system is able to handle changes in air-conditioning needs for each individual space, eg. internal zone or perimeter area, and thereby optimise energy efficiencies.

This produces a highly comfortable environment and great electricity savings.



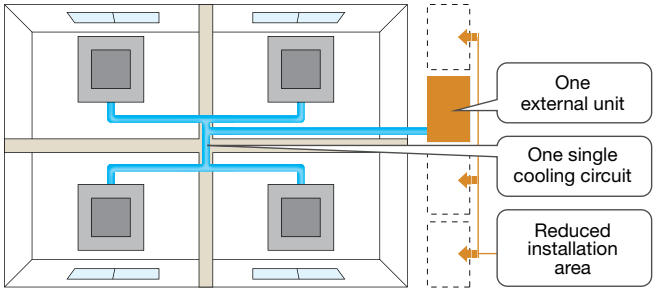
Easily adaptable and reconfigurable

Each indoor unit can be installed and operated completely independently. Controlled from a dedicated remote controller, each room's occupants can monitor and adjust operating temperatures according to their specific requirements. This facilitates maximum energy savings and total future flexibility, as units have individual control regardless of possible future reorganisation of the interior spaces.



Easy installation

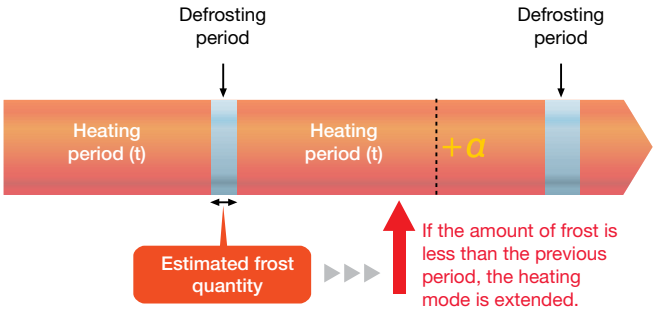
Connect up to eight indoor units to the same outdoor unit using the same refrigerant circuit - this simplifies piping and electrical equipment routes. The space required for positioning the outdoor unit is also greatly reduced, enabling simple and straight forward installations.



High level of comfort

IVX Premium and IVX Comfort were designed to guarantee optimum comfort even during the critical defrosting phase. Defrosting operation has been greatly reduced and the heating operation period increased by up to 40% thanks to an innovative Intelligent Defrost System.

The amount of frost is estimated based on the defrosting time spent during the previous cycle. If the amount of frost detected is less than the previous cycle, the heating operation is automatically extended to the end of the defrosting period. As a result, unnecessary defrosting cycles are eliminated.



Energy efficiency

The Eco-Design of Energy-related products (ErP) Directive provides EU-wide minimum requirements that manufacturers must follow for the construction and marketing of their products to ensure reduced energy consumption to benefit both businesses and consumers.

These regulations require all relevant manufacturers to calculate energy usage in a more realistic way, moving from nominal to seasonal calculations (SCOP and SEER) and including operation at partial load. Since most air conditioning systems operate at partial load, this new method for calculating energy efficiency is much more accurate.

The new method of calculating seasonal efficiency also takes into account the energy consumption of auxiliary equipment in stand-by mode.

The index of seasonal cooling energy efficiency ratio (SEER) and the seasonal coefficient of heating performance (SCOP) show a value very similar to the actual energy consumption.

Compatibility with R22 cooling circuits

New Utopia IVX Premium and IVX Comfort are compatible* with existing R22 gas installations. Both models – which use R410A refrigerant gas - can be installed without having to change the existing installed piping as the system adjusts the pressure so as not to damage the existing piping.

*some restrictions apply

Utopia Split Systems

	Utopia IVX Comfort	Utopia IVX Premium	Utopia ES	Utopia IVX Centrifugal
	RAS 2.0 ~ 12H(V)NCE	RAS 3.0 ~ 12H(V)NPE	RAS 3.0 ~ 10H(V)RNSE	RASC 5.0 ~ 10H(V)RNM1E
Nominal Cooling Capacity (kW)	5.0 ~ 30.0	7.1 ~ 30.0	7.1 ~ 25.0	12.5 ~ 23.0
Nominal Heating Capacity (kW)	5.6 ~ 33.5	8.0 ~ 33.5	8.0 ~ 28.0	14.0 ~ 25.0
Individual IVX Control (Min - Max Indoor Units)(3)	1 - 4	1 - 8	1 - 4	1 - 4
Connected Capacity (Min - Max)(4)	90% - 115%	50% - 120%	100%	100%
Seasonal Efficiency SEER(1) (2)	5.60	6.82	5.14	2.88 (EER)
Energy Efficiency Class	A+	A++	A	C (Energy Label)
Seasonal Efficiency SCOP(1) (2) (Average Climate)	4.70	4.65	3.88	3.09 (COP)
Energy Efficiency Class	A++	A++	A	D (Energy Label)
Refrigerant / GWP	R410A / 1975	R410A / 1975	R410A / 1975	R410A / 1975
Operating Range (Cooling)	-5ºC / +46ºC	-5ºC / +46ºC	-5ºC / +46ºC	-5ºC / +46ºC
Operating Range (Heating)	-20(wb)ºC / +15(wb)ºC	-20(wb)ºC / +15(wb)ºC	-20(wb)ºC / +15(wb)ºC	-15(wb)ºC / +15(wb)ºC
Remote Controller Type	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired

(1) Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01
(2) Selected Models
(3) Maximum indoor unit quantity dependant on Outdoor Capacity
(4) Restrictions apply, consult Technical Manual

Features and Benefits

Utopia IVX Comfort
RAS-HVNC(E) and RAS-HNC(E)

- Capacities from 5kW to 33.5kW
- Compact design - single fan (up to 6HP)
- Improved connectivity – up to 4 indoors per outdoor unit minimising pipework required
- Zone-by-zone individual control
- Fully ErP compliant
- A+ seasonal efficiency
- Available in single phase and three phase.

Utopia IVX Premium
RAS-HVNP(E) and RAS-HNP(E)

- Capacities from 7.1kW to 33.5kW
- Connection ratios between 50% and 120% in relation to outdoor capacity
- Improved connectivity – up to 8 indoors per outdoor unit minimising pipework required
- Zone-by-zone individual control
- Fully ErP compliant
- A++ seasonal efficiency
- Intelligent Defrost System extending the heating operation period by up to 40%
- Available in single phase and three phase.

Utopia ES
RAS-HVRNS2/3E and RAS-HRNS2/3E

- Capacities from 7.1kW to 28kW
- R410A refrigerant
- Compact design – single fan (up to 6HP)
- Multi split applications possible (Master slave control)
- Available in single phase and three phase.

Utopia IVX Centrifugal
RASC-HVRNM1E and RASC-HRNM1E

- Capacities from 12.5kW to 25kW
- Installed indoors with field-supplied ductwork – ideal where external installation space is limited or planning restrictions apply
- Improved connectivity – up to 4 indoors per outdoor unit minimising pipework required
- Zone-by-zone individual control
- Low temperature operation as standard
- Flexible inlet air and outlet air option for easy installation.

Hitachi's Utopia Split Systems range is compatible with H-LINK II and CS Net Web and allows for optional integration with all leading BMS protocols.

Did you know? IVX Premium and IVX Comfort can be installed using existing R22 pipework

Utopia IVX Comfort

Outdoor Unit		RAS 2HVNP	RAS 2.5HVNP	RAS 3HVNC	RAS 4HVNCE	RAS 4HNCE	RAS 5HVNCE
Power supply (1Ø/3Ø)		230V / 1Ph / 50Hz				400V / 3Ph / 50Hz	230V / 1Ph / 50Hz
Nominal Cooling Capacity (min - max)	kW	5.0 (2.2 - 5.6)	5.6 (2.2 - 6.3)	7.1 (3.2 - 8.0)	10 (4.5 - 11.2)	10 (4.5 - 11.2)	12.5 (5.7 - 14.0)
Nominal Heating Capacity (min - max)	kW	5.6 (2.2 - 7.1)	6.3 (2.2 - 8.0)	8.0 (3.5 - 10.6)	11.2 (5.0 - 14.0)	11.2 (5.0 - 14.0)	14.0 (5.0 - 16.0)
UK Cooling Capacity (sensible)(4)	kW	5.3 (4.7)	5.9 (5.1)	7.7 (6.2)	10.6 (8.2)	10.6 (8.2)	13.2 (9.5)
Minimum - Maximum Indoor Units		1 - 2	1 - 2	1 - 2	1 - 4	1 - 4	1 - 4
Minimum - Maximum connected capacity		90%-110%	90%-110%	90%-110%	90% - 115%	90% - 115%	90% - 115%
Seasonal Efficiency SEER(2)		5.60	5.00	5.31	5.16	5.07	na
Energy Efficiency Class		A+	B	A	A	B	*
Annual Energy Consumption	kWh/yr	313	392	469	673	700	na
Seasonal Efficiency SCOP(2) (Average Climate)		4.70	4.53	4.07	3.92	3.92	na
Energy Efficiency Class		A++	A+	A+	A	A	*
Annual Energy Consumption	kWh/yr	1489	1618	1912	2872	2872	na
Nominal Load Efficiency EER / COP(3)		4.03 / 4.68	3.97 / 4.92	3.14 / 4.00	3.80 / 4.29	3.80 / 4.29	3.16 / 3.88
Energy Class (Cool/Heat)		A / A	A / A	B / A	A / A	A / A	B / A
Noise level cooling (sound pressure) (night mode)	dB(A)	44 (42)	45 (43)	48 (46)	50 (48)	50 (48)	52 (50)
Noise level heating (sound pressure)	dB(A)	46	47	50	52	52	54
Noise level (sound power)(1)	dB(A)	62	63	66	70	70	71
Air flow (Cooling / Heating)	m^3/h	2436	2436	2682	3720	3720	4080
Dimensions (H x W x D)	mm	600x792x300	600x792x300	600x792x300	800x950x370	800x950x370	800x950x370
Weight	kg	41	41	44	67	67	79
Piping diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 1/2	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	6.35 / 12.70	6.35 / 12.70	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Minimum Piping Length	m	5	5	5	5	5	5
Maximum Piping Length / Height Difference	m	50 / 30	50 / 30	50 / 30	70 / 30	70 / 30	75 / 30
Current Quantity of Refrigerant	kg	1.6	1.6	1.9	2.9	2.9	2.9
Chargeless / Additional Refrigerant Charge	m / g/m	30 / 30	30 / 30	30 / 40	30 / 40	30 / 40	30 / 60
Recommended fuse size	A	16	20	25	32	16	32
Starting current (1Ø/3Ø)	A	<10	<10	<10	<10	<10	<10
Running current (cooling / heating) (1Ø/3Ø)	A	5.3 / 5.1	5.9 / 5.9	9.7 / 8.5	11.0 / 10.9	4.0 / 4.0	16.8 / 15.3
Interconnecting Cables	No.	LNE + 2 core screened					
Working Range (cooling / heating)	°C	-5°C~46(db)°C / -20°C~15(wb)°C					
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Rotary	Rotary	Scroll

(1) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

(2) Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01

(3) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C)

(2, 3 & 4) Data specified includes connection to RCI-FSN3 indoor unit

Did you know?

Our Utopia Splits can connect to any indoor units from our System Free range for ultimate flexibility

Utopia Split Systems

RAS-HVNP

RAS-H(V)NCE

RAS-HNC(E)

Utopia IVX Comfort

Outdoor Unit		RAS 5HNCE	RAS 6HVNCE	RAS 6HNCE	RAS 8HNCE	RAS 10HNCE	RAS 12HNC
Power supply (1Ø/3Ø)		400V / 3Ph / 50Hz	230V / 1Ph / 50Hz	400V / 3Ph / 50Hz			
Nominal Cooling Capacity (min - max)	kW	12.5 (5.7 - 14.0)	14.0 (6.0 - 16.0)	14.0 (6.0 - 16.0)	20.0 (8.0 - 22.4)	25.0 (10.0 -28.0)	30.0 (11.2 -33.5)
Nominal Heating Capacity (min - max)	kW	14.0 (5.0 - 16.0)	16.0 (5.0 - 18.0)	16.0 (5.0 - 18.0)	22.4 (6.3 - 28.0)	28.0 (8.0 - 35.0)	33.5 (9.0 - 37.5)
UK Cooling Capacity (sensible)(4)	kW	13.2 (9.5)	15.6 (10.8)	15.6 (10.8)	21.1 (16.2)	26.1 (18.8)	31.2 (21.5)
Minimum - Maximum Indoor Units		1 - 4	1 - 4	1 - 4	1 - 4	1 - 4	1 - 4
Minimum - Maximum connected capacity		90% - 115%	90% - 115%	90% - 115%	90% - 115%	90% - 115%	90% - 115%
Seasonal Efficiency SEER(2)		na	na	na	na	na	na
Energy Efficiency Class		*	*	*	*	*	*
Annual Energy Consumption	kWh/yr	na	na	na	na	na	na
Seasonal Efficiency SCOP(2) (Average Climate)		na	na	na	na	na	na
Energy Efficiency Class		*	*	*	*	*	*
Annual Energy Consumption	kWh/yr	na	na	na	na	na	na
Nominal Load Efficiency EER / COP(3)		3.16 / 3.88	2.77 / 3.59	2.77 / 3.59	3.36 / 3.81	3.02 / 3.63	2.57 / 3.54
Energy Class (Cool/Heat)		B / A	D / B	D / B	A / A	B / A	E / B
Noise level cooling (sound pressure) (night mode)	dB(A)	52 (50)	55 (53)	55 (53)	57 (55)	58 (56)	59 (56)
Noise level heating (sound pressure)	dB(A)	54	57	57	59	60	61
Noise level (sound power)(1)	dB(A)	71	72	72	76	76	77
Air flow (Cooling / Heating)	m^3/h	4080	4800	4800	7620	8040	9780
Dimensions (H x W x D)	mm	800x950x370	800x950x370	800x950x370	1380x950x370	1380x950x370	1650x1100x390
Weight	kg	79	79	79	136	138	168
Piping diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 11/8	1/2 / 11/8	1/2 / 11/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 28.61	12.07 / 28.61	12.07 / 28.61
Minimum Piping Length	m	5	5	5	5	5	5
Maximum Piping Length / Height Difference	m	75 / 30	75 / 30	75 / 30	100 / 30	100 / 30	100 / 30
Current Quantity of Refrigerant	kg	2.9	2.9	2.9	5.3	6.0	6.7
Chargeless / Additional Refrigerant Charge	m / g/m	30 / 60	30 / 60	30 / 60	30 / Calculate	30 / Calculate	30 / Calculate
Recommended fuse size	A	16	32	16	25	25	25
Starting current (1Ø/3Ø)	A	<10	<10	<10	<10	<10	<10
Running current (cooling / heating) (1Ø/3Ø)	A	6.1 / 5.6	21.6 / 19.0	7.9 / 6.9	9.1 / 9.0	12.9 / 12.0	18.1 / 14.6
Interconnecting Cables	No.	LNE + 2 core screened					
Working Range (cooling / heating)	°C	-5°C~46(db)°C / -20°C~15(wb)°C					
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll	Scroll	Scroll

(1) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

(2) Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01

(3) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C)

(2, 3 & 4) Data specified includes connection to RCI-FSN3 indoor unit

Utopia IVX Comfort

Standard Cassette (4-way)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER(1)	SCOP(1) (Ave Climate)	
RCI 2.0FSN3Ei	RAS 2HVNC	P-N23NA	PC-ARF	5.0 (2.2 ~ 5.6)	5.6 (2.2 ~ 7.1)	5.3 (4.1)	220V -1ph	5.10 (A)	4.00 (A+)	
RCI 2.5FSN3Ei	RAS 2.5HVNC	P-N23NA	PC-ARF	5.6 (2.2 ~ 6.3)	6.3 (2.2 ~ 8.0)	5.9 (4.3)	220V -1ph	4.92 (B)	4.35 (A+)	
RCI 3.0FSN3Ei	RAS 3HVNC	P-N23NA	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (6.1)	220V -1ph	4.87 (B)	3.95 (A)	
RCI 4.0FSN3Ei	RAS 4HVNCE	P-N23NA	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.3)	220V -1ph	4.88 (B)	3.83 (A)	
RCI 4.0FSN3Ei	RAS 4HNCE	P-N23NA	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.3)	380V - 3ph	4.79 (B)	3.83 (A)	
RCI 5.0FSN3Ei	RAS 5HVNCE	P-N23NA	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.8)	220V -1ph	n/a	n/a	
RCI 5.0FSN3Ei	RAS 5HNCE	P-N23NA	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.8)	380V - 3ph	n/a	n/a	
RCI 6.0FSN3Ei	RAS 6HVNCE	P-N23NA	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (11.4)	220V -1ph	n/a	n/a	
RCI 6.0FSN3Ei	RAS 6HNCE	P-N23NA	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (11.4)	380V - 3ph	n/a	n/a	

Hi-Efficiency Cassette (4-way) (Standard Grille)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER(1)	SCOP(1) (Ave Climate)	
RCI 2.0FSN3	RAS 2HVNC	AP-160NA1	PC-ARF	5.0 (2.2 ~ 5.6)	5.6 (2.2 ~ 7.1)	5.3 (4.7)	220V -1ph	5.60 (A+)	4.6 (A++)	
RCI 2.5FSN3	RAS 2.5HVNC	AP-160NA1	PC-ARF	5.6 (2.2 ~ 6.3)	6.3 (2.2 ~ 8.0)	5.9 (5.1)	220V -1ph	5.00 (B)	4.53 (A+)	
RCI 3.0FSN3	RAS 3HVNC	AP-160NA1	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (6.2)	220V -1ph	5.31 (A)	4.07 (A+)	
RCI 4.0FSN3	RAS 4HVNCE	AP-160NA1	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.2)	220V -1ph	5.16 (A)	3.92 (A)	
RCI 4.0FSN3	RAS 4HNCE	AP-160NA1	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.2)	380V - 3ph	5.07 (B)	3.92 (A)	
RCI 5.0FSN3	RAS 5HVNCE	AP-160NA1	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	220V -1ph	n/a	n/a	
RCI 5.0FSN3	RAS 5HNCE	AP-160NA1	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	380V - 3ph	n/a	n/a	
RCI 6.0FSN3	RAS 6HVNCE	AP-160NA1	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (10.8)	220V -1ph	n/a	n/a	
RCI 6.0FSN3	RAS 6HNCE	AP-160NA1	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (10.8)	380V - 3ph	n/a	n/a	

Hi-Efficiency Cassette (4-way) (Motion Sensor Grille)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER(1)	SCOP(1) (Ave Climate)	
RCI 2.0FSN3	RAS 2HVNC	AP-160NAE	PC-ARF	5.0 (2.2 ~ 5.6)	5.6 (2.2 ~ 7.1)	5.3 (4.7)	220V -1ph	5.60 (A+)	4.6 (A++)	
RCI 2.5FSN3	RAS 2.5HVNC	AP-160NAE	PC-ARF	5.6 (2.2 ~ 6.3)	6.3 (2.2 ~ 8.0)	5.9 (5.1)	220V -1ph	5.00 (B)	4.53 (A+)	
RCI 3.0FSN3	RAS 3HVNC	AP-160NAE	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (6.2)	220V -1ph	5.31 (A)	4.07 (A+)	
RCI 4.0FSN3	RAS 4HVNCE	AP-160NAE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.2)	220V -1ph	5.16 (A)	3.92 (A)	
RCI 4.0FSN3	RAS 4HNCE	AP-160NAE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.2)	380V - 3ph	5.07 (B)	3.92 (A)	
RCI 5.0FSN3	RAS 5HVNCE	AP-160NAE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	220V -1ph	n/a	n/a	
RCI 5.0FSN3	RAS 5HNCE	AP-160NAE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	380V - 3ph	n/a	n/a	
RCI 6.0FSN3	RAS 6HVNCE	AP-160NAE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (10.8)	220V -1ph	n/a	n/a	
RCI 6.0FSN3	RAS 6HNCE	AP-160NAE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (10.8)	380V - 3ph	n/a	n/a	

Standard Cassette (2-way)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER(1)	SCOP(1) (Ave Climate)	
RCD 2.0FSN2	RAS 2HVNC	P-N23DNA	PC-ARF	5.0 (2.2 ~ 5.6)	5.6 (2.2 ~ 7.1)	5.3 (4)	220V -1ph	4.02 (D)	3.40 (A)	
RCD 2.5FSN2	RAS 2.5HVNC	P-N23DNA	PC-ARF	5.6 (2.2 ~ 6.3)	6.3 (2.2 ~ 8.0)	5.9 (4.4)	220V -1ph	4.16 (C)	4.00 (A+)	
RCD 3.0FSN2	RAS 3HVNC	P-N23DNA	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (5.7)	220V -1ph	4.20 (C)	3.75 (A)	
RCD 4.0FSN2	RAS 4HVNCE	P-N46DNA	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.7)	220V -1ph	4.19 (C)	3.41 (A)	
RCD 4.0FSN2	RAS 4HNCE	P-N46DNA	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.7)	380V - 3ph	4.13 (C)	3.41 (A)	
RCD 5.0FSN2	RAS 5HVNCE	P-N46DNA	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.1)	220V -1ph	n/a	n/a	
RCD 5.0FSN2	RAS 5HNCE	P-N46DNA	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.1)	380V - 3ph	n/a	n/a	

Utopia IVX Comfort

Wall Mounted

Indoor Unit	Outdoor Unit	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RPK 2.0FSN3M	RAS 2HVNC	PC-ARF	5.0 (2.2 ~ 5.6)	5.6 (2.2 ~ 7.1)	5.3 (3.7)	220V -1ph	4.82 (B)	4.00 (A+)	
RPK 2.5FSN3M	RAS 2.5HVNC	PC-ARF	5.6 (2.2 ~ 6.3)	6.3 (2.2 ~ 8.0)	5.9 (4.2)	220V -1ph	4.61 (B)	4.13 (A+)	
RPK 3.0FSN3M	RAS 3HVNC	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (5.7)	220V -1ph	4.88 (B)	3.70 (A)	
RPK 4.0FSN3M	RAS 4HVNCE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.3)	220V -1ph	4.91 (B)	3.40 (A)	
RPK 4.0FSN3M	RAS 4HNCE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.3)	380V - 3ph	4.83 (B)	3.40 (A)	

Ducted In the Ceiling

Indoor Unit	Outdoor Unit	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RPI 2.0FSN4E	RAS 2HVNC	PC-ARF	5.0 (2.2 ~ 5.6)	5.6 (2.2 ~ 7.1)	5.3 (4)	220V -1ph	5.10 (A)	4.00 (A+)	
RPI 2.5FSN4E	RAS 2.5HVNC	PC-ARF	5.6 (2.2 ~ 6.3)	6.3 (2.2 ~ 8.0)	5.9 (4.5)	220V -1ph	4.89 (B)	4.40 (A+)	
RPI 3.0FSN4E	RAS 3HVNC	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (5.8)	220V -1ph	4.96 (B)	3.9 (A)	
RPI 4.0FSN4E	RAS 4HVNCE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.7)	220V -1ph	5.13 (A)	3.91 (A)	
RPI 4.0FSN4E	RAS 4HNCE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.7)	380V - 3ph	5.03 (B)	3.91 (A)	
RPI 5.0FSN4E	RAS 5HVNCE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	220V -1ph	n/a	n/a	
RPI 5.0FSN4E	RAS 5HNCE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	380V - 3ph	n/a	n/a	
RPI 6.0FSN4E	RAS 6HVNCE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (11.2)	220V -1ph	n/a	n/a	
RPI 6.0FSN4E	RAS 6HNCE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (11.2)	380V - 3ph	n/a	n/a	
RPI 8.0FSN3E	RAS 8HNCE	PC-ARF	20.0 (8.0 ~ 22.4)	22.4 (6.3 ~ 28.0)	21.1 (16.2)	380V - 3ph	n/a	n/a	
RPI 10.0FSN3E	RAS 10HNCE	PC-ARF	25.0 (10.0 ~ 28.0)	28.0 (8.0 ~ 35.0)	26.1 (20.6)	380V - 3ph	n/a	n/a	

Ceiling Suspended

Indoor Unit	Outdoor Unit	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RPC 2.0FSN2E	RAS 2HVNC	PC-ARF	5.0 (2.2 ~ 5.6)	5.6 (2.2 ~ 7.1)	5.3 (3.8)	220V -1ph	4.10 (C)	3.40 (A)	
RPC 2.5FSN2E	RAS 2.5HVNC	PC-ARF	5.6 (2.2 ~ 6.3)	6.3 (2.2 ~ 8.0)	5.9 (4.2)	220V -1ph	3.77 (D)	3.62 (A)	
RPC 3.0FSN2E	RAS 3HVNC	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (5.5)	220V -1ph	3.93 (D)	3.41 (A)	
RPC 4.0FSN2E	RAS 4HVNCE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.6)	220V -1ph	4.45 (C)	3.41 (A)	
RPC 4.0FSN2E	RAS 4HNCE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.6)	380V - 3ph	4.38 (C)	3.41 (A)	
RPC 5.0FSN2E	RAS 5HVNCE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	220V -1ph	n/a	n/a	
RPC 5.0FSN2E	RAS 5HNCE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	380V - 3ph	n/a	n/a	
RPC 6.0FSN2E	RAS 6HVNCE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (11.2)	220V -1ph	n/a	n/a	
RPC 6.0FSN2E	RAS 6HNCE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.6 (11.2)	380V - 3ph	n/a	n/a	

All pricing includes PC-ARF wired Remote Controller (ordered as individual item)

[1] Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01

SYSTEM FREE | -20 +15 | -5 +46 | ErP active | DC INVERTER

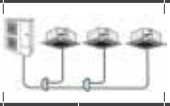
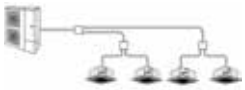
Utopia IVX Comfort - Multi Combinations

RAS-HNC(E)

RAS-H(V)NCE

RAS-HVNP

Utopia IVX Comfort (2-12HP)

Model	Minimum indoor unit size	Maximum quantity of indoor units	1 unit	2 units		3 units				4 units			
						Header Piping		Line Branch Piping		Header Piping		Line Branch Piping	
													
			Comb.	Comb.	Joint(s)	Comb.	Joint(s)	Comb.	Joint(s)	Comb.	Joint(s)	Comb.	Joint(s)
RAS 2HNP(xx)	0.8HP	2	90 ~ 110%	90 ~ 100%(x)	TW-22AN	Not Possible				Not Possible			
RAS 2.5HNP(xxx)	0.8HP	2	90 ~ 110%	90 ~ 100%(x)	TW-22AN	Not Possible				Not Possible			
RAS 3H(V)NC	0.8HP	2	90 ~ 110%	90 ~ 100%(x)	TE-03N1	Not Possible				Not Possible			
RAS 4H(V)NCE	0.8HP	4	90 ~ 115%	90 ~ 115%	TE-04N1	90 ~ 100%	TRE-46N1	90 ~ 100%	2 x E-102SN2	90 ~ 100%	Main Joint: TE-04N1 Second Joints: Capacity after branch ≤ 2.0HP: TE-03N1 Capacity after branch ≥ 2.3HP: TE-04N1	90 ~ 100%	3 x E-102SN2
RAS 5H(V)NCE	0.8HP	4	90 ~ 115%	90 ~ 115%	TE-56N1	90 ~ 100%	TRE-46N1	90 ~ 100%	2 x E-102SN2	90 ~ 100%	Main Joint: TE-56N1 Second Joints: Capacity after branch ≤ 1.5HP: TE-03N1 Capacity after branch ≥ 1.8HP to < 2HP: TE-03N1 Capacity after branch = 4HP: TE-04N1 Capacity after branch ≥ 5HP: TE-56N1	90 ~ 100%	3 x E-102SN2
RAS 6H(V)NCE	0.8HP	4	90 ~ 115%	90 ~ 115%	TE-56N1	90 ~ 100%	TRE-46N1	90 ~ 100%	2 x E-102SN2	90 ~ 100%		90 ~ 100%	3 x E-102SN2
RAS 8HNCE	1.8HP	4	90 ~ 115%	90 ~ 115%	TE-08N	90 ~ 115%	TRE-812N1	90 ~ 115%	E-162SN2 + E-102SN2	90 ~ 115%	QE-812N1 Main Joint: TE-08N Second Joints: Capacity after branch ≤ 1.5HP: TE-03N1 Capacity after branch ≥ 1.8HP to < 2HP: TE-03N1 Capacity after branch = 4HP: TE-04N1 Capacity after branch ≥ 5HP: TE-56N1	90 ~ 115%	2 x E-162SN2 + E-102SN2
RAS 10/12HNC(E)	1.8HP	4	90 ~ 115%	90 ~ 115%	TE-10N	90 ~ 115%	TRE-812N1	90 ~ 115%	E-162SN2 + E-102SN2	90 ~ 115%	QE-812N1 Main Joint: TE-10N Second Joints: Capacity after branch ≤ 1.5HP: TE-03N1 Capacity after branch ≥ 1.8HP to < 2HP: TE-03N1 Capacity after branch = 4HP: TE-04N1	90 ~ 115%	2 x E-162SN2 + E-102SN2

(*) Follow Table 1 in order to optimise the indoor unit balance.
(**) When installing indoor units RCI-FSN3 or RCI-FSN3Ei, only single combinations are allowed.
(***) When installing several indoor units of RCI-FSN3 or RCI-FSN3Ei, minimum allowed capacity is 1.5HP.

Utopia IVX Comfort - Multi Combinations

Notes

1.Table 1: For Multi split systems please refer to the table below regarding balancing indoor units capacity.

Indoor unit with the highest capacity	HP	0.8	1.0	1.3	1.5	1.8	2.0	2.3	2.5	3.0	4.0	5.0	6.0
Indoor unit with the lowest capacity	HP	0.8				1.0			1.3		1.5	1.8	2.0

2. Table 2: In the systems where the models are all 4-Way RCI-FSN3, the maximum capacity ratio of connected indoor units allowed is 100%, and the maximum number of connected indoor units are:

Utopia IVX Comfort	HP	2.0	2.5	3.0	4.0	5.0	6.0	8.0	10.0	12.0
Maximum Quantity of indoor units	No.	1		1	2			4		

3. Single split one to one indoor unit combinations using RCIM 2.0FSN2E, RPF(I) 2.0FSN2E or RPF(I) 2.5FSN2E, with IVX Premium and IVX Comfort are not allowed.

4. When installing in cold places (where the outside temperature can drop to -10°C) or in areas with high demand for heating, install a number of indoor units no higher than that recommended and ensure a capacity ratio less than 100%."

Piping lengths

Maximum length of the piping		2.0	2.5	3.0	4.0	5.0	6.0	8.0	10.0	12.0
Length	Actual length of the pipe	50	50	50	70	75	75	100	100	100
	Equivalent pipe length	70	70	70	90	95	95	125	125	125
Height	Outdoor unit higher than indoor unit	30	30	30	30	30	30	30	30	30
	Indoor unit higher than outdoor unit	20	20	20	20	20	20	20	20	20
	Height difference between indoor units	3	3	3	3	3	3	3	3	3

Utopia IVX Premium

Outdoor Unit		RAS 3HVNPE	RAS 4HVNPE	RAS 4HNPE	RAS 5HVNPE	RAS 5HNPE
Power supply (1Ø/3Ø)		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	400V / 3Ph / 50Hz	230V / 1Ph / 50Hz	400V / 3Ph / 50Hz
Nominal Cooling Capacity (min - max)	kW	7.1 (3.2 - 8.0)	10.0 (4.5 - 11.2)	10 (4.5 - 11.2)	12.5 (5.7 - 14.0)	12.5 (5.7 - 14.0)
Nominal Heating Capacity (min - max)	kW	8.0 (3.5 - 10.6)	11.2 (5.0 - 14.0)	11.2 (5.0 - 14.0)	14.0 (5.0 - 16.0)	14.0 (5.0 - 16.0)
UK Cooling Capacity (sensible)(4)	kW	7.7 (6.2)	10.6 (8.2)	10.6 (8.2)	13.2 (9.5)	13.2 (9.5)
Minimum - Maximum Indoor Units		1 - 3	1 - 5	1 - 5	1 - 6	1 - 6
Minimum - Maximum connected capacity		50% - 120%	50% - 120%	50% - 120%	50% - 120%	50% - 120%
Seasonal Efficiency SEER(2)		6.15	6.82	6.65	na	na
Energy Efficiency Class		A++	A++	A++	*	*
Annual Energy Consumption	kWh/yr	401	515	522	na	na
Seasonal Efficiency SCOP(2) (Average Climate)		4.18	4.65	4.65	na	na
Energy Efficiency Class		A+	A++	A++	*	*
Annual Energy Consumption	kWh/yr	2133	3426	3426	na	na
Nominal Load Efficiency EER / COP(3)		4.49 / 4.88	4.68 / 5.16	4.68 / 5.16	3.81 / 4.55	3.81 / 4.55
Energy Class (Cool/Heat)		A / A	A / A	A / A	A / A	A / A
Noise level cooling (sound pressure) (night mode)	dB(A)	46 (42)	47 (43)	47 (43)	48 (44)	48 (44)
Noise level heating (sound pressure)	dB(A)	48	49	49	50	50
Noise level (sound power)(1)	dB(A)	64	65	65	66	66
Air flow (Cooling / Heating)	m^3/h	2700	4800	4800	5400	5400
Dimensions (H x W x D)	mm	800x950x370	1380x950x370	1380x950x370	1380x950x370	1380x950x370
Weight	kg	66	103	103	103	103
Piping diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Minimum Piping Length	m	5	5	5	5	5
Maximum Piping Length / Height Difference	m	50 / 30	75 / 30	75 / 30	75 / 30	75 / 30
Current Quantity of Refrigerant	kg	2.3	4.1	4.1	4.2	4.2
Chargeless / Additional Refrigerant Charge	m / g/m	30 / 40	30 / 60	30 / 60	30 / 60	30 / 60
Recommended fuse size	A	25	32	16	32	16
Starting current (1Ø/3Ø)	A	<10	<10	<10	<10	<10
Running current (cooling / heating) (1Ø/3Ø)	A	6.7 / 6.9	8.8 / 9.0	3.2 / 3.3	13.8 / 12.9	5.1 / 4.7
Interconnecting Cables	No.	LNE + 2 core screened				
Working Range (cooling / heating)	°C	-5°C~46(db)°C / -20°C~15(wb)°C				
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Rotary	Scroll	Scroll	Scroll	Scroll

(1) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

(2) Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01

(3) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C)

(2, 3 & 4) Data specified includes connection to RCI-FSN3 indoor unit

Did you know?

Our Utopia Splits can connect to any indoor units from our System Free range for ultimate flexibility

Utopia Split Systems

RAS-HVNPE

RAS-H(V)NPE

Utopia IVX Premium

Outdoor Unit		RAS 6HVNPE	RAS 6HNPE	RAS 8HNPE	RAS 10HNPE	RAS 12HNP
Power supply (1Ø/3Ø)		230V / 1Ph / 50Hz	400V / 3Ph / 50Hz	400V / 3Ph / 50Hz	400V / 3Ph / 50Hz	400V / 3Ph / 50Hz
Nominal Cooling Capacity (min - max)	kW	14.0 (6.0 - 16.0)	14.0 (6.0 - 16.0)	20.0 (8.0 - 22.4)	25.0 (10.0 -28.0)	30.0 (11.2 -33.5)
Nominal Heating Capacity (min - max)	kW	16.0 (5.0 - 18.0)	16.0 (5.0 - 18.0)	22.4 (6.3 - 28.0)	28.0 (8.0 - 35.0)	33.5 (9.0 - 37.5)
UK Cooling Capacity (sensible)(4)	kW	15.7 (10.8)	15.7 (10.8)	21.1 (16.2)	26.1 (18.8)	31.2 (21.5)
Minimum - Maximum Indoor Units		1 - 6	1 - 6	1 - 8	1 - 8	1 - 8
Minimum - Maximum connected capacity		50% - 120%	50% - 120%	50% - 120%	50% - 120%	50% - 120%
Seasonal Efficiency SEER(2)		na	na	na	na	na
Energy Efficiency Class		*	*	*	*	*
Annual Energy Consumption	kWh/yr	na	na	na	na	na
Seasonal Efficiency SCOP(2) (Average Climate)		na	na	na	na	na
Energy Efficiency Class		*	*	*	*	*
Annual Energy Consumption	kWh/yr	na	na	na	na	na
Nominal Load Efficiency EER / COP(3)		3.41 / 4.23	3.41 / 4.23	3.56 / 4.21	3.07 / 3.84	2.65 / 3.64
Energy Class (Cool/Heat)		A / A	A / A	A / A	B / A	D / A
Noise level cooling (sound pressure) (night mode)	dB(A)	48 (45)	48 (45)	57 (55)	58 (56)	59 (56)
Noise level heating (sound pressure)	dB(A)	50	50	59	60	61
Noise level (sound power)(1)	dB(A)	67	67	76	76	77
Air flow (Cooling / Heating)	m^3/h	6000	6000	7620	8040	9780
Dimensions (H x W x D)	mm	1380x950x370	1380x950x370	1380x950x370	1380x950x370	1650x1100x390
Weight	kg	103	103	136	138	168
Piping diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 11/8	1/2 / 11/8	1/2 / 11/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 28.61	12.07 / 28.61	12.07 / 28.61
Minimum Piping Length	m	5	5	5	5	5
Maximum Piping Length / Height Difference	m	75 / 30	75 / 30	100 / 30	100 / 30	100 / 30
Current Quantity of Refrigerant	kg	4.2	4.2	5.3	6.0	6.7
Chargeless / Additional Refrigerant Charge	m / g/m	30 / 60	30 / 60	30 / Calculate	30 / Calculate	30 / Calculate
Recommended fuse size	A	32	16	25	25	25
Starting current (1Ø/3Ø)	A	<10	<10	<10	<10	<10
Running current (cooling / heating) (1Ø/3Ø)	A	17.5 / 16.0	6.4 / 5.9	8.6 / 8.1	12.6 / 11.3	17.5 / 14.2
Interconnecting Cables	No.	LNE + 2 core screened				
Working Range (cooling / heating)	°C	-5°C~46(db)°C / -20°C~15(wb)°C				
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll	Scroll

(1) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

(2) Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01

(3) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C)

(2, 3 & 4) Data specified includes connection to RCI-FSN3 indoor unit

Utopia IVX Premium

Standard Cassette (4-way)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RCI 3.0FSN3Ei	RAS 3HVNPE	P-N23NA	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (6.1)	220V - 1ph	5.60 (A+)	4.00 (A+)	
RCI 4.0FSN3Ei	RAS 4HVNPE	P-N23NA	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.3)	220V - 1ph	6.27 (A++)	4.24 (A+)	
RCI 4.0FSN3Ei	RAS 4HNPE	P-N23NA	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.3)	380V - 3ph	6.13 (A++)	4.24 (A+)	
RCI 5.0FSN3Ei	RAS 5HVNPE	P-N23NA	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.8)	220V - 1ph	n/a	n/a	
RCI 5.0FSN3Ei	RAS 5HNPE	P-N23NA	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.8)	380V - 3ph	n/a	n/a	
RCI 6.0FSN3Ei	RAS 6HVNPE	P-N23NA	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (11.5)	220V - 1ph	n/a	n/a	
RCI 6.0FSN3Ei	RAS 6HNPE	P-N23NA	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (11.5)	380V - 3ph	n/a	n/a	

Hi-Efficiency Cassette (4-way) (Standard Grille)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RCI 3.0FSN3	RAS 3HVNPE	AP-160NA1	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (6.2)	220V - 1ph	6.15 (A++)	4.18 (A+)	
RCI 4.0FSN3	RAS 4HVNPE	AP-160NA1	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.2)	220V - 1ph	6.82 (A++)	4.65 (A++)	
RCI 4.0FSN3	RAS 4HNPE	AP-160NA1	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.2)	380V - 3ph	6.65 (A++)	4.65 (A++)	
RCI 5.0FSN3	RAS 5HVNPE	AP-160NA1	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	220V - 1ph	n/a	n/a	
RCI 5.0FSN3	RAS 5HNPE	AP-160NA1	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	380V - 3ph	n/a	n/a	
RCI 6.0FSN3	RAS 6HVNPE	AP-160NA1	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (10.8)	220V - 1ph	n/a	n/a	
RCI 6.0FSN3	RAS 6HNPE	AP-160NA1	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (10.8)	380V - 3ph	n/a	n/a	

Hi-Efficiency Cassette (4-way) (Motion Sensor Grille)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RCI 3.0FSN3	RAS 3HVNPE	AP-160NAE	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (6.2)	220V - 1ph	6.15 (A++)	4.18 (A+)	
RCI 4.0FSN3	RAS 4HVNPE	AP-160NAE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.2)	220V - 1ph	6.82 (A++)	4.65 (A++)	
RCI 4.0FSN3	RAS 4HNPE	AP-160NAE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (8.2)	380V - 3ph	6.65 (A++)	4.65 (A++)	
RCI 5.0FSN3	RAS 5HVNPE	AP-160NAE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	220V - 1ph	n/a	n/a	
RCI 5.0FSN3	RAS 5HNPE	AP-160NAE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	380V - 3ph	n/a	n/a	
RCI 6.0FSN3	RAS 6HVNPE	AP-160NAE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (10.8)	220V - 1ph	n/a	n/a	
RCI 6.0FSN3	RAS 6HNPE	AP-160NAE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (10.8)	380V - 3ph	n/a	n/a	

Standard Cassette (2-way)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RCD 3.0FSN2	RAS 3HVNPE	P-N23DNA	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (5.7)	220V -1ph	5.02 (B)	3.84 (A)	
RCD 4.0FSN2	RAS 4HVNPE	P-N46DNA	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.7)	220V -1ph	5.00 (B)	3.83 (A)	
RCD 4.0FSN2	RAS 4HNPE	P-N46DNA	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.7)	380V - 3ph	4.91 (B)	3.83 (A)	
RCD 5.0FSN2	RAS 5HVNPE	P-N46DNA	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.1)	220V -1ph	n/a	n/a	
RCD 5.0FSN2	RAS 5HNPE	P-N46DNA	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.1)	380V - 3ph	n/a	n/a	

All pricing includes PC-ARF wired Remote Controller (ordered as individual item)

[1] Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01

Utopia IVX Premium

Wall Mounted

Indoor Unit	Outdoor Unit	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RPK 3.0FSN3M	RAS 3HVNPE	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (5.7)	220V -1ph	5.43 (A)	3.90 (A)	
RPK 4.0FSN3M	RAS 4HVNPE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.3)	220V -1ph	6.00 (A+)	3.81 (A)	
RPK 4.0FSN3M	RAS 4HNPE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.3)	380V - 3ph	5.87 (A+)	3.81 (A)	

Ducted In the Ceiling

Indoor Unit	Outdoor Unit	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RPI 3.0FSN4E	RAS 3HVNPE	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (5.8)	220V -1ph	5.63 (A+)	4.03 (A+)	
RPI 4.0FSN4E	RAS 4HVNPE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.7)	220V -1ph	6.30 (A++)	4.40 (A+)	
RPI 4.0FSN4E	RAS 4HNPE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.7)	380V - 3ph	6.16 (A++)	4.40 (A+)	
RPI 5.0FSN4E	RAS 5HVNPE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	220V -1ph	n/a	n/a	
RPI 5.0FSN4E	RAS 5HNPE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	380V - 3ph	n/a	n/a	
RPI 6.0FSN4E	RAS 6HVNPE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (11.3)	220V -1ph	n/a	n/a	
RPI 6.0FSN4E	RAS 6HNPE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (11.3)	380V - 3ph	n/a	n/a	
RPI 8.0FSN3E	RAS 8HNPE	PC-ARF	20.0 (8.0 ~ 22.4)	22.4 (6.3 ~ 28.0)	21.1 (16.2)	380V - 3ph	n/a	n/a	
RPI 10.0FSN3E	RAS 10HNPE	PC-ARF	25.0 (10.0 ~ 28.0)	28.0 (8.0 ~ 35.0)	26.1 (20.6)	380V - 3ph	n/a	n/a	

Ceiling Suspended

Indoor Unit	Outdoor Unit	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER[1]	SCOP[1] (Ave Climate)	
RPC 3.0FSN2E	RAS 3HVNPE	PC-ARF	7.1 (3.2 ~ 8.0)	8.0 (3.5 ~ 10.8)	7.7 (5.5)	220V -1ph	4.64 (B)	3.51 (A)	
RPC 4.0FSN2E	RAS 4HVNPE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.6)	220V -1ph	5.30 (A)	3.81 (A)	
RPC 4.0FSN2E	RAS 4HNPE	PC-ARF	10.0 (4.5 ~ 11.2)	11.2 (5.0 ~ 14.0)	10.6 (7.6)	380V - 3ph	5.20 (A)	3.81 (A)	
RPC 5.0FSN2E	RAS 5HVNPE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	220V -1ph	n/a	n/a	
RPC 5.0FSN2E	RAS 5HNPE	PC-ARF	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	13.2 (9.5)	380V - 3ph	n/a	n/a	
RPC 6.0FSN2E	RAS 6HVNPE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (11.3)	220V -1ph	n/a	n/a	
RPC 6.0FSN2E	RAS 6HNPE	PC-ARF	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.7 (11.3)	380V - 3ph	n/a	n/a	

All pricing includes PC-ARF wired Remote Controller (ordered as individual item)

[1] Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01

SYSTEM FREE

Utopia IVX Premium - Multi Combinations

RAS-H(V)NPE

RAS HNP(E)

RAS-HVNPE

Utopia IVX Premium (3-12HP)

Model	Minimum indoor unit size	Maximum quantity of indoor units	1 unit	2 units		3 units			
						Header Piping		Line Branch Piping	
			Combination	Combination	Joint(s)	Combination	Joint(s)	Combination	Joint(s)
RAS 3HVNPE	0.8HP	3	50-120%	50-120%	TW-52AN	50-100% (*)	TG-53AN	50-100% (*)	2 x E-102SN2
RAS 4H(V)NPE	0.8HP	5	50-120%	50-120%	TW-52AN	50-120%	TG-53AN	50-120%	2 x E-102SN2
RAS 5H(V)NPE	0.8HP	6	50-120%	50-120%	TW-52AN	50-120%	TG-53AN	50-120%	2 x E-102SN2
RAS 6H(V)NPE	0.8HP	6	50-120%	50-120%	TW-52AN	50-120%	TG-53AN	50-120%	2 x E-102SN2
RAS 8HNPE	0.8HP	8	50-120%	50-120%	TW-102AN	50-120%	TG-103AN	50-120%	E-162SN2 + E-102SN2
RAS 10/12HNP(E)	0.8HP	8	50-120%	50-120%	TW-102AN	50-120%	TG-103AN	50-120%	E-162SN2 + E-102SN2

Utopia IVX Premium (3-12HP)

Model	Minimum indoor unit size	Maximum quantity of indoor units	4 units				5 units	
			Header Piping		Line Branch Piping		Line Branch Piping	
			Combination	Joint(s)	Combination	Joint(s)	Combination	Joint(s)
RAS 3HVNPE	0.8HP	3	Not possible		Not possible		Not possible	
RAS 4H(V)NPE	0.8HP	5	50-120%	Main Joint: TW-52AN Second Joints: Capacity after branch ≤ 1.5HP: TW-22AN Capacity after branch ≥ 1.8HP: TW-52AN	50-120%	3 x E-102SN2	50-100% (*)	4 x E 102SN2
RAS 5H(V)NPE RAS 6H(V)NPE	0.8HP	6	50-120%	Main Joint: TW-52AN Second Joints: Capacity after branch ≤ 1.5HP: TW-22AN Capacity after branch ≥ 1.8HP: TW-52AN	50-120%	3 x E-102SN2	50-100% (*)	4 x E 102SN2
RAS 8HNP(E) RAS 10HNP(E) RAS 12HNP(E)	0.8HP	8	50-120%	Main Joint: TW-102AN Second Joints: Capacity after branch ≤ 1.5HP: TW-22AN Capacity after branch ≥ 1.8HP: TW-52AN	50-120%	2 x E-162SN2 + E-102SN2	50-100% (*)	3 x E-162SN2 + E-102SN2

Utopia IVX Premium (3-12HP)

Model	Minimum indoor unit size	Maximum quantity of indoor units	6 units		7 units		8 units	
			Line Branch Piping		Line Branch Piping		Line Branch Piping	
					x7		x8	
			Combination	Joint(s)	Combination	Joint(s)	Combination	Joint(s)
RAS 3HVNPE	0.8HP	3	Not Possible		Not Possible		Not Possible	
RAS 4H(V)NPE	0.8HP	5	Not Possible		Not Possible		Not Possible	
RAS 5H(V)NPE RAS 6H(V)NPE	0.8HP	6	50 ~ 100% (*)	5 x E-102SN2	Not Possible		Not Possible	
RAS 10/12HNP(E)	0.8HP	8	50 ~ 100% (*)	4 x E-162SN2 + E-102SN2	50 ~ 100% (*)	5 x E-162SN2 + E-102SN2	50 ~ 100% (*)	6 x E-162SN2 + E-102SN2

(*) Follow Table 1 in order to optimise the indoor unit balance.
(**) When installing indoor units RCI-FSN3 or RCI-FSN3Ei, only single combinations are allowed.
(***) When installing several indoor units of RCI-FSN3 or RCI-FSN3Ei, minimum allowed capacity is 1.5HP.

Utopia IVX Premium - Multi Combinations

Notes

1.**Table 1:** For Multi split systems please refer to the table below regarding balancing indoor units capacity.

Indoor unit with the highest capacity	HP	0.8	1.0	1.3	1.5	1.8	2.0	2.3	2.5	3.0	4.0	5.0	6.0
Indoor unit with the lowest capacity	HP	0.8				1.0			1.3		1.5	1.8	2.0

2. **Table 2:** In the systems where the models are all 4-Way RCI-FSN3, the maximum capacity ratio of connected indoor units allowed is 100%, and the maximum number of connected indoor units are:

Utopia IVX Premium	HP	3.0	4.0	5.0	6.0	8.0	10.0	12.0
Maximum Quantity of indoor units	No.	2	4			4		

3. Single split one to one indoor unit combinations using RCIM 2.0FSN2E, RPF(I) 2.0FSN2E or RPF(I) 2.5FSN2E, with IVX Premium and IVX Comfort are not allowed.

4. When installing in cold places (where the outside temperature can drop to -10°C) or in areas with high demand for heating, install a number of indoor units no higher than that recommended and ensure a capacity ratio less than 100%.

Piping lengths

Maximum length of the piping		3.0	4.0	5.0	6.0	8.0	10.0	12.0
Length	Actual length of the pipe	50	75	75	75	100	100	100
	Equivalent pipe length	70	95	95	95	125	125	125
Height	Outdoor unit higher than indoor unit	30	30	30	30	30	30	30
	Indoor unit higher than outdoor unit	20	20	20	20	20	20	20
	Height difference between indoor units	10	10	10	10	10	10	10

SYSTEM FREE | -20 +15 (2 / 2.5HP) | -10 +15 (3 / 10HP) | -5 +43 | DC INVERTER

Utopia ES

Outdoor Unit		RAS 5HVRNS2E	RAS 5HRNS2E	RAS 6HVRNS2E
Power supply (1Ø/3Ø)		230V / 1Ph / 50Hz	400V / 3Ph / 50Hz	230V / 1Ph / 50Hz
Nominal Cooling Capacity (min - max)	kW	12.5 (5.7 - 14.0)	12.5 (5.7 - 14.0)	14.0 (6.0 - 16.0)
Nominal Heating Capacity (min - max)	kW	14.0 (6.0 - 18.0)	14.0 (6.0 - 18.0)	16.0 (6.0 - 18.0)
UK Cooling Capacity (sensible)(3)	kW	12.7 (9.1)	12.7 (9.1)	15.2 (10.5)
Minimum - Maximum Indoor Units		1 - 2	1 - 2	1 - 3
Seasonal Efficiency SEER(2)		na	na	na
Energy Efficiency Class	kWh/yr	*	*	*
Annual Energy Consumption		na	na	na
Seasonal Efficiency SCOP(2) (Average Climate)		na	na	na
Energy Efficiency Class	kWh/yr	*	*	*
Annual Energy Consumption		na	na	na
Nominal Load Efficiency EER / COP(2)		2.91 / 3.24	2.91 / 3.24	2.45 / 2.88
Energy Class (Cool/Heat)		C / C	C / C	E / D
Noise level cooling (sound pressure) (night mode)	dB(A)	52 (50)	52 (50)	55 (53)
Noise level heating (sound pressure)	dB(A)	54	54	57
Noise level (sound power)(1)	dB(A)	71	71	72
Air flow (Cooling / Heating)	m^3/h	4080	4080	4800
Dimensions (H x W x D)	mm	800x950x370	800x950x370	800x950x370
Weight	kg	83	83	83
Piping diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Minimum Piping Length	m	5	5	5
Maximum Piping Length / Height Difference	m	50 / 30	50 / 30	50 / 30
Current Quantity of Refrigerant	kg	2.9	2.9	2.9
Chargeless / Additional Refrigerant Charge	m / g/m	30 / 60	30 / 60	30 / 60
Recommended fuse size	A	32	16	32
Starting current (1Ø/3Ø)	A	<10	<10	<10
Running current (cooling / heating) (1Ø/3Ø)	A	18.4 / 18.5	6.5 / 6.6	24.6 / 23.8
Interconnecting Cables	No.	LNE + 2 core screened		
Working Range (cooling / heating)	°C	-5°C~43(db)°C / -10°C~15(wb)°C		
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll

(1) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the “cooling” mode operation in accordance to EN12102

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C)

(2) Data specified includes connection to RCI-FSN3 indoor unit

(3) Data specified includes connection to RCI-FSN3 indoor unit

Did you know?

Our Utopia Splits can connect to any indoor units from our System Free range for ultimate flexibility

Utopia Split Systems

RAS-H(V)NCE

RAS-HNC(E)

Utopia ES

Outdoor Unit		RAS 6HRNS2E	RAS 8HRNSE	RAS 10HRNSE
Power supply (1Ø/3Ø)		400V / 3Ph / 50Hz		
Nominal Cooling Capacity (min - max)	kW	14.0 (6.0 - 16.0)	20.0 (9.0 - 22.4)	25.0 (11.2-28.0)
Nominal Heating Capacity (min - max)	kW	16.0 (6.0 - 18.0)	22.4 (8.3 - 25.0)	28.0 (9.0 - 31.5)
UK Cooling Capacity (sensible)(3)	kW	15.2 (10.5)	20.1 (15.5)	24.9 (17.9)
Minimum - Maximum Indoor Units		1 - 3	1 - 4	1 - 4
Seasonal Efficiency SEER(2)		na	na	na
Energy Efficiency Class	kWh/yr	*	*	*
Annual Energy Consumption		na	na	na
Seasonal Efficiency SCOP(2) (Average Climate)		na	na	na
Energy Efficiency Class	kWh/yr	*	*	*
Annual Energy Consumption		na	na	na
Nominal Load Efficiency EER / COP(2)		2.45 / 2.88	3.01 / 3.42	2.81 / 3.21
Energy Class (Cool/Heat)		E / D	B / B	C / C
Noise level cooling (sound pressure) (night mode)	dB(A)	55 (53)	53 (51)	60 (56)
Noise level heating (sound pressure)	dB(A)	57	55	62
Noise level (sound power)(1)	dB(A)	72	71	78
Air flow (Cooling / Heating)	m^3/h	4800	7620	8760
Dimensions (H x W x D)	mm	800x950x370	1380x950x370	1380x950x370
Weight	kg	83	135	141
Piping diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 11/8	1/2 / 11/8
	mm	9.53 / 15.88	9.53 / 28.61	12.07 / 28.61
Minimum Piping Length	m	5	5	5
Maximum Piping Length / Height Difference	m	50 / 30	50 / 30	50 / 30
Current Quantity of Refrigerant	kg	2.9	6.0	6.2
Chargeless / Additional Refrigerant Charge	m / g/m	30 / 60	30 / Calculate	30 / Calculate
Recommended fuse size	A	16	25	25
Starting current (1Ø/3Ø)	A	<10	<10	<10
Running current (cooling / heating) (1Ø/3Ø)	A	8.7 / 8.4	10.8 / 10.7	11.2 / 11.3
Interconnecting Cables	No.	LNE + 2 core screened		
Working Range (cooling / heating)	°C	-5°C~43(db)°C / -10°C~15(wb)°C		
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll

(1) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the “cooling” mode operation in accordance to EN12102

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C)

(2) Data specified includes connection to RCI-FSN3 indoor unit

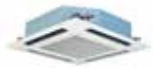
(3) Data specified includes connection to RCI-FSN3 indoor unit

SYSTEM FREE | -20 +15 (2 / 2.5HP) | -10 +15 (3 / 10HP) | -5 +43 | DC INVERTER

Utopia ES

Standard Cassette (4-way)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER / SCOP	EER / COP
RCI 5.0FSN3Ei	RAS 5HVRNS2E	P-N23NA	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.4)	220V -1ph	n/a	2.91 / 3.24 (C / C)
RCI 5.0FSN3Ei	RAS 5HRNS2E	P-N23NA	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.4)	380V - 3ph	n/a	2.91 / 3.24 (C / C)
RCI 6.0FSN3Ei	RAS 6HVRNS2E	P-N23NA	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (11.1)	220V -1ph	n/a	2.45 / 2.88 (E / D)
RCI 6.0FSN3Ei	RAS 6HRNS2E	P-N23NA	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (11.1)	380V - 3ph	n/a	2.45 / 2.88 (E / D)

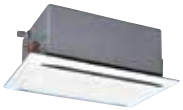


Hi-Efficiency Cassette (4-way) (Standard Grille)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER / SCOP	EER / COP
RCI 3.0FSN3	RAS 3HVNC	AP-160NA1	PC-ART	7.1 (3.2 - 8.0)	8.0 (3.5 - 10.6)	7.4 (6)	220V -1ph	5.14 / 3.88 (A / A)	3.05 / 3.88 (B / A)
RCI 4.0FSN3	RAS 4HVNCE	AP-160NA1	PC-ART	10 (4.5 - 11.2)	11.2 (5.0 - 14.0)	10.3 (7.9)	220V -1ph	4.95 / 3.85 (B / A)	3.69 / 4.16 (A / A)
RCI 4.0FSN3	RAS 4HNCE	AP-160NA1	PC-ART	10 (4.5 - 11.2)	11.2 (5.0 - 14.0)	10.3 (7.9)	380V - 3ph	4.85 / 3.85 (B / A)	3.69 / 4.16 (A / A)
RCI 5.0FSN3	RAS 5HVNCE	AP-160NA1	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.1)	220V -1ph	n/a	tbc
RCI 5.0FSN3	RAS 5HNCE	AP-160NA1	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.1)	380V - 3ph	n/a	tbc
RCI 6.0FSN3	RAS 6HVNCE	AP-160NA1	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (10.5)	220V -1ph	n/a	tbc
RCI 6.0FSN3	RAS 6HNCE	AP-160NA1	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (10.5)	380V - 3ph	n/a	tbc

Hi-Efficiency Cassette (4-way) (Motion Sensor Grille)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER / SCOP	EER / COP
RCI 3.0FSN3	RAS 3HVNC	AP-160NAE	PC-ART	7.1 (3.2 - 8.0)	8.0 (3.5 - 10.6)	7.4 (6)	220V -1ph	5.14 / 3.88 (A / A)	3.05 / 3.88 (B / A)
RCI 4.0FSN3	RAS 4HVNCE	AP-160NAE	PC-ART	10 (4.5 - 11.2)	11.2 (5.0 - 14.0)	10.3 (7.9)	220V -1ph	4.95 / 3.85 (B / A)	3.69 / 4.16 (A / A)
RCI 4.0FSN3	RAS 4HNCE	AP-160NAE	PC-ART	10 (4.5 - 11.2)	11.2 (5.0 - 14.0)	10.3 (7.9)	380V - 3ph	4.85 / 3.85 (B / A)	3.69 / 4.16 (A / A)
RCI 5.0FSN3	RAS 5HVNCE	AP-160NAE	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.1)	220V -1ph	n/a	tbc
RCI 5.0FSN3	RAS 5HNCE	AP-160NAE	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.1)	380V - 3ph	n/a	tbc
RCI 6.0FSN3	RAS 6HVNCE	AP-160NAE	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (10.5)	220V -1ph	n/a	tbc
RCI 6.0FSN3	RAS 6HNCE	AP-160NAE	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (10.5)	380V - 3ph	n/a	tbc



Standard Cassette (2-way)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER / SCOP	EER / COP
RCD 5.0FSN2	RAS 5HVRNS2E	P-N46DNA	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (8.8)	220V -1ph	n/a	3.03 / 3.31 (B / C)
RCD 5.0FSN2	RAS 5HRNS2E	P-N46DNA	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (8.8)	380V - 3ph	n/a	3.03 / 3.31 (B / C)

Ducted In the Ceiling

Indoor Unit	Outdoor Unit	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER / SCOP	EER / COP
RPI 5.0FSN4E	RAS 5HVRNS2E	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.1)	220V -1ph	n/a	2.93 / 3.33 (C / C)
RPI 5.0FSN4E	RAS 5HRNS2E	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.1)	380V - 3ph	n/a	2.93 / 3.33 (C / C)
RPI 6.0FSN4E	RAS 6HVRNS2E	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (10.9)	220V -1ph	n/a	2.75 / 3.23 (D / C)
RPI 6.0FSN4E	RAS 6HRNS2E	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (10.9)	380V - 3ph	n/a	2.75 / 3.23 (D / C)
RPI 8.0FSN3E	RAS 8HRNS2E	PC-ART	20.0 (9.0 ~ 22.4)	22.4 (8.3 ~ 25.0)	20.1 (15.5)	380V - 3ph	n/a	2.57 / 3.07 (E / D)
RPI 10.0FSN3E	RAS 10HRNS2E	PC-ART	25.0 (11.2 ~ 28.0)	28.0 (9.0 ~ 31.5)	24.9 (19.7)	380V - 3ph	n/a	2.41 / 3.03 (E / D)

Ceiling Suspended

Indoor Unit	Outdoor Unit	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	SEER / SCOP	EER / COP
RPC 5.0FSN2E	RAS 5HVRNS2E	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.1)	220V -1ph	n/a	2.80 / 3.09 (D / D)
RPC 5.0FSN2E	RAS 5HRNS2E	PC-ART	12.5 (5.7 ~ 14.0)	14.0 (5.0 ~ 18.0)	12.7 (9.1)	380V - 3ph	n/a	2.80 / 3.09 (D / D)
RPC 6.0FSN2E	RAS 6HVRNS2E	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (10.9)	220V -1ph	n/a	2.41 / 2.83 (E / D)
RPC 6.0FSN2E	RAS 6HRNS2E	PC-ART	14.0 (6.0 ~ 16.0)	16.0 (5.0 ~ 20.0)	15.2 (10.9)	380V - 3ph	n/a	2.41 / 2.83 (E / D)

All pricing includes PC-ARF wired Remote Controller (ordered as individual item)

(1) Data calculated in accordance to prEN14825 and the Commission Communication 2012/C 172/01

Utopia ES - Multi Combinations

Utopia ES (3 - 10HP)										
Model	Minimum indoor unit size	Maximum quantity of indoor units	1 unit	2 units		3 units		4 units		
						Header Piping		Header Piping		
				Combination	Joint(s)	Combination	Joint(s)	Combination	Joint(s)	
RAS 5H(V)RNS2E	(1.8)HP	2	5	2.5/2.5 3.0/(2.3) 3.0/(1.8) 3.0/2.0	TE-56N1	Not Possible		Not Possible		
RAS 6H(V)RNS2E	1.5HP	3	6	2.5/3.0 3.0/3.0	TE-56N1	1.5/1.5/2.5 (1.8)/(1.8)/(1.8) (1.8)/(1.8)/(2.0) (1.8)/2.0/2.0 2.0/2.0/2.0	TRE-06N	Not Possible		
RAS 8HRNSE	2.0HP	4	8	4.0/4.0	TE-08N	3.0/3.0/3.0	TRE-810N	2.0/2.0/2.0/2.0	TE-08N + 2 x TE04N	
RAS 10HRNSE	2.5HP	4	10	5.0/5.0	TE-08N	Not Possible		2.5/2.5/2.5/2.5	TE-08N + 2 x TE56N	

( ): Adjusted capacity: In the 2.0 and 2.5HP RPI, RCI, RCD, RPK, RPC units, the capacity can be adjusted to 1.8 and 2.3HP respectively by configuring the DSW3.

Piping lengths

Maximum length of the piping		5.0	6.0	8.0	10.0
Length	Actual length of the pipe	50	50	50	50
	Equivalent pipe length	70	70	70	70
Height	Outdoor unit higher than indoor unit	30	30	30	30
	Indoor unit higher than outdoor unit	20	20	20	20
	Height difference between indoor units	0.5	0.5	0.5	0.5

SYSTEM FREE - 15 +15 - 5 +43

Utopia IVX Centrifugal

RASC-H(V)RN(M)E

Outdoor Unit		RASC 5HVRNM1E	RASC 10HRNM1E
Power supply (1Ø/3Ø)		230V / 1Ph / 50Hz	400V / 3Ph / 50Hz
Nominal Cooling Capacity (min - max)	kW	12.5 (4.7 - 14.0)	23.0 (10.3 - 25.0)
Nominal Heating Capacity (min - max)	kW	14.0 (5.0 - 16.0)	25.0 (9.4 - 26.0)
UK Cooling Capacity (sensible)(3)	kW	12.6 (9.3)	22.7 (16.3)
Minimum - Maximum Indoor Units		1 - 3	1 - 4
Nominal Load Efficiency EER / COP(2)		2.77 / 3.15	2.88 / 3.09
Energy Class (Cool/Heat)		D / D	C / D
Noise level cooling (sound pressure) (night mode)	dB(A)	55 (51)	56 (52)
Noise level heating (sound pressure)	dB(A)	56	57
Noise level (sound power)(1)	dB(A)	71	75
Air flow (Cooling / Heating)	m^3/h	3900	6300
Static Pressure (nominal / max)	Pa	50 / 100	63 / 130
Dimensions (H x W x D)	mm	430x1250x1300	640x1850x985
Weight	kg	176	269
Piping diameter (Liquid / Gas)	Inch	3/8 / 5/8	1/2 / 11/8
	mm	9.53 / 15.88	12.07 / 28.61
Minimum Piping Length	m	5	5
Maximum Piping Length / Height Difference	m	70 / 30	50 / 30
Current Quantity of Refrigerant	kg	3.1	5.0
Chargeless / Additional Refrigerant Charge	m / g/m	15 / Calculate	7.5 / Calculate
Recommended fuse size	A	40	40
Starting current (1Ø/3Ø)	A	<10	<10
Running current (cooling / heating) (1Ø/3Ø)	A	22.0 / 21.6	20.0 / 20.2
Interconnecting Cables	No.	LNE + 2 core screened	LNE + 2 core screened
Working Range (cooling / heating)	°C	-5°C~46(db°C / -15°C / +15(wb)°C	-5°C~46(db)°C / -15°C / +15(wb)°C
Refrigerant / GWP		R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll

(1) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the “cooling” mode operation in accordance to EN12102

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C)

(3) Data specified includes connection to RCI-FSN3E indoor unit

Did you know?

Our Utopia Splits can connect to any indoor units from our System Free range for ultimate flexibility

Utopia IVX Centrifugal

Standard Cassette (4-way)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	EER	COP	
RCI 5.0FSN3Ei	RASC 5HVRNM1E	P-N23NA	PC-ARF	12.5 (4.7 ~ 14.0)	14.0 (5.0 ~ 16.0)	12.6 (9.3)	220V -1ph	2.71	3.10	

Hi-Efficiency Cassette (4-way) (Standard Grille)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	EER	COP	
RCI 5.0FSN3	RASC 5HVRNM1E	AP-160NA1	PC-ARF	12.5 (4.7 ~ 14.0)	14.0 (5.0 ~ 16.0)	12.6 (9.3)	220V -1ph	2.71	3.10	

Hi-Efficiency Cassette (4-way) (Motion Sensor Grille)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	EER	COP	
RCI 5.0FSN3	RASC 5HVRNM1E	AP-160NAE	PC-ARF	12.5 (4.7 ~ 14.0)	14.0 (5.0 ~ 16.0)	12.6 (9.1)	220V -1ph	2.77	3.15	

Standard Cassette (2-way)

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	EER	COP	
RCD 5.0FSN2	RASC 5HVRNM1E	P-N46DNA	PC-ARF	12.5 (4.7 ~ 14.0)	14.0 (5.0 ~ 16.0)	12.6 (8.7)	220V -1ph	tbc	tbc	

Ducted In the Ceiling

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	EER	COP	
RPI 5.0FSN4E	RASC 5HVRNM1E	-	PC-ARF	12.5 (4.7 ~ 14.0)	14.0 (5.0 ~ 16.0)	12.6 (9.1)	220V -1ph	2.61	2.97	
RPI 10.0FSN3E	RASC 10HRNM1E	-	PC-ARF	23.0 (10.3 ~ 25.0)	25.0 (9.4 ~ 26.0)	22.7 (17.9)	380V - 3ph	2.50	2.75	

Ceiling suspended

Indoor Unit	Outdoor Unit	Grille	Controller	Nominal Cooling	Nominal Heating	UK Cooling (Sen)	Phase	EER	COP	
RPC 5.0FSN2E	RASC 5HVRNM1E	-	PC-ARF	12.5 (4.7 ~ 14.0)	14.0 (5.0 ~ 16.0)	12.6 (9.1)	220V -1ph	tbc	tbc	

All pricing includes PC-ARF wired Remote Controller (ordered as individual item)

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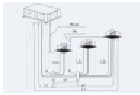
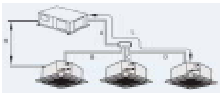
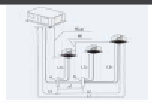
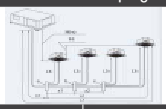
Utopia IVX Centrifugal - Multi Combinations

RASC-H(V)RNM1E

Utopia IVX Centrifugal (5 ~ 10HP)									
Model	1 Unit	2 Units				3 Units			
		Header Piping		Line Branch Piping		Header Piping		Line Branch Piping	
									
	Combination	Combination	Header Joint	Combination	Joint(s)	Combination	Joint(s)	Combination	Joint(s)
RASC 5HVRNM1E	5	2.5/2.5 3.0/(2.3) 4.0/1.5	TE-56N1	2.5/2.5 3.0/(2.3) 4.0/1.5	E-102SN2	(1.8)/(1.8)/1.5	TRE-46N1	(1.8)/(1.8)/1.5	E-162SN2 + E-102SN2
RASC 10HRNM1E	10	5.0/5.0 6.0/4.0 8.0/2.0	TE-10N (x)	5.0/5.0 6.0/4.0 8.0/2.0	E-162SN2	3.0/3.0/3.0 4.0/3.0/3.0 6.0/2.0/2.0	TRE-812N1	3.0/3.0/3.0 4.0/3.0/3.0 6.0/2.0/2.0	E-162SN2 + E-102SN2

Utopia IVX Centrifugal (5 ~ 10HP)				
Model	4 Units			
	Header Piping		Line Branch Piping	
				
	Combination	Joint(s)	Combination	Joint(s)
RASC 5HVRNM1E	Not Possible	Not Possible	Not Possible	Not Possible
RASC 10HRNM1E	2.5/2.5/2.5/2.5 3.0/3/0/2.5/2.0 3.0/2.5/2.5/2.5 3.0/3.0/2.0/2.0 3.0/2.5/2.5/2.0 3.0/3.0/(2.3)/(2.3) 3.0/3.0/(2.3)/2.0 3.0/2.5/2.5/(2.3)	QE-812N1 Main Joint: TE-10N Second Joints: Cap. after branch ≤ 1.5HP: TE-03N1 Cap after branch ≥ 2.3HP: TE-03N1	2.5/2.5/2.5/2.5 3.0/3/0/2.5/2.0 3.0/2.5/2.5/2.5 3.0/3.0/2.0/2.0 3.0/2.5/2.5/2.0 3.0/3.0/(2.3)/(2.3) 3.0/3.0/(2.3)/2.0 3.0/2.5/2.5/(2.3)	2 x E-162SN2 + E-102SN2

(x) In case of (8.0/2.0 HP) combination use the E-102SN2.

() Adjusted capacity: In the 2.0 and 2.5HP RPI, RCI, RCD, RPK, RPC units, the capacity can be adjusted to 1.8 and 2.3HP respectively by configuring the DSW3.

Piping lengths

Maximum length of the piping		5.0	10.0
Length	Actual length of the pipe	70	50
	Equivalent pipe length	90	70
Height	Outdoor unit higher than indoor unit	30	30
	Indoor unit higher than outdoor unit	20	20
	Height difference between indoor units	3	3

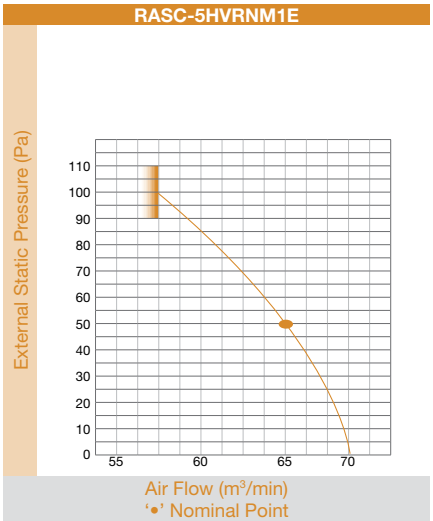
Model	Liquid	6.35 (1/4)		9.53 (3/8)					12.7 (1/2)					15.88 (5/8)		
	Gas	9.53 (3/8)	12.7 (1/2)	12.7 (1/2)	15.88 (5/8)	19.05 (3/4)	22.2 (7/8)	25.4 (1)	15.88 (5/8)	19.05 (3/4)	22.2 (7/8)	25.4 (1)	28.6 (1 1/8)	22.2 (7/8)	25.4 (1)	28.6 (1 1/8)
RASC 5HVRNM1E		5 (2)	5 (2)	35 (1)	70	-	-	-	25 (3)	-	-	-	-	-	-	-
RASC 10HRNM1E		-	-	-	-	-	-	-	-	-	25 (1)	50	25	25 (1)(3)	25 (3)	25 (3)

(1) If the gas pipe is smaller, the cooling performance drops, and the operating range is reduced because the pressure loss in the gas pipe increases.
(2) Reducing liquid pipe size will narrow operation range due to the relation with expansion valve capacity. In these cases, set the DSW2-1 to ON position.
(3) If the liquid pipe is larger refrigerant has to be added.

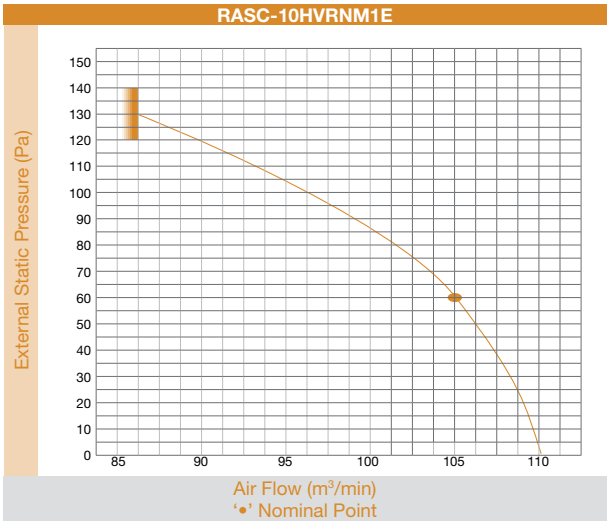
Standard Specification

Utopia IVX Centrifugal - Multi Combinations

RASC-5HVRNM1E



RASC-10HVRNM1E



Controls

Model	Description
PC-ART	Standard Wired Remote Controller (inc. 7 Day Time Clock)
PC-ARF	Advanced Wired LED Controller (inc 7 Day Time Clock)
PC-ARH	Simple Wired Remote Controller
PC-LH3A	Wireless Remote Controller (Receiver kit required inc. with RPK-FSN2M)
PC-LH3B	Wireless Remote Controller (RCI-FSN3, RPK-FSN3M) - Receiver kit required
PC-ALH3	Grille Receiver Kit (RCI-FSN3, Grilles P-AP160NA1 & P-AP160NAE)
PC-ALHN	Receiver Kit panel mounted (RCI-FSN3Ei)
PC-ALHD	Receiver Kit panel mounted (RCD-FSN3E)
PC-ALHC	Receiver Kit panel mounted (RCIM-FSN3E)
PC-ALHZ	Receiver Kit wall mounted (All System Free Indoor Units)
PC-ALHZF	Receiver Kit wall mounted (RPK-HSN(H)3M, RCI-FSN3)

PC-ART

PC-ARF

PC-ARH

Piping Kits

Model	Description
TE-03N1	Twin Pipe Kit (3hp) (IVX Comfort, Centrifugal & Utopia ES)
TE-04N1	Twin Pipe Kit (4hp) (IVX Comfort, Centrifugal & Utopia ES)
TE-56N1	Twin Pipe Kit (5-6hp) (IVX Comfort, Centrifugal & Utopia ES)
TE-08N	Twin Pipe Kit (8hp) (IVX Comfort, Centrifugal & Utopia ES)
TE-10N	Twin Pipe Kit (10-12hp) (IVX Comfort, Centrifugal & Utopia ES)
TRE-46N1	Triple Pipe Kit (4-6hp) (IVX Comfort, Centrifugal & Utopia ES)
TRE-812N1	Triple Pipe Kit (8-12hp) (IVX Comfort, Centrifugal & Utopia ES)
QE-812N1	Quad Pipe Kit (8-12hp) (IVX Comfort, Centrifugal & Utopia ES)
E-102SN2	Piping Kit (3-12hp) (IVX Comfort, Centrifugal & Utopia ES)
E-162SN2	Piping Kit (3-12hp) (IVX Comfort, Centrifugal & Utopia ES)
TW-22AN	Twin Pipe Kit (2-2.5hp) (IVX Premium)
TW-52AN	Twin Pipe Kit (3-6hp) (IVX Premium)
TW-102AN	Twin Pipe Kit (8-12hp) (IVX Premium)
TG-53AN	Triple Pipe Kit (4-6hp) (IVX Premium)
TG-103AN	Triple Pipe Kit (8-12hp) (IVX Premium)

Set Free VRF Systems

	Mini 2-pipe	Sideflow 2-pipe	Modular 2 or 3-pipe	
			Std - Efficiency	Hi-Efficiency
	RAS 4 ~ 6FS(V)N(Y)2E	RAS 8 ~ 12FSNM	RAS 8 ~ 54FSXN	RAS 5 ~ 36FSXNH-(P)
Nominal Cooling Capacity (kW)	11.2 ~ 15.5	22.4 ~ 33.5	22.4 ~ 150.0	14.0 ~ 100.0
Nominal Heating Capacity (kW)	12.5 ~ 18.0	25.0 ~ 37.5	25.0 ~ 165.0	16.0 ~ 112.0
Min - Max Indoor Units(2)	1 - 12	1 - 10	1 - 64	1 - 59
Connected Capacity (Min - Max)	50% - 130%	50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP(1)	4.12 / 4.17	3.56 / 4.24	3.85 / 4.17	4.70 / 4.73
Energy Class (Cool/Heat)	A / A	A / A	A / A	A / A
Refrigerant / GWP	R410A / 1975	R410A / 1975	R410A / 1975	R410A / 1975
Operating Range (Cooling)	-5ºC / +46ºC	-5ºC / +46ºC	-5ºC / +46ºC	-5ºC / +46ºC
Operating Range (Heating)	-20(wb)ºC / +15(wb)ºC	-20(wb)ºC / +15(wb)ºC	-20(wb)ºC / +15(wb)ºC	-15(wb)ºC / +15(wb)ºC
Remote Controller Type	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired

(1) Selected Models
(2) Maximum indoor unit quantity dependant on Outdoor Capacity

Did you know?

Cold Draft Prevention is standard across the Set Free VRF range

Features and Benefits

FS(V)(Y)N2E Mini 2-pipe
RAS-FSVN2E and RAS-FSNY2E

- Capacities from 11.2kW to 18.0kW
- Compact design
- Connect up to 9 indoors per outdoor unit, minimising pipework required, with individual control
- New DC Inverter scroll compressor
- Single phase
- Low sound pressure of 42dB(A)
- High energy efficiency.

FSNM Sideflow 2-pipe
RAS-FSNM

- Capacities from 22.4kW to 37.5kW
- Compact design with side flow discharge
- Connect up to 10 indoors per outdoor unit, minimising pipework required, with individual control
- Connection ratios between 50% and 130% in relation to outdoor capacity
- Three phase
- Low sound pressure of 42dB(A)
- High energy efficiency.

FSXN Modular 2 or 3-pipe
RAS-FSXN

- Capacities from 22.4kW to 165.0kW
- Lightweight and modular 2-pipe heat pump or 3-pipe heat recovery from a single unit to adapt to customer requirements (requires CH Box)
- Low noise – select from 3 settings with up to 8dB noise reduction.

FSXNH Modular High efficiency 2 or 3-pipe
RAS-FSXNH

- Capacities from 14.0kW to 100.0kW
- Market-leading energy efficiency
- Japanese Energy Efficiency and Conservation Award 2013 winner
- Lightweight and modular 2-pipe heat pump 3-pipe heat recovery from a single unit to adapt to customer requirements (requires CH Box)
- Smallest capacity 3-pipe heat recovery unit on the market
- Piping lengths up to 1000m and improved height difference
- Connection ratios up to 150% in relation to outdoor capacity.

Qualified for Energy Technology List ™

Compatible with heat recovery modules, active heat exchangers, and air curtains.

Compatible with H-LINK II and CS Net Web.

Optional integration with all leading BMS protocols.

SYSTEM FREE - 20 +15 - 5 +46 DC INVERTER

RAS-FS(V)(Y)N2E

Mini 2-pipe

Outdoor Unit		RAS-4FSVN2E	RAS-4FSNY2E	RAS-5FSVN2E	RAS-5FSNY2E	RAS-6FSVN2E	RAS-6FSNY2E
Power supply (1Ø/3Ø)		230V / 1Ph / 50Hz	400V / 3Ph / 50Hz	230V / 1Ph / 50Hz	400V / 3Ph / 50Hz	230V / 1Ph / 50Hz	400V / 3Ph / 50Hz
Nominal Cooling Capacity (min - max)	kW	11.2 (5.6 - 11.2)	11.2 (5.6 - 11.2)	14.0 (7.0 - 14.0)	14.0 (7.0 - 14.0)	15.5 (7.8 - 15.5)	15.5 (7.8 - 15.5)
Nominal Heating Capacity (min - max)	kW	12.5 (6.3 - 12.5)	12.5 (6.3 - 12.5)	16.0 (8.0 - 16.0)	16.0 (8.0 - 16.0)	18.0 (9.0 - 18.0)	18.0 (9.0 - 18.0)
UK Cooling Capacity	kW	9.9 (4.9 ~ 9.9)	9.9 (4.9 ~ 9.9)	12.5 (6.2 ~ 12.5)	12.5 (6.2 ~ 12.5)	13.6 (6.8 ~ 13.6)	13.6 (6.8 ~ 13.6)
Minimum - Maximum Indoor Units(1)		1 - 8	1 - 8	1 - 10	1 - 10	1 - 12	1 - 12
Minimum - Maximum connected capacity		50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP(2)		4.07 / 4.13	4.12 / 4.17	3.61 / 3.81	3.65 / 3.85	3.32 / 3.67	3.35 / 3.71
Energy Class (Cool/Heat)		A / A	A / A	A / A	A / A	A / A	A / A
Noise level cooling (sound pressure) (night mode)	dB(A)	49 (45)	49 (45)	51 (47)	51 (47)	51 (48)	51 (48)
Noise level heating (sound pressure)	dB(A)	51	51	53	53	53	53
Noise level (sound power)(3)	dB(A)	tbc	tbc	tbc	tbc	tbc	tbc
Air flow (Cooling / Heating)	m^3/h	5400	5400	5400	5400	6000	6000
Dimensions (H x W x D)	mm	1380x950x370	1380x950x370	1380x950x370	1380x950x370	1380x950x370	1380x950x370
Weight	kg	100	102	100	102	100	102
Piping diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Total Piping Length / Height Difference	m	125 / 30	125 / 30	135 / 30	135 / 30	135 / 30	135 / 30
Max Piping Length (outdoor to indoor)	m	75	75	75	75	75	75
Current Quantity of Refrigerant	kg	3.6	3.6	3.6	3.6	3.6	3.6
Chargeless / Additional Refrigerant Charge	m / g/m	calculate	calculate	calculate	calculate	calculate	calculate
Recommended fuse size	A	32	16	32	16	32	16
Starting current	A	<10	<10	<10	<10	<10	<10
Running current (cooling / heating)	A	12.2 / 13.4	4.1 / 4.6	17.2 / 18.6	5.8 / 6.3	20.7 / 21.7	7.0 / 7.4
Working Range (cooling / heating)	°C	-5°C~46(db)°C / -20°C~15(wb)°C					
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll	Scroll	Scroll

(1) Maximum Indoor Units - restrictions apply see Technical Catalogue

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

(3) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

Did you know?

Our Set Free VRF can connect to any indoor units from our System Free range for ultimate flexibility

RAS FSNM

DC INVERTER | -5 +46 | -20 +15 | SYSTEM FREE

Set Free VRF Systems

Sideflow 2-pipe

Outdoor Unit		RAS 8FSNM	RAS 10FSNM	RAS 12FSNM
Power supply		415V / 3Ph / 50Hz	415V / 3Ph / 50Hz	415V / 3Ph / 50Hz
Nominal Cooling Capacity	kW	22.4	28.0	33.5
Nominal Heating Capacity	kW	25.0	31.5	37.5
UK Cooling Capacity	kW	20.8	26.0	31.2
Minimum - Maximum Indoor Units[1]		1 - 10	1 - 10	1 - 10
Minimum - Maximum connected capacity		50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP[2]		3.56 / 4.24	3.37 / 4.04	3.13 / 3.79
Energy Class (Cool/Heat)		A / A	A / A	B / A
Noise level cooling (sound pressure) (night mode)	dB(A)	53 (tbc)	56 (tbc)	59 (tbc)
Noise level heating (sound pressure)	dB(A)	55	58	61
Noise level (sound power)[3]	dB(A)	tbc	tbc	tbc
Air flow (Cooling / Heating)	m^3/h	7260	9000	9780
Dimensions (H x W x D)	mm	1650x1100x390	1650x1100x390	1650x1100x390
Weight	kg	170	170	173
Piping diameter (Liquid / Gas)	Inch	3/8 / 3/4	1/2 / 7/8	1/2 / 1 1/8
	mm	9.52 / 19.05	12.70 / 22.20	12.70 / 28.60
Total Piping Length / Height Difference	m	250 / 40	250 / 40	250 / 40
Max Piping Length (outdoor to indoor)	m	100	100	100
Current Quantity of Refrigerant	kg	5.0	5.5	6.5
Chargeless / Additional Refrigerant Charge	m / g/m	calculate	calculate	calculate
Recommended fuse size	A	16	20	25
Starting current (1Ø/3Ø)	A	8	8	8
Running current (cooling / heating)	A	9.4 / 8.8	12.4 / 11.7	15.8 / 14.7
Working Range (cooling / heating)	°C	-5°C~46(db)°C / -20°C~15(wb)°C		
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll

(1) Maximum Indoor Units - restrictions apply see Technical Catalogue

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

(3) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

SYSTEM FREE - 20 +15 - 5 +43 DC INVERTER

Modular 2 or 3-pipe

RAS FSXN

Outdoor Unit		RAS 8FSXN	RAS 10FSXN	RAS 12FSXN	RAS 14FSXN	RAS 16FSXN	RAS 18FSXN
Outdoor Combination		-	-	-	-	-	-
Power supply		400V / 3Ph / 50Hz					
Nominal Cooling Capacity	kW	22.4	28.0	33.5	40.0	45.0	50.0
Nominal Heating Capacity	kW	25.0	31.5	37.5	45.0	50.0	56.0
UK Cooling Capacity	kW	19.3	24.1	28.8	34.4	38.7	43.0
Maximum Indoor Units[1]		13	16	19	23	26	26
Minimum - Maximum connected capacity		50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP[2]		3.85 / 4.17	3.79 / 4.11	3.41 / 3.6	3.25 / 3.89	3.23 / 3.9	3.37 / 3.81
Energy Class (Cool/Heat)		A / A	A / A	A / A	A / A	A / A	A / A
Noise level (sound pressure) (night mode)	dB(A)	58 (53)	58 (53)	60 (55)	62 (57)	62 (57)	63 (58)
Noise level (sound power)[3]	dB(A)	tbc	tbc	tbc	tbc	tbc	tbc
Air flow (Cooling / Heating)	m^3/h	9300	10200	10500	11700	11700	11700
Dimensions (H x W x D)	mm	1720x950x765	1720x950x765	1720x950x765	1720x1210x765	1720x1210x765	1720x1210x765
Weight	kg	210	210	210	295	295	315
Piping diameter (Liquid / Gas x 2)	Inch	3/8 / (3/4/5/8)	3/8 / (7/8/3/4)	1/2 / (1 1/8/7/8)	1/2 / (1 1/8/7/8)	1/2 / (1 1/8/7/8)	5/8 / (1 1/8/7/8)
	mm	9.52 / (19.05/15.88)	9.53 / (22.20/19.05)	12.70 / (28.60/22.2)	12.70 / (28.60/22.2)	12.70 / (28.60/22.2)	15.88 / (28.60/22.2)
Total Piping Length / Height Difference	m	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50
Max Piping Length (outdoor to indoor)	m	165	165	165	165	165	165
Current Quantity of Refrigerant	kg	6.5	6.5	7.0	9.0	9.0	10.5
Chargeless / Additional Refrigerant Charge	m / g/m	calculate	calculate	calculate	calculate	calculate	calculate
Recommended fuse size	A	16	20	25	32	32	32
Starting current	A	8	8	8	95	95	113
Running current (cooling / heating)	A	9.3 / 9.6	11.9 / 12.3	15.7 / 16.7	20.2 / 18.8	22.6 / 20.8	24.1 / 23.8
Working Range (cooling / heating)	°C	-5°C~43(db)°C / -20°C~15(wb)°C					
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll	Scroll	Scroll

[1] Maximum Indoor Units - restrictions apply see Technical Catalogue

[2] Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

[3] Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

Did you know?

Our Set Free VRF can connect to any indoor units from our System Free range for ultimate flexibility

DC INVERTER | -5 +43 | -20 +15 | SYSTEM FREE

Set Free VRF Systems

RAS FSXN

Modular 2 or 3-pipe

Outdoor Unit		RAS 20FSXN	RAS 22FSXN	RAS 24FSXN	RAS 26FSXN	RAS 28FSXN	RAS 30FSXN
Outdoor Combination		8 + 12	8 + 14	10 + 14	12 + 14	14 + 14	14 + 16
Power supply		400V / 3Ph / 50Hz					
Nominal Cooling Capacity	kW	56.0	61.5	69.0	73.0	80.0	85.0
Nominal Heating Capacity	kW	63.0	69.0	77.5	82.5	90.0	95.0
UK Cooling Capacity	kW	48.2	52.9	59.3	62.8	68.8	73.1
Maximum Indoor Units(1)		33	36	40	43	47	50
Minimum - Maximum connected capacity		50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP(2)		3.58 / 3.81	3.62 / 4.04	3.37 / 3.89	3.38 / 3.75	3.25 / 3.89	3.24 / 3.90
Energy Class (Cool/Heat)		A / A	A / A	A / A	A / A	A / A	A / A
Noise level (sound pressure) (night mode)	dB(A)	62 (57)	63 (58)	63 (58)	64 (59)	65 (60)	65 (60)
Noise level (sound power)(3)	dB(A)	tbc	tbc	tbc	tbc	tbc	tbc
Air flow (Cooling / Heating)	m^3/h	9300 + 10500	9300 + 11700	10200 + 11700	10500 + 11700	11700 + 11700	11700 + 11700
Dimensions (H x W x D)	mm	1720x1920x765	1720x2180x765	1720x2180x765	1720x2180x765	1720x2440x765	1720x2440x765
Weight	kg	210 + 210	210 + 295	210 + 295	210 + 295	295 + 295	295 + 295
Piping diameter (Liquid / Gas x 2)	Inch	5/8 / (1 1/8/7/8)	5/8 / (1 1/8/11/8)	5/8 / (1 1/8/11/8)	3/4 / (1 1/4/11/8)	3/4 / (1 1/4/11/8)	3/4 / (1 1/4/11/8)
	mm	15.88 / (28.60/22.2)	15.88 / (28.60/28.60)	15.88 / (28.60/28.60)	19.05 / (31.75/28.60)	19.05 / (31.75/28.60)	19.05 / (31.75/28.60)
Total Piping Length / Height Difference	m	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50
Max Piping Length (outdoor to indoor)	m	165	165	165	165	165	165
Current Quantity of Refrigerant	kg	13.5	15.5	15.5	16.0	18.0	18.0
Chargeless / Additional Refrigerant Charge	m / g/m	calculate	calculate	calculate	calculate	calculate	calculate
Recommended fuse size	A	16 & 25	16 & 32	20 & 32	25 & 32	32 & 32	32 & 32
Starting current	A	24	106	111	114	118	122
Running current (cooling / heating)	A	25.0 / 26.5	27.7 / 27.6	33.3 / 32.2	35.1 / 35.5	40.4 / 37.6	42.8 / 39.6
Working Range (cooling / heating)	°C	-5°C~43(db)°C / -20°C~15(wb)°C					
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll	Scroll	Scroll

(1) Maximum Indoor Units - restrictions apply see Technical Catalogue

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

(3) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

SYSTEM FREE | - 20 +15 | - 5 +43 | DC INVERTER

Modular 2 or 3-pipe

RAS FSXN

Outdoor Unit		RAS 32FSXN	RAS 34FSXN	RAS 36FSXN	RAS 38FSXN	RAS 40FSXN	RAS 42FSXN
Outdoor Combination		16 + 16	16 + 18	18 +18	12 + 12 + 14	12 + 12 + 16	12 + 12 + 18
Power supply		400V / 3Ph / 50Hz					
Nominal Cooling Capacity	kW	90.0	95.0	100.0	109.0	112.0	118.0
Nominal Heating Capacity	kW	100.0	106.0	112.0	118.0	125.0	132.0
UK Cooling Capacity	kW	77.4	81.7	86.0	93.7	96.3	101.5
Maximum Indoor Units(1)		53	56	59	64	64	64
Minimum - Maximum connected capacity		50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP(2)		3.23 / 3.90	3.30 / 3.85	3.37 / 3.81	3.29 / 3.87	3.34 / 3.71	3.32 / 3.65
Energy Class (Cool/Heat)		A / A	A / A	A / A	A / A	A / A	A / A
Noise level (sound pressure) (night mode)	dB(A)	65 (60)	66 (61)	66 (61)	66 (61)	66 (61)	66 (61)
Noise level (sound power)(3)	dB(A)	tbc	tbc	tbc	tbc	tbc	tbc
Air flow (Cooling / Heating)	m^3/h	11700 + 11700	11700 + 11700	11700 + 11700	2 x 10500 + 11700	2 x 10500 + 11700	2 x 10500 + 11700
Dimensions (H x W x D)	mm	1720x2440x765	1720x2440x765	1720x2440x765	1720x3150x765	1720x3150x765	1720x3150x765
Weight	kg	295 + 295	295 + 315	315 + 315	210 + 210 + 295	210 + 210 + 295	210 + 210 + 315
Piping diameter (Liquid / Gas x 2)	Inch	3/4 / (1 1/4/11/8)	3/4 / (1 1/4/11/8)	3/4 / (1 1/4/11/8)	3/4 / (1 1/2/11/4)	3/4 / (1 1/2/11/4)	3/4 / (1 1/2/11/4)
	mm	19.05 / (31.75/28.60)	19.05 / (31.75/28.60)	19.05 / (31.75/28.60)	19.05 / (38.10/31.75)	19.05 / (38.10/31.75)	19.05 / (38.10/31.75)
Total Piping Length / Height Difference	m	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50
Max Piping Length (outdoor to indoor)	m	165	165	165	165	165	165
Current Quantity of Refrigerant	kg	18.0	19.5	21.0	23.0	23.0	24.5
Chargeless / Additional Refrigerant Charge	m / g/m	calculate	calculate	calculate	calculate	calculate	calculate
Recommended fuse size	A	32 & 32	32 & 32	32 & 32	25 & 25 & 32	25 & 25 & 32	25 & 25 & 32
Starting current	A	122	140	144	133	133	151
Running current (cooling / heating)	A	45.2 / 41.6	46.7 / 44.6	48.2 / 47.6	53.6 / 49.0	54.0 / 54.2	57.2 / 58.2
Working Range (cooling / heating)	°C	-5°C~43(db)°C / -20°C~15(wb)°C					
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll	Scroll	Scroll

(1) Maximum Indoor Units - restrictions apply see Technical Catalogue

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

(3) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

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DC INVERTER | -5 +43 | -20 +15 | SYSTEM FREE

Set Free VRF Systems

RAS FSXN

Modular 2 or 3-pipe

Outdoor Unit		RAS 44FSXN	RAS 46FSXN	RAS 48FSXN	RAS 50FSXN	RAS 52FSXN	RAS 54FSXN
Outdoor Combination		12 + 14 + 18	12 + 16 + 18	12 + 18 + 18	14 + 18 + 18	16 + 18 + 18	18 + 18 + 18
Power supply		400V / 3Ph / 50Hz					
Nominal Cooling Capacity	kW	125.0	132.0	136.0	140.0	145.0	150.0
Nominal Heating Capacity	kW	140.0	145.0	150.0	155.0	160.0	165.0
UK Cooling Capacity	kW	107.5	113.5	117.0	120.4	124.7	129.0
Maximum Indoor Units(1)		64	64	64	64	64	64
Minimum - Maximum connected capacity		50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP(2)		3.27 / 3.75	3.16 / 3.71	3.24 / 3.74	3.33 / 3.98	3.32 / 3.98	3.37 / 4.01
Energy Class (Cool/Heat)		A / A	B / A	A / A	A / A	A / A	A / A
Noise level (sound pressure) (night mode)	dB(A)	67 (62)	67 (62)	67 (62)	67 (62)	67 (62)	68 (63)
Noise level (sound power)(3)	dB(A)	tbc	tbc	tbc	tbc	tbc	tbc
Air flow (Cooling / Heating)	m^3/h	10500 + 2 x 11700	10500 + 2 x 11700	10500 + 2 x 11700	3 x 11700	3 x 11700	3 x 11700
Dimensions (H x W x D)	mm	1720x3410x765	1720x3410x765	1720x3410x765	1720x3670x765	1720x3670x765	1720x3670x765
Weight	kg	210 + 295 + 315	210 + 295 + 315	210 + 315 + 315	295 + 315 + 315	295 + 315 + 315	315 + 315 + 315
Piping diameter (Liquid / Gas x 2)	Inch	3/4 / (1 1/2/11/4)	3/4 / (1 1/2/11/4)	3/4 / (1 1/2/11/4)	3/4 / (1 1/2/11/4)	3/4 / (1 1/2/11/4)	3/4 / (1 1/2/11/4)
	mm	19.05 / (38.10/31.75)	19.05 / (38.10/31.75)	19.05 / (38.10/31.75)	19.05 / (38.10/31.75)	19.05 / (38.10/31.75)	19.05 / (38.10/31.75)
Total Piping Length / Height Difference	m	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50
Max Piping Length (outdoor to indoor)	m	165	165	165	165	165	165
Current Quantity of Refrigerant	kg	26.5	26.5	28.0	30.0	30.0	31.5
Chargeless / Additional Refrigerant Charge	m / g/m	calculate	calculate	calculate	calculate	calculate	calculate
Recommended fuse size	A	25 & 32 & 32	25 & 32 & 32	25 & 32 & 32	32 & 32 & 32	32 & 32 & 32	32 & 32 & 32
Starting current	A	155	160	163	167	172	176
Running current (cooling / heating)	A	62.0 / 60.4	67.6 / 63.1	67.9 / 64.8	68.4 / 63.2	70.8 / 65.2	72.3 / 66.6
Working Range (cooling / heating)	°C	-5°C~43(db)°C / -20°C~15(wb)°C					
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll	Scroll	Scroll

(1) Maximum Indoor Units - restrictions apply see Technical Catalogue

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

(3) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

CH Boxes		CH-6.0N1	CH-10.0N1
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Nominal capacity	HP	HP ≤ 6	6 < HP ≤ 10
Maximum number of indoor units	-	7	8
Electricity demand	W	20	20
Dimensions (H x W x D)	mm	191x301x214	191x301x214
Weight	kg	7	7
Piping diameter - Outdoor Unit to CH Box (High/Low Pressure)	Inch	(1/2 - 5/8) / (5/8 - 3/4)	(5/8 - 3/4) / (3/4 - 7/8)
	mm	(12.7 - 15.88) / (15.88 - 19.05)	(15.88 - 19.05) / (19.05 - 22.2)
Piping diameter - From Indoor Unit	Inch	1/2 - 5/8	3/4 - 7/8
	mm	12.7 - 15.88	19.05 - 22.2
Recommended fuse size	A	5	5

- 20 +15 | - 5 +43 | DC INVERTER

High efficiency Modular 2 or 3-pipe

RAS FSXNH

Outdoor Unit		RAS 5FSXNH	RAS 6FSXNH	RAS 8FSXNH	RAS 10FSXNH
Outdoor Combination				-	-
Power supply		400V / 3Ph / 50Hz			
Nominal Cooling Capacity	kW	14.0	16.0	22.4	28.0
Nominal Heating Capacity	kW	16.0	18.0	25.0	31.5
UK Cooling Capacity	kW	12.0	13.8	19.3	24.1
Maximum Indoor Units(1)		8	9	13	16
Minimum - Maximum connected capacity		50% - 130%	50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP(2)		4.49 / 4.80	4.56 / 4.58	4.66 / 4.67	4.34 / 4.67
Energy Class (Cool/Heat)		A / A	A / A	A / A	A / A
Noise level (sound pressure) (night mode)	dB(A)	55 (52)	56 (52)	58 (53)	59 (54)
Noise level (sound power)(3)	dB(A)	tbc	tbc	tbc	tbc
Airflow (Cooling / Heating)	m^3/h	8400	9300	9600	10500
External static Pressure	Pa	60	60	60	60
Dimensions (H x W x D)	mm	1720x950x765	1720x950x765	1720x1210x765	1720x1210x765
Weight	kg	215	215	260	260
Piping diameter (Liquid / Gas x 2)	Inch	3/8 / (5/8/1/2)	3/8 / (3/4/5/8)	3/8 / (3/4/5/8)	3/8 / (7/8/3/4)
	mm	9.52 / (15.88/12.70)	9.52 / (19.05/15.88)	9.52 / (19.05/15.88)	9.53 / (22.20/19.05)
Total Piping Length / Height Difference(4)	m	1000 / 90	1000 / 90	1000 / 90	1000 / 90
Max Piping Length (outdoor to indoor)	m	165	165	165	165
Current Quantity of Refrigerant	kg	5.6	5.6	7.7	7.7
Chargeless / Additional Refrigerant Charge	m / g/m	calculate	calculate	calculate	calculate
Recommended fuse size	A	16	16	16	20
Starting current	A	8	8	8	8
Running current (cooling / heating)	A	5.0 / 5.3	5.6 / 6.2	7.7 / 8.6	10.3 / 10.8
Working Range (cooling / heating)	°C	-5°C~43(db)°C / -20°C~15(wb)°C			
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll

(1) Maximum Indoor Units - restrictions apply see Technical Catalogue

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

(3) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

(4) Restrictions apply, please consult the Technical Catalogue

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RAS FSXNH

Set Free VRF Systems

High efficiency Modular 2 or 3-pipe

RAS 12FSXNH	RAS 12FSXNH-P	RAS 14FSXNH	RAS 16FSXNH	RAS 18FSXNH	RAS 20FSXNH
-	6 + 8	6 + 8	8 + 8	8 + 10	8 + 12
400V / 3Ph / 50Hz					
33.5	33.5	40.0	45.0	50.0	56.0
37.5	37.5	45.0	50.0	56.0	63.0
28.8	28.8	34.4	38.7	43.0	48.2
19	19	23	26	26	33
50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%
3.93 / 4.11	4.70 / 4.73	4.58 / 4.59	4.65 / 4.67	4.48 / 4.68	4.19 / 4.31
A / A	A / A	A / A	A / A	A / A	A / A
61 (56)	61 (56)	61 (56)	61 (56)	62 (57)	63 (58)
tbc	tbc	tbc	tbc	tbc	tbc
11700	9300 + 9600	9300 + 9600	9600 + 9600	9600 + 10500	9600 + 11700
60	60	60	60	60	60
1720x1210x765	1720x2160x765	1720x2160x765	1720x2420x765	1720x2420x765	1720x2420x765
260	215 + 260	215 + 260	260 + 260	260 + 260	260 + 260
1/2 / (1 1/8/7/8)	1/2 / (1 1/8/7/8)	1/2 / (1 1/8/7/8)	1/2 / (1 1/8/7/8)	5/8 / (1 1/8/7/8)	5/8 / (1 1/8/7/8)
12.70 / (28.60/22.2)	12.70 / (28.60/22.2)	12.70 / (28.60/22.2)	12.70 / (28.60/22.2)	15.88 / (28.60/22.2)	15.88 / (28.60/22.2)
1000 / 90	1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50
165	165	165	165	165	165
8.3	13.3	13.3	15.4	15.5	16.0
calculate	calculate	calculate	calculate	calculate	calculate
25	16 & 16	16 & 16	16 & 16	16 & 20	16 & 25
8	17	17	17	17	17
13.7 / 14.5	11.4 / 12.6	13.9 / 15.6	15.5 / 17.2	17.9 / 19.2	21.4 / 23.3
-5°C~43(db)°C / -20°C~15(wb)°C					
R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Scroll	Scroll	Scroll	Scroll	Scroll	Scroll

(1) Maximum Indoor Units - restrictions apply see Technical Catalogue

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

(3) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

(4) Restrictions apply, please consult the Technical Catalogue

- 20 +15 | - 5 +43 | DC INVERTER

High efficiency Modular 2 or 3-pipe

RAS FSXNH

Outdoor Unit		RAS 22FSXNH	RAS 24FSXNH	RAS 24FSXNH-P	RAS 26FSXNH
Outdoor Combination		10 + 12	12 + 12	8 + 8 + 10	8 + 8 + 10
Power supply		400V / 3Ph / 50Hz			
Nominal Cooling Capacity	kW	61.5	69.0	69.0	73.0
Nominal Heating Capacity	kW	69.0	77.5	77.5	82.5
UK Cooling Capacity	kW	52.9	59.3	59.3	62.8
Maximum Indoor Units(1)		36	40	40	43
Minimum - Maximum connected capacity		50% - 130%	50% - 130%	50% - 130%	50% - 130%
Nominal Load Efficiency EER / COP(2)		4.11 / 4.35	3.91 / 4.09	4.64 / 4.64	4.53 / 4.66
Energy Class (Cool/Heat)		A / A	A / A	A / A	A / A
Noise level (sound pressure) (night mode)	dB(A)	64 (59)	64 (59)	64 (59)	64 (59)
Noise level (sound power)(3)	dB(A)	tbc	tbc	tbc	tbc
Airflow (Cooling / Heating)	m^3/h	10500 + 11700	11700 + 11700	9600+9600+10500	9600+9600+10500
External static Pressure	Pa	60	60	60	60
Dimensions (H x W x D)(4)	mm	1720x2420x765	1720x2420x765	1720x3630x765	1720x3630x765
Weight	kg	260 + 260	260 + 260	260 + 260 + 260	260 + 260 + 260
Piping diameter (Liquid / Gas x 2)	Inch	5/8 / (1 1/8 / 1 1/8)	5/8 / (1 1/8 / 1 1/8)	3/4 / (1 1/4 / 1 1/8)	3/4 / (1 1/4 / 1 1/8)
	mm	15.88 / (28.60/28.60)	15.88 / (28.60/28.60)	19.05 / (31.75/28.60)	19.05 / (31.75/28.60)
Total Piping Length / Height Difference(5)	m	1000 / 50	1000 / 50	1000 / 50	1000 / 50
Maximum Piping Length (outdoor to furthest indoor)	m	165	165	165	165
Current Quantity of Refrigerant	kg	16.0	16.6	23.0	23.0
Chargeless / Additional Refrigerant Charge	m / g/m	calculate	calculate	calculate	calculate
Recommended fuse size	A	20 & 25	25 & 25	16 & 16 & 20	16 & 16 & 20
Starting current	A	17	17	25	25
Running current (cooling / heating)	A	24.0 / 25.3	28.3 / 30.1	23.9 / 26.8	25.8 / 28.4
Working Range (cooling / heating)	°C	-5°C~43(db)°C / -20°C~15(wb)°C			
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Compressor type		Scroll	Scroll	Scroll	Scroll

(1) Maximum Indoor Units - restrictions apply see Technical Catalogue

(2) Nominal load efficiency (Cooling 35°C/27°C, Heating 7°C/20°C) Outdoor input only

(3) Sound power level is the A-weighted sound power level [dB(A)] measured at standard rated conditions for the "cooling" mode operation in accordance to EN12102

(4) Includes 20mm between each outdoor unit

(5) Restrictions apply, please consult the Technical Catalogue

Did you know?

Our Set Free VRF can connect to any indoor units from our System Free range for ultimate flexibility

RAS FSXNH

Set Free VRF Systems

High efficiency Modular 2 or 3-pipe

RAS 28FSXNH	RAS 30FSXNH	RAS 32FSXNH	RAS 34FSXNH	RAS 36FSXNH
8 + 8 + 12	8 + 10 + 12	8 + 12 + 12	10 + 12 + 12	12 + 12 + 12
400V / 3Ph / 50Hz				
80.0	85.0	90.0	95.0	100.0
90.0	95.0	100.0	106.0	112.0
68.8	73.1	77.4	81.7	86.0
47	50	53	56	59
50% - 130%	50% - 130%	50% - 130%	50% - 130%	50% - 130%
4.30 / 4.39	4.24 / 4.42	4.09 / 4.24	4.05 / 4.27	3.93 / 4.11
A / A	A / A	A / A	A / A	A / A
64 (59)	65 (60)	65 (60)	66 (61)	66 (61)
tbc	tbc	tbc	tbc	tbc
9600+9600+11700	9600+10500+11700	9600+11700+11700	10500+11700+11700	11700+11700+11700
60	60	60	60	60
1720x3630x765	1720x3630x765	1720x3630x765	1720x3630x765	1720x3630x765
260 + 260 + 260	260 + 260 + 260	260 + 260 + 260	260 + 260 + 260	260 + 260 + 260
3/4 / (1 1/4 / 1 1/8)	3/4 / (1 1/4 / 1 1/8)	3/4 / (1 1/4 / 1 1/8)	3/4 / (1 1/4 / 1 1/8)	3/4 / (1 1/2 / 1 1/8)
19.05 / (31.75/28.60)	19.05 / (31.75/28.60)	19.05 / (31.75/28.60)	19.05 / (31.75/28.60)	19.05 / (38.10/28.60)
1000 / 50	1000 / 50	1000 / 50	1000 / 50	1000 / 50
165	165	165	165	165
23.7	23.7	24.3	24.3	24.9
calculate	calculate	calculate	calculate	calculate
16 & 16 & 25	16 & 20 & 25	16 & 25 & 25	20 & 25 & 25	25 & 25 & 25
25	25	25	25	25
29.8 / 32.8	32.2 / 34.3	35.3 / 37.6	37.7 / 39.5	40.8 / 43.2
-5°C~43(db)°C / -20°C~15(wb)°C				
R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Scroll	Scroll	Scroll	Scroll	Scroll

CH Boxes		CH-6.0N1	CH-10.0N1
Power supply		230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Nominal capacity	HP	HP ≤ 6	6 < HP ≤ 10
Maximum number of indoor units	-	7	8
Electricity demand	W	20	20
Dimensions (H x W x D)	mm	191x301x214	191x301x214
Weight	kg	7	7
Piping diameter - Outdoor Unit to CH Box (High/Low Pressure)	Inch	(1/2 - 5/8) / (5/8 - 3/4)	(5/8 - 3/4) / (3/4 - 7/8)
	mm	(12.7 - 15.88) / (15.88 - 19.05)	(15.88 - 19.05) / (19.05 - 22.2)
Piping diameter - From Indoor Unit	Inch	1/2 - 5/8	3/4 - 7/8
	mm	12.7 - 15.88	19.05 - 22.2
Recommended fuse size	A	5	5

System Free Indoor Units

	HP	0.6	0.8	1.0	1.3	1.5	1.8	2.0	2.3	2.5	3.0	4.0
	Size	15	20	25	32	40	-	50	-	63	80	100
Wall Mounted	**RPK-FSN3M**	•	◠	•	•	◠	•	◠	•	◠	•	•
	Nominal Cooling (kW)	1.7	2.2	2.8	3.8	4.0	5.2	5.6	6.7	7.1	8.0	11.2
	Nominal Heating (kW)	1.9	2.5	3.2	4.2	4.8	5.6	6.3	7.5	8.5	9.0	12.5
	UK Total Cooling (kW)	1.5	2.1	2.6	3.4	3.9	4.5	5.2	6.2	6.4	7.5	10.5
	UK Sensible Cooling (kW)	1.4	1.9	2.0	2.8	3.2	3.2	3.7	4.6	4.7	5.7	7.5

RPK-FSN3M

0.8HP > 0.6HP Dip Switching only available when connected to Series 2 Mini Set Free Systems

	HP	0.6	0.8	1.0	1.3	1.5
	Size	15	20	25	32	40
Wall Mounted (remote expansion valve kit required))	**RPK-FSNH3M**	•	◠	•	•	◠
	Nominal Cooling (kW)	1.7	2.2	2.8	3.8	4.0
	Nominal Heating (kW)	1.9	2.5	3.2	4.2	4.8
	UK Total Cooling (kW)	1.5	2.1	2.6	3.4	3.9
	UK Sensible Cooling (kW)	1.4	1.9	2.0	2.8	3.2

Expansion Valve Kit	EV-1.5N1

0.8HP > 0.6HP Dip Switching only available when connected to Series 2 Mini Set Free Systems

	HP	0.6	0.8	1.0	1.3	1.5	1.8	2.0
	Size	15	20	25	32	40	-	50
Mini 4-Way Cassette (including grille)	**RCIM-FSN2**	•	◠	•	•	◠	•	◠
	Nominal Cooling (kW)	1.7	2.2	2.8	3.8	4.0	5.2	5.6
	Nominal Heating (kW)	1.9	2.5	3.2	4.2	4.8	5.6	6.3
	UK Total Cooling (kW)	1.5	2.1	2.6	3.4	3.9	4.5	5.2
	UK Sensible Cooling (kW)	1.1	1.6	1.9	2.5	2.9	3.2	3.7

RCIM-FSN2

0.8HP > 0.6HP Dip Switching only available when connected to Series 2 Mini Set Free Systems

	HP	0.8	1.0	1.3	1.5	1.8	2.0	2.3	2.5	3.0	4.0	5.0	6.0
	Size	20	25	32	40	-	50	-	63	80	100	125	140
4-Way Cassette (including grille)	**RCI-FSN3Ei**	•	◠	•	◠	•	◠	•	◠	•	•	•	•
	Nominal Cooling (kW)	2.2	2.8	3.8	4.0	5.2	5.6	6.7	7.1	8.0	11.2	14.0	16.0
	Nominal Heating (kW)	2.5	3.2	4.2	4.8	5.6	6.3	7.5	8.5	9.0	12.5	16.0	18.0
	UK Total Cooling (kW)	2.1	2.6	3.4	3.9	4.5	5.2	6.2	6.4	7.5	10.5	12.7	14.8
	UK Sensible Cooling (kW)	1.7	2.1	2.6	3.0	3.5	4.1	4.5	4.7	5.9	8.2	9.4	10.8

RCI-FSN3Ei

	HP	0.8	1.0	1.3	1.5	1.8	2.0	2.3	2.5	3.0	4.0	5.0	6.0
	Size	20	25	32	40	-	50	-	63	80	100	125	140
Hi-Efficiency 4-Way Cassette (including grille)	**RCI-FSN3**	•	◠	•	◠	•	◠	•	◠	•	•	•	•
	Nominal Cooling (kW)	2.2	2.8	3.8	4.0	5.2	5.6	6.7	7.1	8.0	11.2	14.0	16.0
	Nominal Heating (kW)	2.5	3.2	4.2	4.8	5.6	6.3	7.5	8.5	9.0	12.5	16.0	18.0
	UK Total Cooling (kW)	2.1	2.6	3.4	3.9	4.5	5.2	6.2	6.4	7.5	10.5	12.7	14.8
	UK Sensible Cooling (kW)	1.8	2.2	3.0	3.5	4.0	4.6	5.4	5.6	6.1	8.1	9.1	10.2

RCI-FSN3

• *Capacity available with dip switch setting capacity range (HP)* ◠ *Adjustable by dipswitch setting*

System Free Indoor Units

	HP	0.8	1.0	1.3	1.5	1.8	2.0	2.3	2.5	3.0	4.0	5.0
	Size	20	25	32	40	-	50	-	63	80	100	125
2-Way Cassette	**RCD-FSN2**	•	∩	•	∩	•	∩	•	∩	•	•	•
(including grille)	Nominal Cooling (kW)	2.2	2.8	3.8	4.0	5.2	5.6	6.7	7.1	8.0	11.2	14.0
	Nominal Heating (kW)	2.5	3.2	4.2	4.8	5.6	6.3	7.5	8.5	9.0	12.5	16.0
	UK Total Cooling (kW)	2.1	2.6	3.4	3.9	4.5	5.2	6.2	6.4	7.5	10.5	12.7
	UK Sensible Cooling (kW)	1.7	2.1	2.5	2.8	3.4	3.9	4.6	4.7	5.6	7.7	8.8

RCD-FSN2

	HP	1.8	2.0	2.3	2.5	3.0	4.0	5.0	6.0
	Size	-	50	-	63	80	100	125	140
Ceiling Suspended	**RPC-FSN2E**	•	∩	•	∩	•	•	•	•
	Nominal Cooling (kW)	5.2	5.6	6.7	7.1	8.0	11.2	14.0	16.0
	Nominal Heating (kW)	5.6	6.3	7.5	8.5	9.0	12.5	16.0	18.0
	UK Total Cooling (kW)	4.5	5.2	6.2	6.4	7.5	10.5	12.7	14.8
	UK Sensible Cooling (kW)	3.2	3.7	4.5	4.6	5.4	7.6	9.1	10.7

RPC-FSN2E

	HP	0.6	0.8	1.0	1.3	1.5
	Size	15	20	25	32	40
Ducted In the Ceiling	**RPIM-FSN4E-(DU)**	•	∩	∩	•	∩
(Slim width)	Nominal Cooling (kW)	1.7	2.2	2.8	3.8	4.0
	Nominal Heating (kW)	1.9	2.5	3.2	4.2	4.8
	UK Total Cooling (kW)	1.5	2.1	2.6	3.4	3.9
	UK Sensible Cooling (kW)	1.2	1.7	2.1	2.4	2.8

RPIM-FSN4E - (DU)

0.8HP > 0.6HP Dip Switching only available when connected to Series 2 Mini Set Free Systems

	HP	0.6	0.8	1.0	1.3	1.5
	Size	15	20	25	32	40
Ducted In the Ceiling	**RPI-FSN4E**	•	∩	∩	•	∩
(Low height)	Nominal Cooling (kW)	1.7	2.2	2.8	3.8	4.0
	Nominal Heating (kW)	1.9	2.5	3.2	4.2	4.8
	UK Total Cooling (kW)	1.5	2.1	2.6	3.4	3.9
	UK Sensible Cooling (kW)	1.2	1.7	2.1	2.5	2.8

RPI-FSN2E

0.8HP > 0.6HP Dip Switching only available when connected to Series 2 Mini Set Free Systems

	HP	1.8	2.0	2.3	2.5	3.0	4.0	5.0	6.0
	Size	-	50	-	63	80	100	125	140
Ducted In the Ceiling	**RPI-FSN4E**	•	∩	•	∩	•	•	•	•
(Standard)	Nominal Cooling (kW)	5.2	5.6	6.7	7.1	8.0	11.2	14.0	16.0
	Nominal Heating (kW)	5.6	6.3	7.5	8.5	9.0	12.5	16.0	18.0
	UK Total Cooling (kW)	4.5	5.2	6.2	6.4	7.5	10.5	12.7	14.8
	UK Sensible Cooling (kW)	3.4	4.0	4.7	4.9	5.6	7.7	9.1	10.7

RPI-FSN2E

System Free Indoor Units

	HP	8.0	10.0
	Size	200	250
Ducted In the Ceiling (Large capacity)	**RPI-FSN3E**	•	•
	Nominal Cooling (kW)	22.4	28.0
	Nominal Heating (kW)	25.0	31.0
	UK Total Cooling (kW)	18.4	22.9
	UK Sensible Cooling (kW)	14.2	18.1

RPI-FSN3E

	HP	0.8	1.0	1.3	1.5	1.8	2.0	2.3	2.5
	Size	20	25	32	40	-	50	-	63
Floor Concealed (Uncased)	**RPFI-FSN2E**	•	◯	•	◯	•	•	•	◯
	Nominal Cooling (kW)	2.2	2.8	3.8	4.0	5.2	5.6	6.7	7.1
	Nominal Heating (kW)	2.5	3.2	4.2	4.8	5.6	6.3	7.5	8.5
	UK Total Cooling (kW)	2.1	2.6	3.4	3.9	4.5	5.2	6.2	6.4
	UK Sensible Cooling (kW)	1.5	1.9	2.5	2.8	3.3	3.8	4.5	4.7

RPFI-FSN2E

	HP	0.8	1.0	1.3	1.5	1.8	2.0	2.3	2.5
	Size	20	25	32	40	-	50	-	63
Floor Standard (Cased)	**RPF-FSN2E**	•	◯	•	◯	•	◯	•	◯
	Nominal Cooling (kW)	2.2	2.8	3.8	4.0	5.2	5.6	6.7	7.1
	Nominal Heating (kW)	2.5	3.2	4.2	4.8	5.6	6.3	7.5	8.5
	UK Total Cooling (kW)	2.1	2.6	3.4	3.9	4.5	5.2	6.2	6.4
	UK Sensible Cooling (kW)	1.5	1.9	2.5	2.8	3.3	3.8	4.5	4.7

RPF-FSN2E

	HP	1.5	2.0	2.5
	Size	40	50	63
	m³/hr	500	800	1000
Active KPI (Heat Recovery Ventilation with DX coil)	**KPI-X3E**	•	•	•
	Nominal Cooling (kW)	5.3	8.0	10.8
	Nominal Heating (kW)	6.9	9.8	12.9
	Coil Cooling Cap. (kW)	1.8	2.9	3.7
	Coil Heating Cap. (kW)	2.1	3.5	4.4

KPI-X3E

Selection of Accessories / Pipe Kits

Model	Description of Controls	
PC-ART	Standard Wired Remote Controller (inc. 7 Day Time Clock)	
PC-ARF	Advanced Wired LED Controller (inc 7 Day Time Clock)	
PC-ARH	Simple Wired Remote Controller	
PC-LH3A	Wireless Remote Controller (Receiver kit required inc. with RPK-FSN2M)	
PC-LH3B	Wireless Remote Controller (RCI-FSN3, RPK-FSN3M) - Receiver kit required	
PC-ALH3	Grille Receiver Kit (RCI-FSN3, Grilles P-AP160NA1 & P-AP160NAE)	
PC-ALHN	Receiver Kit panel mounted (RCI-FSN3Ei)	
PC-ALHD	Receiver Kit panel mounted (RCD-FSN3E)	
PC-ALHC	Receiver Kit panel mounted (RCIM-FSN3E)	
PC-ALHZ	Receiver Kit wall mounted (All System Free Indoor Units)	
PC-ALHZF	Receiver Kit wall mounted (RPK-HSN(H)3M, RCI-FSN3)	

Model	Set Free Mini, SideFlow & Standard VRF	
E-102SN2	Piping Kit (2-Pipe)	
E-162SN2	Piping Kit (2-Pipe)	
E 242SN2	Piping Kit (2-Pipe)	
E 302SN2	Piping Kit (2-Pipe)	
MH 84AN	Piping Kit (2-Pipe Header)	
MH 108AN	Piping Kit (2-Pipe Header)	
E 52XN2	Piping Kit (3-Pipe)	
E 102XN2	Piping Kit (3-Pipe)	
E 162XN2	Piping Kit (3-Pipe)	
E 202XN2	Piping Kit (3-Pipe)	
E 242XN2	Piping Kit (3-Pipe)	
E 322XN2	Piping Kit (3-Pipe)	
MH 108XN	Piping Kit (3-Pipe Header)	
MC 20AN	Modular Set Free 2-pipe Branch Kit (RAS 20~24FSXN)	
MC 21AN	Modular Set Free 2-pipe Branch Kit (RAS 26~36FSXN)	
MC 30AN	Modular Set Free 2-pipe Branch Kit (RAS 28~54FSXN)	
MC 20XN	Modular Set Free 3-pipe Branch Kit (RAS 20~24FSXN)	
MC 21XN	Modular Set Free 3-pipe Branch Kit (RAS 26~36FSXN)	
MC 30XN	Modular Set Free 3-pipe Branch Kit (RAS 28~54FSXN)	

Model	Set Free Hi-Efficiency VRF	
E-102SN3	Piping Kit (2-Pipe)	
E-162SN3	Piping Kit (2-Pipe)	
E 242SN3	Piping Kit (2-Pipe)	
E 302SN3	Piping Kit (2-Pipe)	
MH 84AN	Piping Kit (2-Pipe Header)	
MH 108AN	Piping Kit (2-Pipe Header)	
E 52XN3	Piping Kit (3-Pipe)	
E 102XN3	Piping Kit (3-Pipe)	
E 162XN3	Piping Kit (3-Pipe)	
E 202XN3	Piping Kit (3-Pipe)	
E 242XN3	Piping Kit (3-Pipe)	
E 322XN3	Piping Kit (3-Pipe)	
MH 108XN	Piping Kit (3-Pipe Header)	
MC 20AN1	Modular Set Free 2-pipe Branch Kit (RAS 12~24FSXNH)	
MC 30AN1	Modular Set Free 2-pipe Branch Kit (RAS 24~36FSXNH)	
MC 20XN1	Modular Set Free 3-pipe Branch Kit (RAS 12~24FSXNH)	
MC 30XN1	Modular Set Free 3-pipe Branch Kit (RAS 24~36FSXNH)	

Ventilation

	Energy Recovery	Heat Recovery	Active KPI + DX Coil
	KPI 252 ~ 2002E3E	KPI 502 ~ 2002H3E	KPI 502 ~ 1002X3E
Air Flow Rate (m³/h)	250 ~ 2000	500 ~ 2000	500 ~ 1000
Capacity HP	-	-	1.5 ~ 2.5
Nominal Cooling Capacity (Utopia System)(1)	-	-	7.4 ~ 9.7
Nominal Heating Capacity (Utopia System)(1)	-	-	9.1 ~ 11.4
Nominal Cooling Capacity (Set Free System)(1)	-	-	5.3 ~ 10.8
Nominal Heating Capacity (Set Free System)(1)	-	-	6.9 ~ 12.9
Total Enthalpy Heat exchange	✓	-	✓
Free Cooling	✓	✓	✓
EC Fans - EuP Lot 11 2nd Tier Compliant	✓	✓	✓
High Efficiency Filter (F7 based on EN779)	Option	Option	Option
Automatic Ventilation via CO_2 Sensor input	✓	✓	✓
Operating Range	-20°C ~ 46°C	-20°C ~ 46°C	-20°C ~ 46°C
Remote Controller Type	Infra Red or Wired	Infra Red or Wired	Infra Red or Wired

(1) The nominal cooling and heating capacity is the combined capacity of outdoor and indoor unit of the system and is based on Standard EN14511.

Did you know? KPI adjusts temperature and humidity of incoming air to match indoor environments

Features and Benefits

KPI Energy Recovery & KPI Heat Recovery

KPI-E3E and KPI-H3E

- Airflows from 250 to 2,000m^3/h

  The Hitachi heat recovery ventilation system (KPI) adjusts the temperature and humidity of incoming fresh air to match the indoor environment
- Low noise level

  ErP lot 11 compliant fan motors resulting in low noise levels of 24bB(A)
- Highly-efficient exchanger with the following features:
  - Fresh air supply for indoor environments
  - Energy recovery ventilation between supply and extract air supplies (forced energy exchange mode) efficiencies up to 78%
  - Automatic ventilation (KPI controls which mode to operate within to achieve maximum energy efficiency)
  - Ventilation mode (forced bypass mode)
  - As a consequence of the energy exchange during the summer period, the cooling load can be reduced by up to 20%, minimising both capital and running costs
- Maintenance

  Easy access hatches for the heat exchanger, motor, fans and electrical box allow in situ maintenance.

Active KPI + DX Coil

KPI-X3E

- Automatically adjusts the temperature and humidity of incoming fresh air to match the indoor environment
- R410A DX coil allows connection to Utopia IVX and Set Free VRF systems
- Linear flow between intake and air extraction ducts
- Combine with System Free indoor units
- Compatible with H-LINK II and CS Net Web.

KPI Energy Recovery

KPI-E3E

Energy Recovery		KPI 252E3E	KPI 502E3E	KPI 802E3E	KPI 1002E3E	KPI 1502E3E	KPI 2002E3E
Air Flow Rate (H/M/L)	m³/h	250 / 208 / 180	500 / 420 / 360	800 / 700 / 597	1000 / 800 / 620	1500 / 1250 / 970	2000 / 1560 / 1240
External Static Pressure[1] (H/M/L)	Pa	60 / 40 / 30	77 / 50 / 47	100 / 75 / 55	120 / 80 / 50	132 / 90 / 60	135 / 84 / 60
Boost External Static Pressure	Pa	200 (250m³/h)	277 (500m³/h)	200 (800m³/h)	195 (1000m³/h)	246 (1500m³/h)	180 (2000m³/h)
Sound Pressure Level[2] (H/M/L)	dB(A)	27 / 26 / 24	30 / 28 / 27	32 / 31 / 30	35 / 32 / 30	37 / 35 / 33	39 / 38 / 35
Exchanger Material		Air to Air cross flow Celluloid material (Total Energy Exchange)					
Temp Efficiency	%	75	75	75	78	78	78
Enthalpy Efficiency Heating	%	66	65	65	68	68	66.5
Cooling	%	60	61	62	62	62.5	61.5
Dimensions (H x W x D)	mm	270x900x750	330x1130x920	385x1210x1015	385x1600x1295	525x1800x1130	525x1800x1430
Weight	kg	34	46	51	79	97	106
Duct Sizes (dia)	mm	150	200	250	300	355	355
Supplied Air Filter Class (EN779)[3]		G3	G3	G3	G3	G3	G3
Nominal Power Input (H/M/L)	W	47 / 32 / 24	83 / 54 / 40	213 / 149 / 94	262 / 110 / 79	422 / 202 / 129	582 / 295 / 170
Specific Fan Power (H/M/L)	W/(m³/s)	677 / 554 / 480	598 / 463 / 400	959 / 766 / 567	943 / 495 / 459	1013 / 582 / 479	1048 / 681 / 494
Working Range[4]		-20°C ~ 46°C					
Power Supply		230V / 1Ph / 50Hz					
Running Current	A	0.4	0.7	1.7	1.9	1.9	2.5
Recommended Fuse Size	A	5	5	5	10	10	10

KPI Heat Recovery

KPI-H3E

Heat Recovery		KPI 502H3E	KPI 802H3E	KPI 1002H3E	KPI 1502H3E	KPI 2002H3E
Air Flow Rate (H/M/L)	m³/h	500 / 420 / 360	800 / 700 / 597	1000 / 800 / 620	1500 / 1250 / 970	2000 / 1560 / 1240
External Static Pressure[1] (H/M/L)	Pa	77 / 50 / 47	100 / 75 / 55	120 / 80 / 50	132 / 90 / 60	135 / 84 / 60
Boost External Static Pressure	Pa	277 (500m³/h)	200 (800m³/h)	195 (1000m³/h)	246 (1500m³/h)	180 (2000m³/h)
Sound Pressure Level[2] (H/M/L)	dB(A)	33 / 31 / 30	35 / 34 / 33	38 / 35 / 33	40 / 36 / 35	42 / 41 / 38
Exchanger Material		Air to Air cross flow Aluminium material (Heat Exchange)				
Temp Efficiency	%	53	50	50	49	48
Enthalpy Efficiency Heating	%	35	34	33	31	31
Cooling	%	30	28	28	27	28
Dimensions (H x W x D)	mm	330x1130x920	385x1210x1015	385x1600x1295	525x1800x1130	525x1800x1430
Weight	kg	50	55	85	101	110
Duct Sizes (dia)	mm	200	250	300	355	355
Supplied Air Filter Class (EN779)[3]		G3	G3	G3	G3	G3
Nominal Power Input (H/M/L)	W	83 / 54 / 40	213 / 149 / 94	262 / 110 / 79	422 / 202 / 129	582 / 295 / 170
Specific Fan Power (H/M/L)	W/(m³/s)	598 / 463 / 400	959 / 766 / 567	943 / 495 / 459	1013 / 582 / 479	1048 / 681 / 494
Working Range[4]		-20°C ~ 46°C				
Power Supply		230V / 1Ph / 50Hz				
Running Current	A	0.7	1.7	1.9	1.9	2.5
Recommended Fuse Size	A	5	5	10	10	10

If a KPI is operated individually add the PC-ART / PC-ARF remote controller to the price.

For details of interlocks with Utopia & Set Free systems contact your local sales office.

[1] Default fan pressure setting

[2] Sound pressure level has been measured in an anechoic chamber, with the measuring point 1.5m below the centre of the unit, with no ceiling under the unit and using a sound insulated duct. Reflected sound must be considered when installing the unit in the field.

[3] High efficiency filter class F7 (EN779) is available as accessory.

[4] The installation of an electric heater is necessary when temperature becomes lower than -5°C(DB).

KPI-X3E

KPI Active

Active Energy Recovery		KPI 502X3E	KPI 802X3E	KPI 1002X3E
	HP	1.5	2.0	2.5
Nominal Cooling Capacity (Utopia System)(1)	kW	-	7.4 (2.9)	9.7 (3.7)
Nominal Heating Capacity (Utopia System)(1)	kW	-	9.1 (3.5)	11.4 (4.4)
Nominal Cooling Capacity (Set Free System)(1)	kW	5.3 (1.8)	8.0 (2.9)	10.8 (3.7)
Nominal Heating Capacity (Set Free System)(1)	kW	6.9 (2.1)	9.8 (3.5)	12.9 (4.4)
Air Flow Rate (H/M/L)	m³/h	500 / 430 / 380	800 / 700 / 590	1000 / 820 / 740
External Static Pressure(2) (H/M/L)	Pa	150 / 120 / 100	125 / 95 / 70	120 / 85 / 70
Boost External Static Pressure	Pa	235 (500m³/h)	125 (800m³/h)	125 (1000m³/h)
Sound Pressure Level(3) (H/M/L)	dB(A)	29 / 27 / 26	31 / 30 / 29	34 / 33 / 31
Exchanger Material		Air to Air cross flow Celluloid material (Total Energy Exchange)		
Temp Efficiency	%	75	75	78
Enthalpy Efficiency Heating	%	65	65	68
Cooling	%	61	62	62
Dimensions (H x W x D)	mm	330x1630x920	385x1710x1015	385x2100x1295
Weight	kg	62	69	100
Piping diameter (Liquid / Gas)	Inch	1/4 / 1/2	1/4 / 5/8	3/8 / 5/8
	mm	6.35 / 12.70	6.35 - 15.88	9.53 - 15.88
Duct Sizes (dia)	mm	200	250	300
Supplied Air Filter Class (EN779)(5)		G3	G3	G3
Nominal Power Input (H/M/L)	W	159 / 99 / 72	272 / 190 / 122	335 / 195 / 150
Specific Fan Power (H/M/L)	W/(m³/s)	1145 / 829 / 682	1224 / 977 / 744	1206 / 856 / 730
Drain Diameter (ext)	mm	φ32	φ32	φ32
Working Range(4)		-20°C ~ 46°C		
Power Supply		230V / 1Ph / 50Hz		
Running Current	A	1.2	1.9	2.2
Recommended Fuse Size	A	5	5	5

If a KPI is operated individually add the PC-ART / PC-ARF remote controller to the price.

For details of interlocks with Utopia & Set Free systems contact your local sales office.

(1) The nominal cooling and heating capacity is the combined capacity of outdoor and indoor unit of the system and is based on Standard EN14511.

(2) Default fan pressure setting.

(3) Sound pressure level has been measured in an anechoic chamber, with the measuring point 1.5m below the centre of the unit, with no ceiling under the unit and using a sound insulated duct. Reflected sound must be considered when installing the unit in the field.

(4) The installation of an electric heater is necessary when temperature becomes lower than -5°C(DB).

(5) High efficiency filter class F7 (EN779) is available as accessory.

Domestic Heating

	Yutaki-S Heat & Cool	Yutampo DHW Only
Model	RWM-FSN3E	TAW-270NH2A
Nominal Heating Capacity (kW)	5.1 ~ 24.0	-
Nominal Cooling Capacity (kW)	3.8 ~ 18.4	-
Maximum Water Outlet	60ºC	55ºC
Refrigerant / GWP	R410A / 1975	R410A / 1975
Capacity Control	DC-Inverter	DC-Inverter
Operating Range (Heating) (wb)	-20ºC / +35(wb)ºC	-15ºC / +37(wb)ºC
Operating Range (Cooling) (db)	- 10ºC / +46(db)ºC	-
Energy Rating	A	A
Remote Controller Type	Wireless	Wired

Did you know?

All our Yutaki heat pumps have DHW Legionella Protection Program as standard with the advanced controller.

InstallerLive AWARDS 2011 winner

Heating Manufacturer of the Year

"The judges felt Hitachi provided an excellent submission, a great product and the way forward."

Hitachi's Yutaki-M Heat Pump

Features and Benefits

Yutaki-M – Monobloc air to water heat pump

RHUE-AVHN1 and RHUE-AVHN-HM

Compact mono outdoor unit which can be used alongside an existing heating solution.

- Monobloc air-to-water heat pump system
- Up to 60ºC leaving water temperature (55ºC for 4~6HP)
- Capacities from 7.5kW to 17.5kW
- Domestic hot water as well as heating – ideal boiler replacement technology
- MCS approved
- High COP of 4.31
- Simple and fast installation with no refrigeration handling required
- Screed drying function ideal for new builds
- Easy-to-use wireless controller with one-touch holiday button and frost protection as standard
- Weather compensation control.

Yutampo

TAW-NH2A

A split system with integrated electric auxiliary heating as standard.

- Stainless steel domestic hot water (DHW) tank with separate outdoor unit
- Completely renewable energy system for domestic hot water
- Converts 1kW consumption into an impressive 3.2kW output
- Operates in outside temperatures as low as -15°C
- Low noise
- Simple to install, operate and service
- Easy-to-use controller with ECO and boost modes, and timer and temperature settings as standard.

Yutaki-S80

RWH-FSVNFE

A split system able to generate water up to 80ºC.

- Split air-to-water heat pump comprising indoor and separate outdoor unit
- Domestic hot water as well as heating – ideal boiler replacement technology
- Capacities from 10kW to 18kW
- High COP of 4.36 (4HP)
- Optional 185 or 250-litre DHW tank
- Easy to install, operate and service
- Hot water recovery time same as a DHW boiler
- Smart Cascade system for outstanding seasonal energy efficiency
- Solar integration
- Weather compensation control
- Generate water up to 80ºC.

- 20 +21 | - 22 +43 | DC INVERTER

AF-RTU-01

Yutaki-M

			Outdoor 1Ø	RHUE 3.0AVHN1	RHUE 4.0AVHN-HM	RHUE 5.0AVHN-HM	RHUE 6.0AVHN-HM
			Outdoor 3Ø	-	-	RHUE 5.0AHN-HM	RHUE 6.0AHN-HM
Heating Capacity	Nominal Capacity (min~max)		kW	7.5 (6.2 ~ 11.0)	9.5 (5.0 ~ 10.9)	12.0 (6.9 ~ 15.0)	14.0 (7.8 ~ 17.5)
	Water 30/35°C, Ambient 7db/6wb°C	COP		4.43	4.06	4.01	4.31
	Nominal Capacity (min~max)		kW	7.1 (5.9 ~ 10.2)	9.2 (5.0 ~ 10.2)	11.3 (6.8 ~ 14.0)	13.3 (7.6 ~ 16.5)
	Water 40/45°C, Ambient 7db/6wb°C	COP		3.34	3.05	3.01	3.35
	Nominal Capacity (min~max)		kW	6.4 (5.3 ~ 9.3)	-	-	-
	Water 47/55°C, Ambient 7db/6wb°C	COP		2.71	-	-	-
	Nominal Capacity (min~max)		kW	6.5 (3.5 ~ 7.1)	6.9 (3.8 ~ 7.9)	8.4 (5.2 ~ 10.9)	9.3 (6.1 ~ 12.3)
	Water 30/35°C, Ambient -7db/-8wb°C	COP		2.4	2.55	2.61	2.6
	Nominal Capacity (min~max)		kW	6.4 (3.4 ~ 6.9)	6.5 (3.7 ~ 7.7)	8.1 (5.0 ~ 10.5)	9.0 (5.8 ~ 12.0)
	Water 40/45°C, Ambient -7db/-8wb°C	COP		2.01	2.22	2.28	2.21
	Nominal Capacity (min~max)		kW	6.2 (3.3 ~ 6.6)	-	-	-
	Water 47/55°C, Ambient -7db/-8wb°C	COP		1.82	-	-	-
Water Flow Nominal (min~max)			(m³/hr)	1.29 (0.9 ~ 2.6)	1.63 (0.6 ~ 3.3)	2.06 (0.8 ~ 4.0)	2.41 (0.8 ~ 4.7)
Water Volume (minimum installation)			L	28	38	46	56
Airflow Rate			(m³/hr)	4080	5700	6000	6000
Sound Pressure level			dB(A)	49	49	51	52
Sound Power level			dB(A)	68	65	67	68
Dimensions (H x W x D)			mm	800x1250x440	1480x1250x444	1480x1250x444	1480x1250x444
Weight (1Ø/3Ø)			Kg	110 / -	150 / -	155 / 160	159 / 164
Working Range			ºC	-20°C ~ 40°C			
Refrigerant Quantity			Kg	2.6	2.6	3.4	4.2
Refrigerant / GWP				R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
Power Supply				230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz 400V / 3Ph / 50Hz	230V / 1Ph / 50Hz 400V / 3Ph / 50Hz
Recommended Fuse Size			A	25 / -	25 / -	32 / 16	40 / 20
Starting Current			A	< 10	< 10	< 10	< 10
Running Current (1Ø/3Ø)			A	7.5 / -	13.4 / -	16.6 / 7.7	17.6 / 8.2

Prices do not include Controls & Thermostat(s) order separately

RHUE-A(V)HN1

RHUE A(V)HN-HM

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Heating Manufacturer of the Year

"The judges felt Hitachi provided an excellent submission, a great product and the way forward."

Hitachi's Yutaki-M Heat Pump

Award-winning Yutaki-M monobloc air to water heat pump

provides up to 70% reduction in CO_2 emissions

400% efficiency as standard

MCS approved

- 20 +21 | - 22 +43 | DC INVERTER

Yutaki-S

RWM FSN3E

AF-RTU-02

	Heating & Cooling		RWM 2FSN3E
			-
Heating Capacity	Nominal Capacity (min~max)	kW	5.1 (2.3 ~ 8.0)
	Water 30/35°C, Ambient 7db/6wb°C COP		5.02
	Nominal Capacity (min~max)	kW	4.7 (2.2 ~ 7.5)
	Water 40/45°C, Ambient 7db/6wb°C COP		3.51
	Nominal Capacity (min~max)	kW	4.2 (2.0 ~ 5.5)
	Water 47/55°C, Ambient 7db/6wb°C COP		2.63
	Nominal Capacity (min~max)	kW	4.0 (1.9 ~ 4.7)
	Water */35°C, Ambient -7db/-8wb°C COP		2.65
	Nominal Capacity (min~max)	kW	3.8 (1.8 ~ 4.4)
	Water */45°C, Ambient -7db/-8wb°C COP		2.10
	Nominal Capacity (min~max)	kW	3.0 (1.6 ~ 3.9)
	Water */55°C, Ambient -7db/-8wb°C COP		1.62
Cooling Capacity	Nominal Capacity (min~max)	kW	3.8 (1.8 ~ 5.4)
	Water 12/7°C, Ambient 35/-°C EER		3.05
	Nominal Capacity (min~max)	kW	5.4 (2.6 ~ 7.5)
	Water 23/18°C, Ambient 35/-°C EER		3.83
Water Flow Nominal (min~max)		m³/hr	0.9 (0.5 ~ 2.2)
Water Volume (minimum installation)		L	28
Sound Pressure level		dB(A)	26
Dimensions (HxWxD)		mm	890x520x360
Weight		Kg	55
Water Pipe Connection (inlet & outlet)		Inch	G 1-1/4 (male)
Pump Input Power (watts)		W	75
Electric Heater Power (Steps)		kW	1.0/2.0/3.0
Power Supply			1Ph 230V 50Hz
Running Current Pump (Elec. Heater) (1Ø/3Ø)		A	0.3 (13.0)
Recommended Fuse Size (1Ø/3Ø)		A	20

Nominal Capacity and COP's includes the defrost factor.

RAS-HVRN2

RAS-HVRNME-AF

RAS-H(V)RNME-AF

	Outdoor 1Ø	RAS 2HVRN2
	Outdoor 3Ø	-
Airflow Rate	(m³/hr)	2100
Sound Pressure Level (Set Back)	dB(A)	45 (43)
Sound Power level	dB(A)	63
Dimensions (HxWxD)	mm	600x792x300
Weight (1Ø/3Ø)	Kg	42
Working Range (Cooling / Heating)	(ºC)	10ºC ~ 46ºCdb / -20ºC ~ 35ºCwb
Piping diameter (Liquid / Gas)	Inch	1/4 / 1/2
	mm	6.35 / 12.70
Minimum Piping Length	m	5
Max Piping Length / Height Diff (ou below iu)	m	30 / 30 (20)
Refrigerant Charge	Kg	1.6
Refrigerant chargeless length	m	30
Refrigerant / GWP		R410a / 1975
Power Supply		230V / 1Ph / 50Hz
Starting Current	A	< 10
Running Current Heating (Cooling) (1Ø/3Ø)	A	4.1 (5.2) / -
Recommended Fuse Size (1Ø/3Ø)	A	16 / -

* For Full piping details refer to the Technical Manual

RWM 3FSN3E	RWM 4FSN3E	RWM 5FSN3E	RWM 6FSN3E	RWM 8FSN3E	RWM 10FSN3E
-	-	-	-	-	-
7.5 (3.1 ~ 11.0)	9.8 (4.8 ~ 13.5)	12.0 (6.3 ~ 16.3)	14.0 (5.9 ~ 17.8)	19.6 (11.3 ~ 25.5)	24.0 (11.6 ~ 32.0)
4.55	4.47	4.36	4.11	4.45	4.41
7.1 (2.8 ~ 9.7)	9.2 (4.5 ~ 12.5)	11.3 (5.6 ~ 15.5)	13.3 (5.6 ~ 16.5)	18.4 (10.6 ~ 24.5)	22.6 (10.9 ~ 31.0)
3.47	3.42	3.16	3.01	3.43	3.40
6.2 (2.4 ~ 7.6)	8.1 (4.0 ~ 10.0)	10.1 (5.1 ~ 13.7)	12.6 (5.4 ~ 13.9)	16.2 (9.3 ~ 20.5)	20.2 (9.8 ~ 27.4)
2.65	2.59	2.60	2.47	2.70	2.67
6.4 (3.5 ~ 7.5)	7.6 (2.9 ~ 9.8)	9.0 (3.3 ~ 11.5)	9.4 (3.5 ~ 12.0)	14.8 (8.8 ~ 17.8)	18.0 (8.9 ~ 21.6)
2.51	2.42	2.40	2.34	2.63	2.61
6.0 (3.3 ~ 6.9)	7.1 (2.8 ~ 8.5)	8.3 (3.1 ~ 10.2)	8.7 (3.2 ~ 10.4)	14.2 (8.4 ~ 16.6)	16.6 (8.2 ~ 20.4)
2.33	2.14	1.92	1.81	2.17	2.16
5.3 (2.9 ~ 5.5)	5.9 (2.4 ~ 6.3)	7.7 (2.9 ~ 8.7)	7.9 (3.0 ~ 8.9)	11.8 (7.0 ~ 12.6)	15.4 (7.6 ~ 17.7)
1.80	1.55	1.55	1.46	1.73	1.72
6.0 (2.5 ~ 6.9)	7.2 (2.6 ~ 8.2)	9.2 (3.3 ~ 10.3)	10.5 (3.1 ~ 11.5)	14.4 (6.7 ~ 16.4)	18.4 (6.4 ~ 20.6)
3.07	3.06	3.03	2.61	3.53	3.12
7.1 (3.0 ~ 8.0)	10.0 (3.6 ~ 11.2)	12.9 (4.7 ~ 15.0)	15.0 (4.4 ~ 17.8)	20.0 (9.3 ~ 23.5)	24.5 (8.6 ~ 29.0)
4.03	3.88	4.02	3.50	4.43	3.57
1.3 (0.9 ~ 2.6)	1.7 (1.0 ~ 3.3)	2.1 (1.1 ~ 3.6)	2.4 (1.2 ~ 3.6)	3.4 (2.0 ~ 4.7)	4.1 (2.2 ~ 4.8)
28	38	46	55	76	92
27	28	28	28	29	29
890x520x360	890x520x360	890x520x360	890x520x360	890x670x360	890x670x360
56	59	61	61	81	85
G 1-1/4 (male)	G 1-1/4 (male)	G 1-1/4 (male)	G 1-1/4 (male)	G 1-1/4 (male)	G 1-1/4 (male)
100	130	140	140	250	260
1.0/2.0/3.0	2.0/4.0/6.0	2.0/4.0/6.0	2.0/4.0/6.0	3.0/6.0/9.0	3.0/6.0/9.0
1Ph 230V 50Hz	1Ph 230V 50Hz or 3Ph 400V 50Hz			3Ph 400V 50Hz	
0.5 (13.0)	0.6 (26.1) / 0.6 (8.7)	0.6 (26.1) / 0.6 (8.7)	0.6 (26.1) / 0.6 (8.7)	- / 1.1 (13.0)	- / 1.2 (13.0)
20	40 / 16	40 / 16	40 / 16	- / 20	- / 20

Prices do not include Controls & Thermostat(s) order separately

RAS 3HVRNME-AF	RAS 4HVRNME-AF	RAS 5HVRNME-AF	RAS 6HVRNME-AF	-	-
-	RAS 4HRNME-AF	RAS 5HRNME-AF	RAS 6HRNME-AF	RAS 8HRNME-AF	RAS 10HRNME-AF
2700	4800	5400	6000	7260	9000
42 (38)	44 (40)	46 (42)	48 (45)	52 (50)	55 (53)
63	65	67	69	74	77
800x950x370	1380x950x370	1380x950x370	1380x950x370	1650x1100x390	1650x1100x390
67	103 / 107	104 / 108	104 / 108	170	170
10ºC ~ 46ºCdb / -20ºC ~ 35ºCwb					
3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8	3/8 / 11/8*	1/2 / 11/8*
9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88	9.53 / 28.61*	12.70 / 28.61*
5	5	5	5	5	5
30 / 30 (20)	30 / 30 (20)	30 / 30 (20)	30 / 30 (20)	30 / 30 (20)	30 / 30 (20)
2.4	3.9	4.0	4.0	7.3	7.8
30	30	30	30	30	30
R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975	R410a / 1975
230V / 1Ph / 50Hz	230V / 1Ph / 50Hz 400V / 3Ph / 50Hz	230V / 1Ph / 50Hz 400V / 3Ph / 50Hz	230V / 1Ph / 50Hz 400V / 3Ph / 50Hz	400V / 3Ph / 50Hz	400V / 3Ph / 50Hz
< 10	< 10	< 10	< 10	< 10	< 10
6.8 (8.2) / -	9.2 (9.8) / 3.0 (3.3)	11.6 (12.8) / 3.9 (4.3)	14.5 (17.2) / 4.8 (5.7)	- / 6.2 (6.8)	- / 7.8 (8.6)
25 / -	20 / 16	32 / 16	32 / 16	- / 16	- / 20

Yutaki-S80

			RWH 4FSVNFE	RWH 5FSVNFE	RWH 6FSVNFE
		Power Supply	1Ph 230V 50Hz	1Ph 230V 50Hz	1Ph 230V 50Hz
Heating Capacity	Nominal Capacity (max)	kW	10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
	Water 30/35°C, Ambient 7db/6wb°C COP		4.36	4.27	4.05
	Nominal Capacity (max)	kW	10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
	Water 40/45°C, Ambient 7db/6wb°C COP		3.45	3.42	3.32
	Nominal Capacity (max)	kW	10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
	Water 47/55°C, Ambient 7db/6wb°C COP		3.04	3.02	3.01
	Nominal Capacity (max)	kW	10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
	Water 55/65°C, Ambient 7db/6wb°C COP		2.56	2.56	2.51
	Nominal Capacity (max)	kW	7.6 (10.5)	9.0 (12.3)	9.4 (12..6)
	Water */35°C, Ambient -7db/-8wb°C COP		2.36	2.32	2.29
	Nominal Capacity (max)	kW	10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
	Water */45°C, Ambient -7db/-8wb°C COP		2.30	2.30	2.25
	Nominal Capacity (max)	kW	10.0 (13.2)	12.0 (15.9)	14.0 (17.9)
	Water */55°C, Ambient -7db/-8wb°C COP		2.15	2.15	2.10
	Nominal Capacity (max)	kW	10.0 (12.8)	12.0 (15.7)	14.0 (17.6)
	Water */65°C, Ambient -7db/-8wb°C COP		2.00	1.91	1.81
Water Flow Nominal (min ~ max)		m³/hr	1.7 (1.0 ~ 2.9)	2.1 (1.1 ~ 3.1)	2.4 (1.1 ~ 3.1)
Water Volume (minimum installation)		L	40	50	50
Sound Pressure level dB(A)		dB(A)	tbc	tbc	tbc
Dimensions (HxWxD)[1]		mm	706x595x695	706x595x695	706x595x695
Weight		Kg	157	162	162
Refrigerant Charge		Kg	2.5	2.5	2.5
Refrigerant / GWP			R134a / 1300	R134a / 1300	R134a / 1300
Water Pipe Connection DHW (inlet & outlet)		Inch	G 3/4 (male)	G 3/4 (male)	G 3/4 (male)
Water Pipe Connection Space (inlet & outlet)		Inch	G 1 (male)	G 1 (male)	G 1 (male)
Pump Input Power		W	140	140	140
Starting Current		A	tbc	tbc	tbc
Running Current		A	12.2	12.5	14.5
Recommended Fuse Size		A	32	32	32

Nominal Capacity and COP's includes the defrost factor.
[1] Dimensions with the minimum mounting foot height. This value can be adjusted up to +30 mm.

		RAS 4HVRNME-AF	RAS 5HVRNME-AF	RAS 6HVRNME-AF
	Power Supply	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz	230V / 1Ph / 50Hz
Airflow Rate	(m³/hr)	4800	5400	6000
Sound Pressure Level (Set Back)	dB(A)	44 (40)	46 (42)	48 (45)
Sound Power level	dB(A)	65	67	69
Dimensions (HxWxD)	mm	1380x950x370	1380x950x370	1380x950x370
Weight	Kg	103	104	104
Working Range	(ºC)	-20ºC ~ 35ºCwb		
Piping diameter (Liquid / Gas)	Inch	3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
	mm	9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
Minimum Piping Length	m	5	5	5
Max Piping Length / Height Diff (ou below iu)	m	30 / 30 (20)	30 / 30 (20)	30 / 30 (20)
Refrigerant Charge	Kg	3.9	4.0	4.0
Refrigerant chargeless length	m	30	30	30
Refrigerant / GWP		R410a / 1975	R410a / 1975	R410a / 1975
Starting Current	A	< 10	< 10	< 10
Running Current	A	9.2	11.6	14.5
Recommended Fuse Size	A	20	32	32

Domestic Heating

RWH 4FSNFE	RWH 5FSNFE	RWH 6FSNFE
3Ph 400V 50Hz	3Ph 400V 50Hz	3Ph 400V 50Hz
10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
4.36	4.27	4.05
10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
3.45	3.42	3.32
10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
3.04	3.02	3.01
10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
2.56	2.56	2.51
7.6 (10.5)	9.0 (12.3)	9.4 (12..6)
2.36	2.32	2.29
10.0 (13.5)	12.0 (16.0)	14.0 (18.0)
2.3	2.3	2.25
10.0 (13.2)	12.0 (15.9)	14.0 (17.9)
2.15	2.15	2.1
10.0 (12.8)	12.0 (15.7)	14.0 (17.6)
2.00	1.91	1.81
1.7 (1.0 ~ 2.9)	2.1 (1.1 ~ 3.1)	2.4 (1.1 ~ 3.1)
40	50	50
tbc	tbc	tbc
706x595x695	706x595x695	706x595x695
162	167	167
2.5	2.5	2.5
R134a / 1300	R134a / 1300	R134a / 1300
G 3/4 (male)	G 3/4 (male)	G 3/4 (male)
G 1 (male)	G 1 (male)	G 1 (male)
140	140	140
tbc	tbc	tbc
6.0	6.1	7.0
16	16	16

Prices do not include Controls & Thermostat(s) order separately

RAS 4HRNME-AF	RAS 5HRNME-AF	RAS 6HRNME-AF
400V / 3Ph / 50Hz	400V / 3Ph / 50Hz	400V / 3Ph / 50Hz
4800	5400	6000
44 (40)	46 (42)	48 (45)
65	67	69
1380x950x370	1380x950x370	1380x950x370
107	108	108
-20ºC ~ 35ºCwb		
3/8 / 5/8	3/8 / 5/8	3/8 / 5/8
9.53 / 15.88	9.53 / 15.88	9.53 / 15.88
5	5	5
30 / 30 (20)	30 / 30 (20)	30 / 30 (20)
3.9	4.0	4.0
30	30	30
R410a / 1975	R410a / 1975	R410a / 1975
< 10	< 10	< 10
3.0	3.9	4.8
16	16	16

Domestic Hot Water Tank		DHWS195S-2.0H1E	DHWS195S-2.0H1E
Net Water Volume	L	185	250
Material (Tank / Insulation)		AISA 444 / Neopor	AISA 444 / Neopor
Dimensions (HxWxD)(1) Seperated	mm	1272x595x600	1602x595x600
Dimensions (HxWxD)(1) Integrated with RWH	mm	1940x595x600	2270x595x600
Weight	Kg	82	98
Tank maximum working temperature	(ºC)	75	75
Tank maximum working pressure	bar	6	6
Electric Heater Power	kW	2	2
Coil Heat Exchanger	m2	1.4	1.4
Water Connection (inlet & outlet)	Inch	G 3/4 (male)	G 3/4 (male)
Coil Connection (inlet & outlet)	Inch	G 3/4 (male)	G 3/4 (male)
Protection		Anode	Anode

Price of PC-S80TE Controller included within DHWT Price

RAS 4/5/6 H(V)RNME-AF

- 20 +21 | - 22 +43 | DC INVERTER

Yutampo

			Internal DHWT	Outdoor Unit
			TAW-270NH2A	RAC-25NH2A
Power Supply			1Ph 230V 50Hz	1Ph 230V 50Hz
Net Water Volume		L	262	-
EN16147 Standard	COP(DHW)		3.09	
	Stand by Power (Pes)	W	30	
	Heat up Time (10ºC ~ 53ºC)	h:s	06:20	
	Max Vol of usable water (Vmax) (40ºC)	L	375	
	Hot Water Reference Temp	ºC	53.3ºC	
Ambient Working range		ºC	-	-15ºC ~ 37ºC
Tank Working Range (inc. electric heater)		ºC	40ºC ~ 55ºC (65ºC)	-
Sound Pressure level		dB(A)	-	46
Dimensions (HxWxD)		mm	1570x600x730	570x750x280
Weight		Kg	63	38
Piping diameter (Liquid / Gas)		Inch	1/4 / 1/2	1/4 / 1/2
		mm	6.35 / 12.70	6.35 / 12.70
Minimum Piping Length		m	5	5
Max Piping Length / Height Diff		m	20 / 8	20 / 8
Refrigerant Charge		Kg	0.95	0.95
Refrigerant / GWP			R410a / 1975	R410a / 1975
Water Pipe Connection (inlet & outlet)		Inch	G 3/4 (male)	-
Electric Heater Power		kW	2	-
Maximum Current		A	16	
Recommended Fuse Size		A	20	20

TAW-270NH2A

RAC-25NH2A

The Yutaki family of air source heat pumps

Domestic Heating

Suitable for refurbishment projects and new build installations

Find out more at
www.hitachiaircon.com/heating

Yutaki Controls Systems & Accessories

Model		Range		
CONTROLLER PACK	1	Yutaki-M - (A(V)HN / A(V)HN-HM)	Yutaki-M Controller Pack (55C machine)	
ATW-CPA-01		Yutaki-M - (A(V)HN1)	Yutaki-M Controller Pack CP60 (60C machine)	
ATW-CPA-02		Yutaki-M - (A(V)HN1)	Yutaki-M Advanced Controller for 60C machines	
PC-S80TE	2	Yutaki-S80	Yutaki-S80 Controller (not required if Yutaki-S80 DHWS Tank used)	
ATW-RTU-01		Yutaki-S (RWM - FSN3E)	On/Off Thermostat (receiver + Room Thermostat)	
ATW-RTU-02		Yutaki-S (RWM - FSN3E)	Intelligent Thermostat (receiver + Room Thermostat)	
ATW-RTU-03		Yutaki-S (RWM - FSN3E)	2nd Temp Thermostat, only RTU-02 (Only Room Thermostat)	
RHM-EH01E	3	Yutaki-M - (All Models)	Hydraulic Module - Electric Heater inc. Control Pack	
RHM-BC01E		Yutaki-M - (All Models)	Hydraulic Module - Boiler Combination inc. Control Pack	
ATW-PK1-01	4	Yutaki-M - (A(V)HN1)	Pump Kit (Top-S 25/7)	
ATW-PK2-01		Yutaki-M - (A(V)HN1)	Pump Kit (Top-S 25/10)	
ATW-PK3-01		Yutaki-M - (A(V)HN1)	Pump Kit (Top-S 25-70/180)	
Pump Kit A (small)		Yutaki-M - (A(V)HN / A(V)HN-HM)	Pump Kit A (small) 55C machines	
Pump Kit B (big)		Yutaki-M - (A(V)HN / A(V)HN-HM)	Pump Kit B (big) 55C machines	
ATW-WCV-C01	5	Yutaki-M - (All Models)	Water Check Valve	
WEH-6E	6	Yutaki-M - (All Models)	Both 1 Ø & 3Ø Electric Heater 6kw - (2/4/6kw stages)	
ATW-HSK-01	7	Yutaki-M/S	Hydraulic Separator - (previously BDHM1)	
ATW-3WV-01	8	Yutaki-M/S	3 Way Valve - (previously VID3V1)	
ATW-2KT-01	9	Yutaki-M/S	2nd Zone Temperature Kit (previously CDH2Z1)	
ATW-AQT-01	10	Yutaki-M/S	Aquastat (previously ASMSH1)	
ATW-WTS-02Y	11	Yutaki-M/S	Water Temperature Sensor for Hot Water Tank (Included with HAPE Tank)	
DBS-26	12	Yutaki-M/S	Drain Boss	
ATW-MVM-01	13	Yutaki-S (RWM - FSN3E)	Mixing valve motor	
ATW-DPK-01	14	Yutaki-S (RWM - 2.0~6.0FSN3E)	Drain Pan Kit for RWM	
ATW-DPK-02		Yutaki-S (RWM - 8 ~ 10FSN3E)	Drain Pan Kit for RWM	
ATW-AOS-01	15	Yutaki-S (RWM - FSN3E)	Auxiliary output signal box	
ATW-20S-01	11	Yutaki-S (RWM - FSN3E)	2nd Outdoor Temperature Sensor	
ATW-WTS-02		Yutaki-S (RWM - FSN3E)	Water Temperature Sensor (2nd Temp control, boiler combination)	
ATW-SPS-01		Yutaki-S (RWM - FSN3E)	Swimming Pool Sensor	
DHWT200E - 2.5H1E	16	Yutaki-M/S	200L Enamelled Tank inc. 2.5kw electric heater	
DHWT300E - 2.5H1E		Yutaki-M/S	300L Enamelled Tank inc.. 2.5kw electric heater	
DHWT200S - 2.5H1E		Yutaki-M/S	200L Stainless Steel Tank inc. 2.5kw electric heater	
DHWT300S - 2.5H1E		Yutaki-M/S	300L Stainless Steel Tank inc. 2.5kw electric heater	
DHWT-CP-01	17	Yutaki-M/S	Permanent cathode protection for enamelled tank 200L	
DHWT-CP-02		Yutaki-M/S	Permanent cathode protection for stainless steel tank 200L	
DHWT-CP-03		Yutaki-M/S	Permanent cathode protection for enamelled tank 300L	
DHWT-CP-04		Yutaki-M/S	Permanent cathode protection for stainless steel tank 300L	
DHWT-SWG-01	18	Yutaki-M/S	Safety valves	

Domestic Heating

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PC-S80TE

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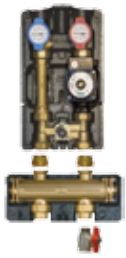

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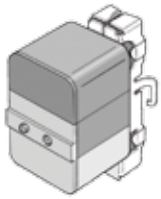

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Samurai Chillers

	Air Cooled Hi-Efficiency Cooling Only	Air Cooled Cooling Only	Air Cooled Heat Pump	Water Cooled Cooling or Heat Pump	Condenserless Cooling Only
Model	RCME 40 ~ 480AH	RCU2E 40 ~ 400AG2	RHU2E 40 ~ 240AG2	RCUE 40 ~ 240WG2	RCUE 40 ~ 120CLG2
Nominal Cooling Capacity (kW)	106 ~ 1280	112 ~ 1030	106 ~ 585	134 ~ 696	120 ~ 360
Nominal Heating Capacity (kW)	-	-	110 ~ 556	161 ~ 824	-
ESEER	4.61 ~ 5.01	3.48 ~ 3.52	3.36 ~3.45	4.46 ~ 4.83	4.23 ~ 4.32
Refrigerant	R134a	R407c	R407c	R407c	R407c
Compressor Type	Screw	Screw	Screw	Screw	Screw
Operating Range (Cooling) (db)	-15ºC / +46(db)ºC	-15ºC / +46(db)ºC	-15ºC / +46(db)ºC	-	-
Operating Range (Heating) (wb)	-	-	-15ºC / +15(wb)ºC	-	-
No. Circuits	1 ~ 8	1 ~ 5	1 ~ 3	1 ~ 3	1 ~ 2

Did you know?

Samurai controls outlet water temperature to +/-0.5ºC independent of cooling load.

Features and Benefits

Samurai Chillers offer world-renowned reliability thanks to Hitachi's own twin screw compressors.

Hi Efficiency, Air Cooled Cooling only
RCME-AH

- Capacities from 40HP to 480HP (106kW to 1280kW)
- Modular concept for flexible installations
- New 4-blade fan design with inverter control achieves reduced input power at partial load
- New U-shape heat exchanger with enhanced aluminium fins for 20% more exchange surface
- 2 plate heat exchangers delivers improved refrigerant distribution and greater efficiency
- Electronic expansion valve with PID control
- New twin screw compressor optimized for R134a with continuous capacity control
- Intelligent control system for optimum SEER even at partial load
- LCD touch screen panel

Hydraulic Module Option - Single and Dual Pump Models

Hitachi Hydraulic modules are a compact design integrated inside the Chiller unit. They are assembled with all interconnecting piping and wiring during manufacture ready for installation.

Available for:

Air-Cooled Hi-Efficiency Cooling Only RCU2E(40~480)

Air-Cooled Cooling Only RCU2E(40~400)

AG2 and Air Cooled Heat Pump RHU2E(40~240)

AG2 models. Available with single or dual pumps and with or without a buffer tank.

Other options available, please contact your local sales office.

Air Cooled Cooling only	RCU2E-AG2
Air Cooled Heat Pump	RHU2E-AG2
Water Cooled	RCUE-WG2
Condenserless Cooling only	RCUE-CLG2

- High performance technology

  RCU2E-AG2 Air Cooled Cooling only - capacities from 40HP to 400HP (112kW to 1030kW)

  RHU2E-AG2 Air cooled Heat Pump - capacities from 40HP to 240HP (106kW to 585kW)

  RCUE-WG2 Water Cooled models - capacities from 40HP to 240HP (134kW to 696kW)

  RCUE-CLG2 Condenserless Cooling only capacities from 40HP to 120HP (120kW - 360kW
- Continuous capacity control provides 15% to 20% energy saving compared to step control
- Low noise

  High technology DC Inverter twin blade fans achieves a reduction of sound emissions, increasing air volume and reducing power consumption. Low noise and super low noise models are available.
- Precise temperature control of outlet water to within +/-0.5°C, independent of cooling load
- Excellent partial load performance
- STAR DELTA starting system reduces the maximum starting current
- Twin screw compressors – highly reliable with very low noise and vibration
- Small installation space

  Thanks to meticulous design of each component, it is possible to achieve exceptionally high cooling capacity values per square metre
- Optional recovery system

  Recover 30% of the output power in cooling mode by heating the water in a dedicated circuit with outlet temperatures up to 70°C at maximum working conditions.

High Efficiency Air Cooled Cooling Only

		RCME 40AH	RCME 50AH	RCME 60AH
Cooling Capacity[1]	Kw	106	132	160
Power Input	Kw	30.5	39.3	49.1
EER (inc. pump input)		3.48 (3.40)	3.36 (3.29)	3.26 (3.19)
ESEER		4.61 (4.31)	4.45 (4.19)	4.32 (4.07)
Sound Power Level (Std/LN/SLN)	dB(A)	91 / tbc / tbc	92 / tbc / tbc	93 / tbc / tbc
Sound Pressure Level (Std/LN/SLN)[2]	dB(A)	77 / tbc / tbc	78 / tbc / tbc	79 / tbc /tbc
Height	mm	2450		
Width	mm	2230		
Depth	mm	2000		
Net Weight	Kg	1425	1460	1515
Capacity Control	-	Continuous Capacity Control		
	%	25 ~ 100		
Number of Circuits	-	1	1	1
Water Pipe Connection	in	2 ½" Victaulic (1 x Inlet / 1 x Outlet)		
Leaving Water Outlet Temperature	°C	5°C ~ 15°C (-5°C option)		
Ambient Temperature	°C	-15°C ~ 46°C		

1. The nominal cooling capacities are based on the European Standard EN14511.
   Chilled Water Inlet / Outlet Temperature : 12 / 7°C
   Condenser Inlet Air Temperature : 35°C
2. Sound Pressure level measured at 1.5m height and 1m from control panel

NOTES:

1. 3 Basic Modules (40, 50 and 60HP)
2. Customise selection for either Energy Efficiency, Price or Installation space
3. Combine up to 8 Modules to match higher capacities (40 & 60HP modules cannot be combined)
4. Two Operating Modes as Standard; selected at Commisioning
   - Steady water outlet temperature (+/- 0.5°C). All compressors running at the same load
   - High Efficiency Mode, Smart control of compressors start/stop operation
5. Option for up to 4 modules to be factory connected on a single base frame (RCME 080/2AH ~ RCME 240/4AH)

		RCME 080/2AH	RCME 090/2AH	RCME 100/2AH	RCME 110/2AH	RCME 120/2AH
	Module	40/40	40/50	50/50	50/60	60/60
Cooling Capacity[1]	Kw	212	238	264	292	320
Power Input	Kw	60.9	69.8	78.6	88.5	98.2
EER (inc. pump input)		3.48 (3.40)	3.41 (3.35)	3.36 (3.30)	3.30 (3.25)	3.26 (3.20)
ESEER		4.61 (4.31)	4.52 (4.30)	4.45 (4.23)	4.38 (4.16)	4.32 (4.11)
Sound Power Level (Std/LN/SLN)	dB(A)	94 / tbc / tbc	95 / tbc / tbc	95 / tbc / tbc	96 / tbc / tbc	96 / tbc / tbc
Sound Pressure Level (Std/LN/SLN)[2]	dB(A)	80 / tbc / tbc	81 / tbc / tbc	81 / tbc / tbc	82 / tbc / tbc	82 / tbc / tbc
Height	mm	2450	2450	2450	2450	2450
Width	mm	2250	2250	2250	2250	2250
Depth	mm	4000	4000	4000	4000	4000
Net Weight	Kg	2910	2945	2980	3035	3090
Capacity Control	-	Continuous Capacity Control				
	%	12.5 ~ 100	12.5 ~ 100	12.5 ~ 100	12.5 ~ 100	12.5 ~ 100
Number of Circuits	-	2	2	2	2	2
Water Pipe Connection	in	2 ½" Victaulic (2 x Inlet / 2 x Outlet)				
		Common Water Pipe Connection Option available				
Leaving Water Outlet Temperature	°C	5°C ~ 15°C (-5°C option)				
Ambient Temprature	°C	-15°C ~ 46°C				

1. The nominal cooling capacities are based on the European Standard EN14511.
   Chilled Water Inlet / Outlet Temperature : 12 / 7°C
   Condenser Inlet Air Temperature : 35°C
2. Sound Pressure level measured at 1.5m height and 1m from control panel

Hi Efficiency Air Cooled Cooling Only

		RCME 120/3AH	RCME 130/3AH	RCME 140/3AH	RCME 150/3AH	RCME 160/3AH	RCME 170/3AH	RCME 180/3AH
Module		40/40/40	40/40/50	40/50/50	50/50/50	50/50/60	50/60/60	60/60/60
Cooling Capacity[1]	Kw	318	344	370	396	424	452	480
Power Input	Kw	91.4	100.3	109.1	117.9	127.7	137.4	147.2
EER (inc. pump input)		3.48 (3.42)	3.43 (3.37)	3.39 (3.34)	3.36 (3.30)	3.32 (3.27)	3.29 (3.23)	3.26 (3.21)
ESEER		4.61 (4.39)	4.54 (4.34)	4.50 (4.29)	4.45 (4.25)	4.40 (4.19)	4.36 (4.16)	4.32 (4.12)
Sound Power Level (Std/LN/SLN)	dB(A)	96 / tbc / tbc	96 / tbc / tbc	96 / tbc / tbc	97 / tbc / tbc	97 / tbc / tbc	97 / tbc / tbc	98 / tbc / tbc
Sound Pressure Level (Std/LN/SLN)[2]	dB(A)	82 / tbc / tbc	82 / tbc / tbc	82 / tbc / tbc	83 / tbc / tbc	83 / tbc / tbc	83 / tbc / tbc	84 / tbc / tbc
Height	mm	2450	2450	2450	2450	2450	2450	2450
Width	mm	2250	2250	2250	2250	2250	2250	2250
Depth	mm	6000	6000	6000	6000	6000	6000	6000
Net Weight	Kg	4395	4430	4465	4500	4555	4610	4665
Capacity Control	-							
	%	8.3 ~ 100	8.3 ~ 100	8.3 ~ 100	8.3 ~ 100	8.3 ~ 100	8.3 ~ 100	8.3 ~ 100
Number of Circuits	-	3	3	3	3	3	3	3
Water Pipe Connection	in	2 ½" Victaulic (3 x Inlet / 3 x Outlet)						
		Common Water Pipe Connection Option available						
Leaving Water Outlet Temperature	°C	5°C ~ 15°C (-5°C option)						
Ambient Temprature	°C	-15°C ~ 46°C						

1. The nominal cooling capacities are based on the European Standard EN14511.
   Chilled Water Inlet / Outlet Temperature : 12 / 7°C
   Condenser Inlet Air Temperature : 35°C
2. Sound Pressure level measured at 1.5m height and 1m from control panel

		RCME 160/4AH	RCME 170/4AH	RCME 180/4AH	RCME 190/4AH	RCME 200/4AH	RCME 210/4AH	RCME 220/4AH	RCME 230/4AH	RCME 240/4AH
Module		40/40/40/40	40/40/40/50	40/40/50/50	40/50/50/50	50/50/50/50	50/50/50/60	50/50/60/60	50/60/60/60	60/60/60/60
Cooling Capacity[1]	Kw	424	450	476	502	528	556	584	612	640
Power Input	Kw	121.8	130.8	139.6	148.5	157.1	167.0	177.0	186.6	196.3
EER (inc. pump input)		3.48 (3.42)	3.44 (3.39)	3.41 (3.36)	3.38 (3.33)	3.36 (3.31)	3.33 (3.28)	3.30 (3.25)	3.28 (3.23)	3.26 (3.21)
ESEER		4.61 (4.40)	4.56 (4.35)	4.52 (4.32)	4.49 (4.28)	4.45 (4.25)	4.41 (4.21)	4.38 (4.18)	4.35 (4.16)	4.32 (4.13)
Sound Power Level (Std/LN/SLN)	dB(A)	97 / tbc / tbc	97 / tbc / tbc	98 / tbc / tbc	98 / tbc / tbc	98 / tbc / tbc	98 / tbc / tbc	99 / tbc / tbc	99 / tbc / tbc	99 / tbc / tbc
Sound Pressure Level (Std/LN/SLN)[2]	dB(A)	83 / tbc / tbc	83 / tbc / tbc	84 / tbc / tbc	84 / tbc / tbc	84 / tbc / tbc	84 / tbc / tbc	85 / tbc / tbc	85 / tbc / tbc	85 / tbc / tbc
Height	mm	2450	2450	2450	2450	2450	2450	2450	2450	2450
Width	mm	2250	2250	2250	2250	2250	2250	2250	2250	2250
Depth	mm	8000	8000	8000	8000	8000	8000	8000	8000	8000
Net Weight	Kg	5880	5915	5950	5985	6020	6075	6130	6185	6240
Capacity Control	-	Continuous Capacity Control								
	%	6.25 ~ 100	6.25 ~ 100	6.25 ~ 100	6.25 ~ 100	6.25 ~ 100	6.25 ~ 100	6.25 ~ 100	6.25 ~ 100	6.25 ~ 100
Number of Circuits	-	4	4	4	4	4	4	4	4	4
Water Pipe Connection	in	2 ½" Victaulic (4 x Inlet / 4 x Outlet)								
		Common Water Pipe Connection Option available								
Leaving Water Outlet Temperature	°C	5°C ~ 15°C (-5°C option)								
Ambient Temprature	°C	-15°C ~ 46°C								

1. The nominal cooling capacities are based on the European Standard EN14511.
   Chilled Water Inlet / Outlet Temperature : 12 / 7°C
   Condenser Inlet Air Temperature : 35°C
2. Sound Pressure level measured at 1.5m height and 1m from control panel

Air Cooled Cooling Only

		RCU2E 40AG2	RCU2E 50AG2	RCU2E 60AG2	RCU2E 70AG2	RCU2E 80AG2	RCU2E 100AG2	RCU2E 120AG2	RCU2E 140AG2	RCU2E 160AG2	RCU2E 180AG2	RCU2E 210AG2	RCU2E 240AG2	RCU2E 280AG2	RCU2E 320AG2	RCU2E 350AG2	RCU2E 400AG2
Cooling Capacity[1]	Kw	112	130	156	178	206	260	312	356	412	468	534	618	712	824	890	1030
Power Input	Kw	38.6	44.7	53	61	70	89.4	106	122	140	159	183	210	244	280	305	350
EER		2.9	2.91	2.94	2.92	2.94	2.91	2.94	2.92	2.94	2.94	2.92	2.94	2.92	2.94	2.92	2.94
ESEER		3.48	3.49	3.52	3.5	3.52	3.49	3.52	3.5	3.52	3.52	3.5	3.52	3.5	3.52	3.5	3.52
Sound Power Level (Std/LN/SLN)	dB(A)	82/80/78	83/81/79	84/82/80	85/83/81	85/83/81	86/84/82	87/85/83	88/86/84	88/86/84	89/87/85	91/89/87	91/89/87	92/90/88	92/90/88	94/92/90	94/92/90
Sound Pressure Level (Std/LN/SLN)3	dB(A)	52/50/48	53/51/49	54/52/50	55/53/51	55/53/51	55/53/51	56/54/52	57/55/53	57/55/53	57/55/53	58/56/54	58/56/54	59/57/55	59/57/55	60/58/56	60/58/56
Height	mm	2430															
Width	mm	1900															
Depth	mm	2190			2790		4090		5290		5990	7790		10290		12790	
Net Weight	Kg	1430	1470	1560	1760	1820	2830	3000	3420	3550	4450	5070	5250	6750	7000	8450	8750
Capacity Control	-	Continuous Capacity Control															
	%	15 ~ 100															
Number of Circuits	-	1	1	1	1	1	2	2	2	2	3	3	3	4	4	5	5
Water Pipe Connection	in	3" Victaulic (1 x Inlet / 1 x Outlet) per Circuit															
	in	-					Common Water Pipe Connection Option available										
Leaving Water Outlet Temperature	°C	5 ~ 15 (-10 option)															
Ambient Temprature	°C	-15 ~ 46															

Air Cooled Heat Pump

		RHU2E 40AG2	RHU2E 50AG2	RHU2E 60AG2	RHU2E 70AG2	RHU2E 80AG2	RHU2E 100AG2	RHU2E 120AG2	RHU2E 140AG2	RHU2E 160AG2	RHU2E 180AG2	RHU2E 210AG2	RHU2E 240AG2
Cooling Capacity[1]	Kw	106	123	148	169	195	246	296	338	390	444	507	585
Heating Capacity[2]	Kw	110	127	152	185	185	254	304	370	370	456	555	555
Power Input (Cooling)	Kw	37.9	42.7	52	60	70	85.4	104	120	140	156	180	210
Power Input (Heating)	Kw	40.7	44.5	54	68	68	89	108	136	136	162	204	204
EER		2.80	2.88	2.85	2.82	2.79	2.88	2.85	2.82	2.79	2.85	2.82	2.79
COP		2.70	2.85	2.81	2.72	2.72	2.85	2.81	2.72	2.72	2.81	2.72	2.72
ESEER		3.36	3.45	3.42	3.38	3.34	3.45	3.42	3.38	3.34	3.42	3.38	3.34
Sound Power Level	dB(A)	82/80/78	83/81/79	84/82/80	85/83/81	85/83/81	86/84/82	87/85/83	88/86/84	88/86/84	89/87/85	91/89/87	91/89/87
Sound Pressure Level (Std/LN/SLN)[3]	dB(A)	52/50/48	53/51/49	54/52/50	55/53/51	55/53/51	55/53/51	56/54/52	57/55/53	57/55/53	57/55/53	58/56/54	58/56/54
Height	mm	2430											
Width	mm	1900											
Depth	mm	2190			2790		4090		5290		5990	7790	
Net Weight	Kg	1550	1600	1670	1880	1950	3050	3250	3670	3780	4780	5440	5650
Capacity Control	-	Continuous Capacity Control											
	%	15 ~ 100											
Number of Circuits	-	1	1	1	1	1	2	2	2	2	3	3	3
Water Pipe Connection	in	3" Victaulic (1 x Inlet / 1 x Outlet) per Circuit											
	in	-					Common Water Pipe Connection Option available						
Leaving Water Outlet Temperature (Cool)	°C	5 ~ 15 (-10 option)											
Leaving Water Outlet Temperature (Heat)	°C	35 ~ 55											
Ambient Temperature	°C	-15 ~ 46 Cooling / -10 ~ 15.5wb Heating											

NOTES: Please refer to notes 1, 2 and 3

Water Cooled

		RCUE 40WG2	RCUE 50WG2	RCUE 60WG2	RCUE 80WG2	RCUE 100WG2	RCUE 120WG2	RCUE 150WG2	RCUE 180WG2	RCUE 200WG2	RCUE 240WG2
Cooling Capacity[1]	Kw	134	160	194	232	320	388	445	525	600	696
Heating Capacity[2]	Kw	161.1	192.3	233.9	274.7	384.7	467.9	526.9	621.9	719.5	824.2
Power Input (Cooling)[1]	Kw	33.5	40	49.1	54.5	80	98.2	104.5	123.5	148.5	163.5
Power Input (Heating)[2]	Kw	39.8	47.5	58.3	64.7	95	116.6	124.1	146.7	176.4	194.2
EER		4.0	4.0	4.0	4.3	4.0	4.0	4.3	4.3	4.0	4.3
COP		4.0	4.0	4.0	4.2	4.0	4.0	4.2	4.2	4.1	4.2
ESEER		4.52	4.52	4.46	4.81	4.52	4.46	4.83	4.82	4.55	4.82
Sound Power Level	dB(A)	83	84	86	86	88	90	90	91	92	93
Sound Pressure Level	dB(A)	68	69	71	71	72	74	74	75	76	77
Height	mm	1520				1700			1580		
Width	mm	1105									
Depth	mm	850				1465			2350		
Net Weight	Kg	750	765	830	950	1570	1670	1770	2500	2580	2670
Capacity Control	-	Continuous Capacity Control									
	%	15 ~ 100									
Number of Circuits	-	1	1	1	1	2	2	2	3	3	3
Water Pipe Connection (Evaporator)	in	3" Victaulic (1 x Inlet / 1 x Outlet)							3" Victaulic (3 x Inlet / 3 x Outlet)		
	in	-							5" Victaulic (1 x Inlet / 1 x Outlet)		
Water Pipe Connection (Condenser)	in	3" Victaulic (1 x Inlet / 1 x Outlet)							3" Victaulic (3 x Inlet / 3 x Outlet)		
	in	-							5" Victaulic (1 x Inlet / 1 x Outlet)		
Leaving Water Outlet Temperature (Cool)	°C	5 ~ 15 (-10 option)									
Leaving Water Outlet Temperature (Heat)	°C	25 ~ 55									
Condenser Water Outlet Temperature[7]	°C	22 ~ 45 (55* option)									

NOTES: Please refer to notes 4 and 5. [7] ( ) is in case of high condensing option and heat pump operation option.

Condenserless Cooling Only

		RCUE 40CLG2	RCUE 50CLG2	RCUE 60CLG2	RCUE 80CLG2	RCUE 100CLG2	RCUE 120CLG2
Cooling Capacity	Kw	120	145	180	240	290	360
Power Input	Kw	34.4	42.4	52.1	68.8	84.8	104.2
EER		3.5	3.4	3.5	3.5	3.4	3.5
ESEER		4.32	4.32	4.28	4.32	4.23	4.28
Sound Power Level	dB(A)	83	84	86	86	88	90
Sound Pressure Level	dB(A)	68	69	71	71	72	74
Height	mm	1520			1720		
Width	mm	1045		1104			
Depth	mm	885			1471		
Net Weight	Kg	630	680	730	1200	1310	1380
Capacity Control	-	Continuous Capacity Control					
	%	15 ~ 100					
Number of Circuits	-	1	1	1	2	2	2
Water Pipe Connection (Evaporator)	in	3" Victaulic (1 x Inlet / 1 x Outlet)					
Leaving Water Outlet Temperature	°C	5 ~ 15 (-10 option)					
Condensing Temperature	°C	30 ~ 65					

NOTES: Please refer to note 6

NOTES:

1. The nominal cooling capacities are based on the European Standard EN14511.
   Chilled Water Inlet / Outlet Temperature: 12 / 7°C
   Condenser Inlet Air Temperature: 35°C
2. The nominal heating capacities are based on the European Standard EN14511.
   Heated Water Inlet / Outlet Temperature: 40 / 45°C
   Evaporator Air Inlet Temperature: 6°C wb
3. Sound Pressure level measured at 10m
4. The nominal cooling capacities are based on the European Standard EN12055.
   Chilled Water Inlet / Outlet Temperature: 12 / 7°C
   Cooling Water Inlet / Outlet Temperature: 30 / 35°C
5. The nominal heating capacities are only for Heat Pump Operation Option and based on following conditions.
   Chilled Water Inlet / Outlet Temperature: 12 / 7°C
   Hot Water (Condenser) Inlet / Outlet Temperature: 40 / 45°C
6. The nominal cooling capacities are based on the following conditions.
   Chilled Water Inlet / Outlet Temperature: 12 / 7°C
   Condensing Temperature: 45°C

Control Systems and Accessories

Did you know?

Four CS Net Web central controllers can simultaneously control up to 640 indoor units

Features and Benefits

H-LINK II

H-LINK II across the entire Hitachi product range means you can use Hitachi System Free controls for any mix of products. Connecting H-LINK II to CS Net Web for central control makes the system very flexible, the installation simpler and keeps install costs down.

CS Net Web

Hitachi's CS Net Web is a standalone control system that allows users to fully monitor and control their air conditioning from anywhere with web access. Single and multiple sites can be monitored from one central point and the user can ascertain the system performance at all times.

CS Net Web can simultaneously control up to 160 indoor units and up to 64 outdoor units connected to the H-LINK communication system.

The new Building Layout Editor enables a fully interactive image of the air-conditioned areas and, through CS Net Web, creates a virtual view of each unit in situ so the climate for each room can be controlled centrally (via RCS Web).

Optional touchscreen

Hitachi's touchscreen allows intuitive control of up to four CS Net Web central controllers, simultaneously controlling up to 640 indoor units via a single interface. It can be fixed to either a wall or table using the supplied mounting bracket.

BMS Interfaces

BMS interfacing options are compatible with the Utopia, Set Free and Samurai Chiller ranges allowing the connection of Hitachi H-LINK air conditioning units to building management systems using Modbus, BacNet, KNX and LonWorks® protocols.

ModBus

Interface to allow a ModBus compatible building management system to control and monitor up to 32 H-LINK compatible indoor units, or up to eight Samurai Chillers via a RS485 connection. Up to eight controllers can be connected to one H-LINK communications circuit.

KNX

Interface to allow a KNX compatible building management system to control and monitor up to 16 H-LINK compatible indoor units. This unit is an accessory for the CS Net Web central controller and connects to the BMS system via a KNX-TP1 type connection.

HARC BX (A/B) LonWorks®

Interface to allow a LonWorks® compatible building management system to control and monitor up to 64 (option A) or 32 (option B) H-LINK compatible indoor units.

BMS interface HARC70-CE1/OP LonWorks®

Interface to allow integration of Hitachi H-LINK and LonWorks® BMS systems. Two options are available dependent on the level of control required.

BACNet

Interface to allow a BACNet compatible building management system to control and monitor up to 64 H-LINK compatible indoor units via the BACNet/IP protocol.

Individual Controls

RAC CONTROLS		
SPX-RCKA	Wireless Remote Controller & Receiver Kit - RAD-RPA	
SPX-RCDA	Wired Remote Controller - RAD-RPA	
SPX-RCDB	Wired Remote Controller - RAK-PPA, RAK-PXA, RAK-QXA, RAI-RPA, RAF-PXA, RAF-QXA, RAF-RPA	
PSC-6RAD	H-Link Adapter - RAK-PPA, RAK-PXA, RAK-QXA, RAI-RPA, RAD-RPA, RAF-PXA, RAF-QXA, RAF-RPA	

SPX-RCDA
SPX-RCDB

SPX-RCKA

SYSTEM FREE CONTROLS		
PC-ART	Standard Wired Remote Controller (inc. 7 Day Time Clock)	
PC-ARF	Advanced Wired LED Controller (inc 7 Day Time Clock)	
PC-ARH	Simple Wired Remote Controller	
PC-LH3A	Wireless Remote Controller (Receiver kit required inc. with RPK-FSN3M)	
PC-LH3B	Wireless Remote Controller (RCI-FSN3, RPK-FSN3M) - Receiver kit required	
PC-ALH3	Grille Receiver Kit (RCI-FSN3, Grilles P-AP160NA1 & P-AP160NAE)	
PC-ALHN	Receiver Kit panel mounted (RCI-FSN3Ei)	
PC-ALHD	Receiver Kit panel mounted (RCD-FSN2)	
PC-ALHC	Receiver Kit panel mounted (RCIM-FSN2)	
PC-ALHZ	Receiver Kit wall mounted (All System Free Indoor Units)	
PC-ALHZF	Receiver Kit wall mounted (RPK-HSN(H)3M, RCI-FSN3)	

PC-ART

PC-ARF

PSC-A64S

PC-ARH

PSC-A1T

CS Net Web

Group Controls

GROUP CONTROLS		
PSC-A64GT	Touch Screen Central Controller (64 Groups, 160 Units - System Free)	
PSC-A64S	Central Controller (64 Groups, 160 Units - System Free)	
CSC 5S	Central Controller - (up to 8 Samurai Chillers)	
PSC-A1T	7 Day Timer	
CS Net Web (v3.0)	Web based Control, Stand alone or with Touch Screen below (64 outdoor units, 512 indoor units)	
TS002	Touch Screen for CS Net Web	
PC-A1IO	Control/Monitor 3rd party equipment via CS Net Web (H-Link 2 only)	
PSC-5HR	H-Link Relay - extend H-Link wiring up to maximum 5,000m	

PSC-A64GT

Touchscreen

BMS Interface Controls

BMS INTERFACE CONTROLS		
HC-A32MB	ModBus Interface, control/monitor 32 System Free indoor units or 8 Samurai Chillers	
HARC-BX (A/B)	Lon Works Interface, control/monitor 64(A) or 32(B) System Free indoor units	
HARC-70CE1 (OP)	Lon Works Interface, control/monitor up to 4 Samurai Chillers (AG2 Series)	
HC-A16KNX	KNX Interface, control/monitor 16 System Free indoor units	
HC-A64BNP	BACNet Interface, control/monitor 64 System Free indoor units	

Accessories

ACCESSORIES	
PCC1A	Optional Function Connector Cables (pack of 5) - Utopia and Set Free
THM-R2AE	Remote Sensor
PDF-23C3	Side Duct Connection Flange (RCI 1.0~3.0FSN3Ei)
PDF-46C3	Side Duct Connection Flange (RCI 4.0~6.0FSN3Ei)
PD-75	Fresh Air Intake Kit, 75mm dia (RCI 1.0~6.0FSN3Ei)
PI 23LS5	Cassette 3 Wayoutlet kit
DBS 26	Drain Boss Kit (All Outdoor Units except below)
DBS 12L	Drain Boss Kit (RAS 2.0 ~ 2.5HVNP + RAS 3.0HVNC)
DBS-TP10A	Drain Boss Kit (RAS-FSXN(H))
DU M1E	Drain Pump Kit (RPIM-FSN4E)

PCC1A

THM-R2AE

PD-75

DBS 26

DBS 12L

DU M1E

Pipe Kits

PIPE KITS (Utopia IVX Premium, Comfort, Centrifugal and ES)	
TE-03N	Twin Pipe Kit (3hp) (IVX Comfort, Centrifugal & Utopia ES)
TE-04N1	Twin Pipe Kit (4hp) (IVX Comfort, Centrifugal & Utopia ES)
TE-56N1	Twin Pipe Kit (5-6hp) (IVX Comfort, Centrifugal & Utopia ES)
TE-08N	Twin Pipe Kit (8hp) (IVX Comfort, Centrifugal & Utopia ES)
TE-10N	Twin Pipe Kit (10-12hp) (IVX Comfort, Centrifugal & Utopia ES)
TRE-46N1	Triple Pipe Kit (4-6hp) (IVX Comfort, Centrifugal & Utopia ES)
TRE-812N1	Triple Pipe Kit (8-12hp) (IVX Comfort, Centrifugal & Utopia ES)
QE-812N1	Quad Pipe Kit (8-12hp) (IVX Comfort, Centrifugal & Utopia ES)
E-102SN2	Piping Kit (3-12hp) (IVX Comfort, Centrifugal & Utopia ES)
E-162SN2	Piping Kit (3-12hp) (IVX Comfort, Centrifugal & Utopia ES)
TW-22AN	Twin Pipe Kit (2-2.5hp) (IVX Premium)
TW-52AN	Twin Pipe Kit (3-6hp) (IVX Premium)
TW-102AN	Twin Pipe Kit (8-12hp) (IVX Premium)
TG-53AN	Triple Pipe Kit (4-6hp) (IVX Premium)
TG-103AN	Triple Pipe Kit (8-12hp) (IVX Premium)

Pipe Kits (Set Free - Mini, SideFlow & Standard Modular VRF)	
E-102SN2	Piping Kit (2-Pipe)
E-162SN2	Piping Kit (2-Pipe)
E 242SN2	Piping Kit (2-Pipe)
E 302SN2	Piping Kit (2-Pipe)
MH 84AN	Piping Kit (2-Pipe Header)
MH 108AN	Piping Kit (2-Pipe Header)
E 52XN2	Piping Kit (3-Pipe)
E 102XN2	Piping Kit (3-Pipe)
E 162XN2	Piping Kit (3-Pipe)
E 202XN2	Piping Kit (3-Pipe)
E 242XN2	Piping Kit (3-Pipe)
E 322XN2	Piping Kit (3-Pipe)
MH 108XN	Piping Kit (3-Pipe Header)
MC 20AN	Modular Set Free 2-pipe Branch Kit (RAS 20~24FSXN)
MC 21AN	Modular Set Free 2-pipe Branch Kit (RAS 26~36FSXN)
MC 30AN	Modular Set Free 2-pipe Branch Kit (RAS 28~54FSXN)
MC 20XN	Modular Set Free 3-pipe Branch Kit (RAS 20~24FSXN)
MC 21XN	Modular Set Free 3-pipe Branch Kit (RAS 26~36FSXN)
MC 30XN	Modular Set Free 3-pipe Branch Kit (RAS 28~54FSXN)

Pipe Kits (Set Free - High Efficiency Modular VRF)	
E-102SN3	Piping Kit (2-Pipe)
E-162SN3	Piping Kit (2-Pipe)
E 242SN3	Piping Kit (2-Pipe)
E 302SN3	Piping Kit (2-Pipe)
MH 84AN	Piping Kit (2-Pipe Header)
MH 108AN	Piping Kit (2-Pipe Header)
E 52XN3	Piping Kit (3-Pipe)
E 102XN3	Piping Kit (3-Pipe)
E 162XN3	Piping Kit (3-Pipe)
E 202XN3	Piping Kit (3-Pipe)
E 242XN3	Piping Kit (3-Pipe)
E 322XN3	Piping Kit (3-Pipe)
MH 108XN	Piping Kit (3-Pipe Header)
MC 20AN1	Modular Set Free 2-pipe Branch Kit (RAS 12~24FSXNH)
MC 30AN1	Modular Set Free 2-pipe Branch Kit (RAS 24~36FSXNH)
MC 20XN1	Modular Set Free 3-pipe Branch Kit (RAS 12~24FSXNH)
MC 30XN1	Modular Set Free 3-pipe Branch Kit (RAS 24~36FSXNH)

Specifications in this catalogue are subject to change without notice in order that HITACHI may bring the latest innovations to their customers, omitting typing errors.

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