MITSUBISHI ELECTRIC

Changes for the Better

AIR CONDITIONING SYSTEMS

CITY MULTI



CM24AS-Y

CITY MULTI YKE-Series

Further Enhanced Energy Saving

Saving energy is becoming ever more important all around the world.
Mitsubishi Electric is at the forefront of this development,
with advanced products that realize high-quality energy saving solutions
for customers in all fields.



High rated performance

Compared to the conventional series, all models of the YKE series (8 to 60HP) are improved rated EER/COP. This means less energy will be consumed during peak hours, such as high-temperature periods in the daytime.

High partial-load performance

The YKE-Series surpass the conventional series not only in rated specifications but also in terms of partial-load performance. During mornings and evenings, when the temperature is lower and less cooling power is required, better efficiency also enables significant energy savings.



Energy saving assist function

The functions makes it possible to optimize energy saving performance by closely matching the requirements of the installation location. This makes it possible to achieve results that surpass the specifications of the product, contributing to truly energy-saving buildings.



Contents

- Advantages of CITY MULTI 5 ~ 18P
- Outdoor/Heat source unit 19 ~ 110P
- Indoor unit 111 ~ 158P
- Remote Controller 159 ~ 192P
- Lossnay 194 ~ 210P
- Other Commercial Proposal 212 ~ 222P
- Installation information 223 ~ 231P

New release products

Indoor unit

PLFY-P VHM-PA
PLFY-P VMMD-E
PKFY-P VKM-PA

Remote controller

AE-C400E-X
EW-C50E-X
BACS-AP50E

The CITY MULTI VRF System* provides more satisfactory air-conditioning systems with 6 advantages.

1. Energy-saving performance

Wasteful energy use can be prevented by operating the inverter according to the load and by using an intelligent power module. Now, further enchanced with our latest YKE-series lineup

2. Self-developed Compressor

Mitsubishi Electric has focused on in-house development of the compressor, the core component of the air conditioner. We have developed compressors that meet the specifications required by the air conditioner.

3. Mitsubishi Electric Quality

CITY MULTI is produced under strict production controls. Production lines are controlled to prevent any minor errors by unique systems, such as “parts server”, “Cart Navi”.

4. Developed in Japan

The product concept and key parts of CITY MULTI, have been designed at Mitsubishi Electric Works in Japan. This comprises all of the highly technological developments over our long history in Japan.

5. Own system control: M-NET

Mitsubishi Electric uses “M-NET”, an original air-conditioner network system.
M-NET is a network that connects CITY MULTI air conditioners in a building through the use of transition wiring with 2 non-polar wires.
Control of air-conditioning units and fine control of each indoor unit is accomplished by connecting Mitsubishi Electric Air-conditioner Network System (MELANS) to M-NET.

6. Various applications

CITY MULTI can be installed in various types of buildings, such as residences, offices and hotels. A suitable model can be selected according to the situation of use.

*What is Variable Refrigerant Flow (VRF)?

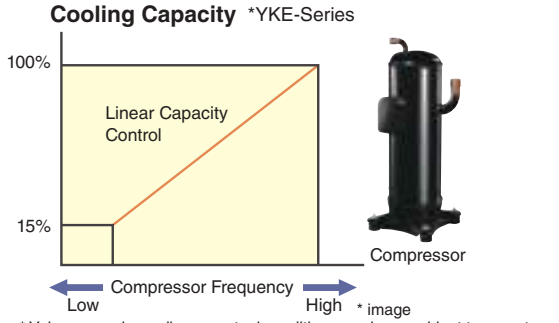
VRF is characterized by the ability to connect multiple indoor units to one outdoor unit and control the indoor units individually. The outdoor unit uses an inverter-driven compressor and can change the refrigerant flow rate according to the indoor unit load.
Since the capacity range of the indoor unit is wide, air-conditioning of even small spaces is possible. Also, indoor units can be individually started, stopped, and controlled to regulate temperature, thereby leading to energy savings.

Energy saving performance

The advantage of CITY MULTI from Mitsubishi Electric is its high energy efficiency, which leads to increased energy savings.
The energy-saving performance of CITY MULTI has been improved to a high level within the industry through technical innovation.

Smart control for saving energy

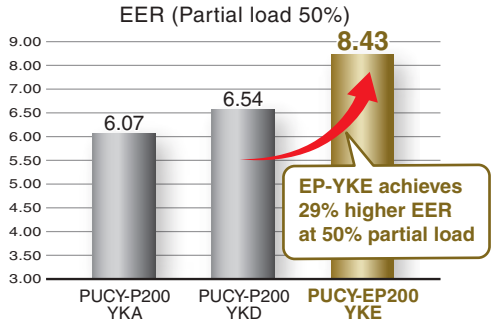
The compressor varies its speed to match the indoor cooling or heating demand, thus it only consumes the amount of energy required. When an inverter driven system is operating at partial load, the energy efficiency of the system is significantly higher than that of a standard fixed speed, non inverter system.

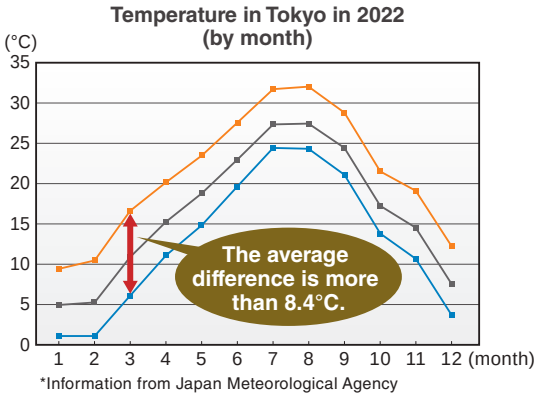


* Values vary depending on actual conditions, such as ambient temperature.

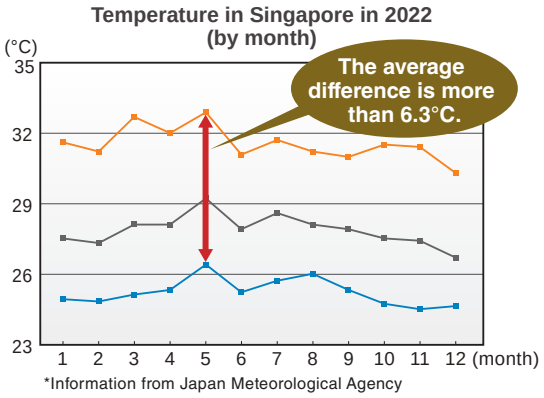
The importance of partial-load efficiency

The energy efficiency ratio (EER) is an index calculated at an ambient temperature of 35°C [95°F]. Actually, the temperature difference between day and night is large, even on hot days.Therefore, it is important to save energy across various temperatures where the EER cannot be measured perfectly. **CITY MULTI can achieve true energy savings by improving efficiency not only under rated conditions, but also under partial-load conditions.**

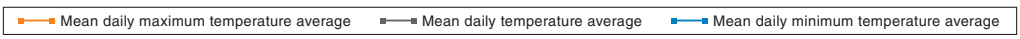




*Information from Japan Meteorological Agency

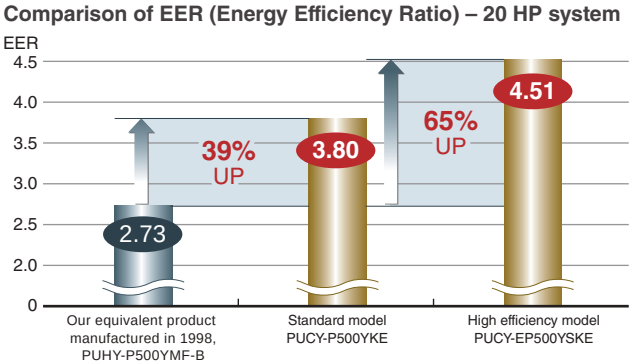


*Information from Japan Meteorological Agency



High rated performance

CITY MULTI's distinct advantage is its high energy efficiency, which leads to increased energy savings. One of the industry's highest level of energy-saving performance has been achieved through technical innovation.



Self-developed Compressor

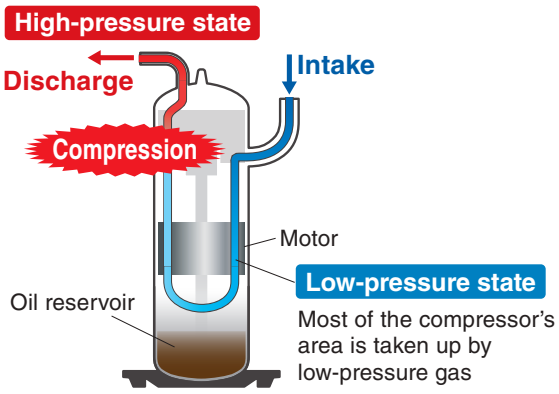
The compressor is the heart of an air conditioner, contains inverter control. Mitsubishi Electric manages all compressor production processes, from development, design, and manufacture to quality control. We develop high-performance compressors to improve performance to a higher level.



Key compressor parts designed by Mitsubishi Electric

Key parts of the compressor such as the scroll and motor (core) are designed by Mitsubishi Electric to increase the operation efficiency of the outdoor unit.
In order to achieve energy saving operation while also improving reliability, a low-pressure shell compressor is used, resulting in stable long-term running performance.

High reliable low-pressure shells



Cross section of compressor

* except PUMY series

Low-pressure shell compressor for top flow models

Most of the area in the compressor is taken up by the low-pressure gas. The refrigerant is drawn in from the side of the compressor and moves to the bottom of the shell where it flows to the scroll section and is compressed. The compressed high-pressure gas is discharged from the top of the compressor. **This prevents the motor and bearings from being heated up by the compressed high-pressure gas.**
The refrigerant is collected at the bottom of the shell to reduce the rate of compressor damage caused by liquid refrigerant compression.

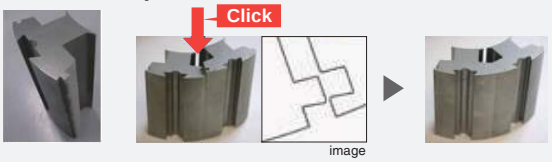
Snap-in core

Mitsubishi Electric has incorporated a new and original production process that wraps a conductor directly around the split core to create a compact and highly efficient motor.

Feature 1: Coils wound around each core



Feature 2: Snap-in core



Compressor motor



Motor efficiency is high at low speeds when coil occupancy is high, thus improving compression efficiency for low-load operation.

Mitsubishi Electric Quality

Under its quality first principle, Mitsubishi Electric is creating products with an unwavering commitment to quality, producing air conditioning systems that provide comfortable spaces for people around the world.

Mitsubishi Electric Quality

COMFORT

Beyond creating a comfortable environment, we aim to achieve harmony between users and their surroundings.

EFFICIENCY

We strive to achieve optimum cost performance by continuously reducing energy requirements and improving eco-friendliness.

DURABILITY

Our products are subjected to rigorous testing under harsh conditions that are more extreme than that of the real world to ensure years of reliable service.



Commitment to quality on the production line

The main plant for CITY MULTI, Air-Conditioning & Refrigeration Systems Works, produces many kinds of products and has introduced several unique systems.
These systems include, for example, a “parts server” for preparing parts for assembled, a display for providing indications according to the work point, and “Cart Navi,” which prevents work from proceeding to the next process if the correct procedure and specified tools have not been used to achieve the expected process quality. The plant intends to improve both the production efficiency and quality. As the result of this, human errors can be prevented in operations requiring high skills and when handling small parts, such as screws, thus producing high-quality products. These same systems are used in our Thai plant.



Air-Conditioning & Refrigeration Systems Works



Cart Navi

On the production line for the primary product, i.e. outdoor units, an airtightness check is performed using helium to eliminate any refrigerant leakage from the piping. After the airtightness check is performed twice and the units are assembled, the units are tested to confirm normal operation. Only the units that pass this test are shipped.



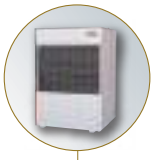
Compressor also developed and manufactured by Mitsubishi Electric*
Refrigerant leak inspection process using helium gas

* Applies to CITY MULTI.

Developed in Japan

Mitsubishi Electric is renowned globally and is a household name with a solid reputation for excellent products and services. The company was founded in 1920 and is known by its present name: Mitsubishi Electric. Since our founding, we have risen to the top level of the air conditioning industry and we continue to maintain that position. The company is proud of its achievements in providing some of awarded systems on the market.

History of CITY MULTI



1984 Japan
Launch of the CITY MULTI series of variable refrigerant flow (VRF) air-conditioning systems.

1992
Export of CITY MULTI begins.

2010 Overseas



2014 Overseas





2019 Overseas
Key parts are improved to create high performance modules.



2024 Overseas
The latest in the series achieves even higher energy efficiency.

Reliable modules appreciated

* The models for Japan were awarded.

1991	CITY MULTI R2-Series (awarded "Technical Prize" by Japan Society of Refrigerating and Air Conditioning Engineers)*
2000	City Multi R2 New Refrigerant Series (awarded "Chairman Prize" of ECCJ)*
2007	"Replace Multi Air Conditioner" (awarded "Chairman Prize" by Japan Institute of Invention and Innovation)*
2010	"Replace Multi Air Conditioner" (honored by Minister of Education, Culture, Sports, Science and Technology in the science and technology category)
2011	Ceiling concealed reheat indoor unit "PEFY-AF1200CFM(R)" for North America (awarded "Product of the Year" prize at AHR Expo 2011)
2015	"Grand Multi Air Conditioner 2015" (awarded "Technical Prize" by Japan Society of Refrigerating and Air Conditioning Engineers)*
2017	City Multi Hybrid VRF (awarded "Air Conditioning Product of the Year" prize at The ACR News Awards 2017)

Creating high-quality products with cutting-edge technologies and professional people who have deep experience in the development factory

All models of CITY MULTI to be exported around the world are examined at the development factory to ensure that they can withstand the environmental conditions in each region, and products that have passed the quality check are supplied. The marketing, unit design and quality control departments put together a team to work on developing high-quality products. Also the parts used in the units are checked for quality. We have determined the evaluation criteria for more than 300 parts and use only those that have passed the durability and safety tests.

Salt spray test

A sodium chloride solution is sprayed on the part to be tested and evaluated, and the rust generated on the surface is observed to evaluate the corrosion resistance.
In accordance with JRA90021, the standard models and BS models are subjected to this salt spray test for 480 hours and 960 hours respectively.



Heat shock test

The part is exposed to repeated temperature changes to verify its resistance to changes in ambient temperature.



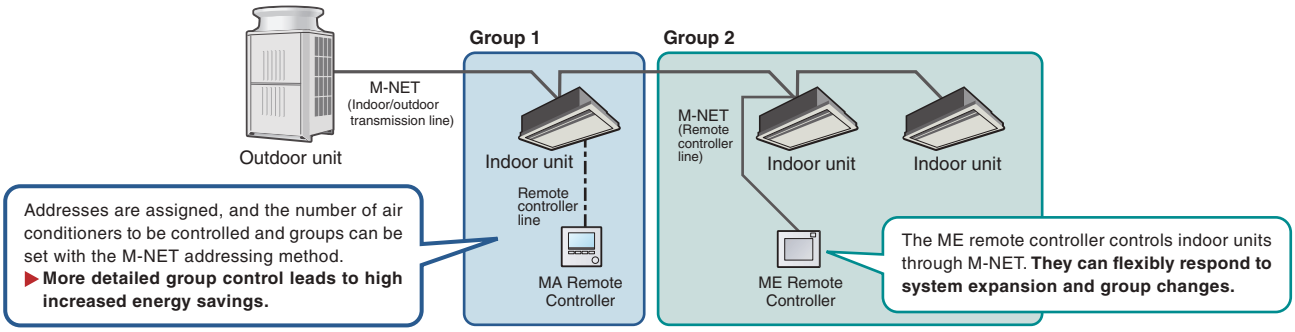
All parts for CITY MULTI have been checked for quality and reliability.

Own system control: M-NET

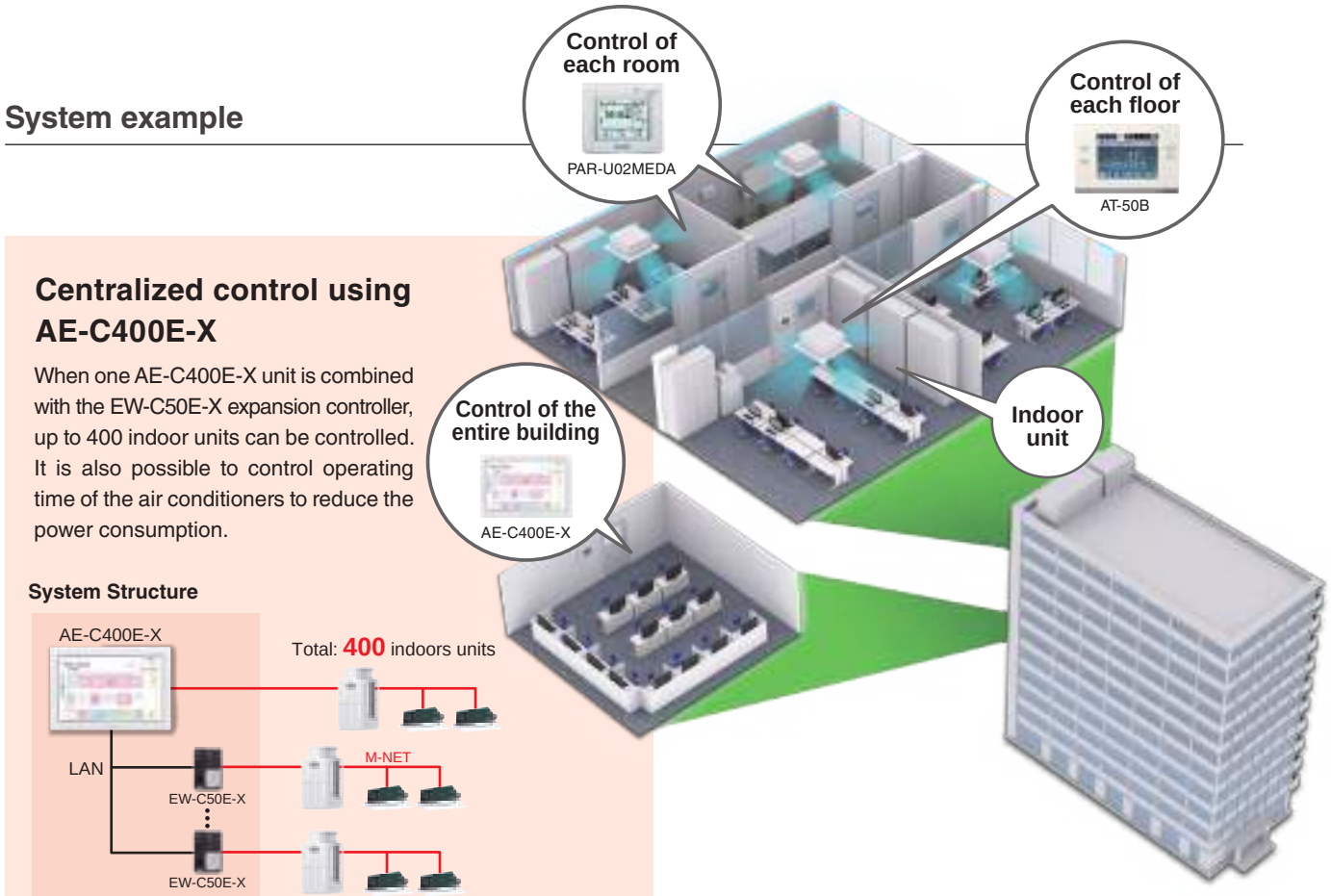
A networked system called M-NET is used to control air conditioner operation. Air conditioners can be grouped and controlled appropriately for use by MELANS (Mitsubishi Electric Air-conditioner Network System), which centrally controls air-conditioning units on the network.

Basic M-NET system

The basic M-NET system for multiple building air conditioners consists of outdoor units, indoor units and remote controllers. Outdoor units and indoor units are connected to M-NET through the “outdoor/indoor unit transmission line,” and the indoor units and remote controllers are connected through the “remote controller line”. Two types of local remote controllers are available: MA and ME. Numbers called M-NET addresses are assigned to outdoor units, indoor units, and local remote controllers, **thus allowing interaction via commands to operate the air conditioners and change settings.**



System example



Centralized control using AE-C400E-X

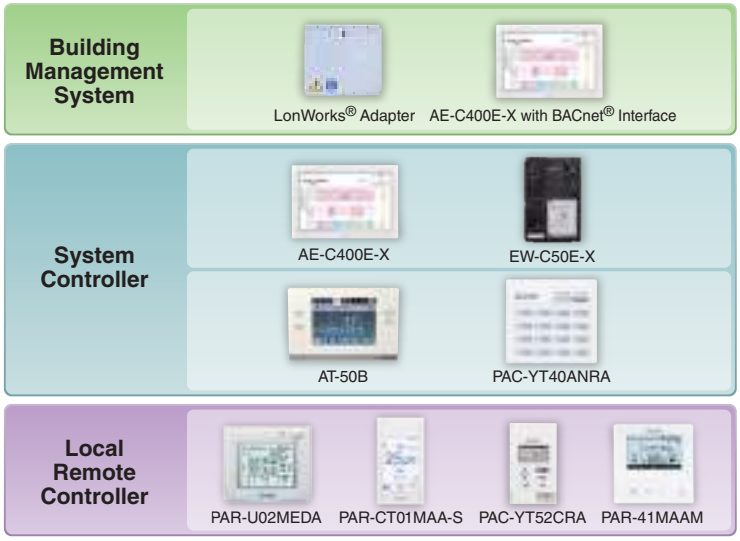
When one AE-C400E-X unit is combined with the EW-C50E-X expansion controller, up to 400 indoor units can be controlled. It is also possible to control operating time of the air conditioners to reduce the power consumption.

System Structure

Controller example

There are many controller options:
They can be connected to a Building Management System using BACnet® or a LonWorks® interface for a high level of control.

* Optional parts or licenses may be required depending on the type of control.
For more detailed information, please contact your nearest sales office or distributor.



Examples of controller functions

Control using smartphone or tablet terminal* (AE-C400E-X)

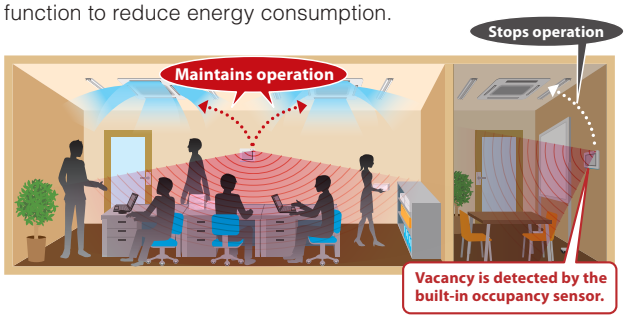
Air conditioners can be monitored and operated by using tablets and smartphones when a Wi-Fi router is connected to the LAN.

* A Wi-Fi router is required to use this function.



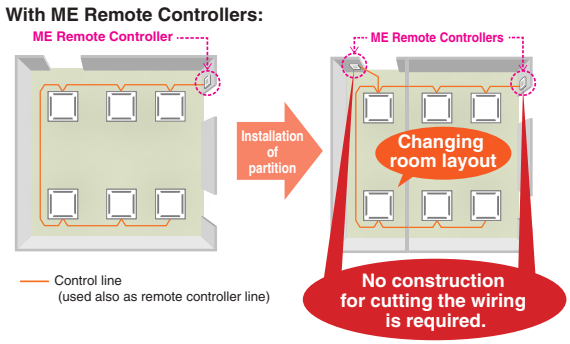
Auto-off function via the occupancy sensor (PAR-U02MEDA)

When **the built-in occupancy and brightness sensors detect vacancy in a specific zone**, the controller uses its internal function to reduce energy consumption.



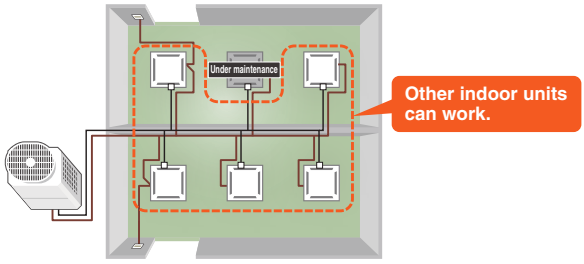
ME Controller (PAR-U02MEDA)

The ME remote controller can be operated when it is connected with any of the indoor units.
When changing the room layout, you can set the groups easily with the remote controller.



Operation can be continued even if indoor unit stops for maintenance

Mitsubishi Electric indoor units can continue to operate, even if one is under repair, because the unit's LEV is closed by supplying power from outdoor unit automatically.

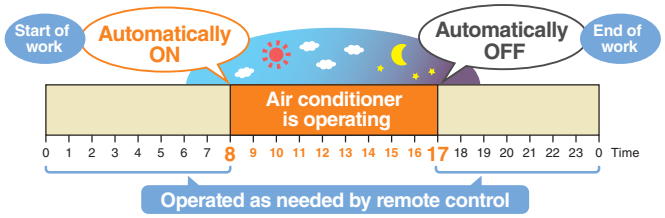


* Before starting maintenance, please confirm that LEV is closed.

Schedule-based control of temperature and operation mode

The air conditioner's start time can be scheduled according to the opening time or a fixed time. The function can be locked during working hours so that staff cannot control the air conditioners.

* Centraized Remote controller is required to use this function.



Varied applications

Various commercial and residential facilities can benefit from the advantages of Mitsubishi Electric's CITY MULTI system.

Design flexibility

Depending on building design, size and usage, the choice of air conditioning differs. The CITY MULTI series offers a wide range of solutions to match various design requirements.

Energy saving

The CITY MULTI series and system realize high energy savings with zoned comfort operating unit independently by units, room or floors.

Simple installation

Compared to a conventional chiller and fan coil system, CITY MULTI 2-pipe system does not require pumps or control panels, as these functions are integrated into the outdoor units. Moreover, maintenance is easier with less key components.

Residence

The CITY MULTI series provides homeowners with large residences with multiple bedrooms an energy efficient solution which realizes comfort living environment through daily operations. Different types of indoor units can be selected and connected to an outdoor unit

Outdoor unit

Owners

Energy saving with zoned comfort

It is possible to manage air conditioning units independently by units, room or floor.

High partial load performance

In residential applications, not all rooms are used at once.
Having an efficient operation even at partial load is a great advantage in running cost.

Low operation noise

Low noise mode offers residents a peaceful living environment.

* Capacity drops during low noise mode.





Condominium

Air-cooled side-flow S series

Small footprint suitable for installation around buildings or even on the balcony.



Luxury Houses

Air-cooled heat pump Y series

Up to 60HP model lineup and max. 50 indoor units connectable. Suitable to cover multi-story by single outdoor unit.



* Please do not install the outdoor unit adjacent to a room where quietness is required.

Flexible installation

External static pressure selectable (0,30,60 Pa) to match site condition.

Quiet operation mode

Low noise operation contributes to realize a peaceful living environment.

* Capacity will be automatically reduced when transitioning into low noise mode.

(Ex) PUHY-P200YKD Standard 57dB -13 dB Low noise mode 44dB (50%)

Indoor unit

Various types of indoor units contribute to meet different room design.

Owners





Low static ceiling concealed type

Low noise level: Min. 22dB (P15)*
External static pressure: 5, 15, 35, 50 Pa





Medium static ceiling concealed type

Low noise level : Min.22dB (P20/25)*
External static pressure: 35 or 40, 50, 70, 100, 150 Pa





1-way airflow ceiling mounted type

Excellent solution for rooms with lighting equipment are at the center of the room or wall surface occupied.

* Measured in anechoic room under testing condition. Actual noise depends on installation.

Control

Local remote controller

Easy to understand and use with simple buttons.

Basic operation and status monitoring available.

* Requires wireless signal receiving unit



Wireless remote controller

Centralized remote controller

LCD color touch panel enables easy and simple operation.

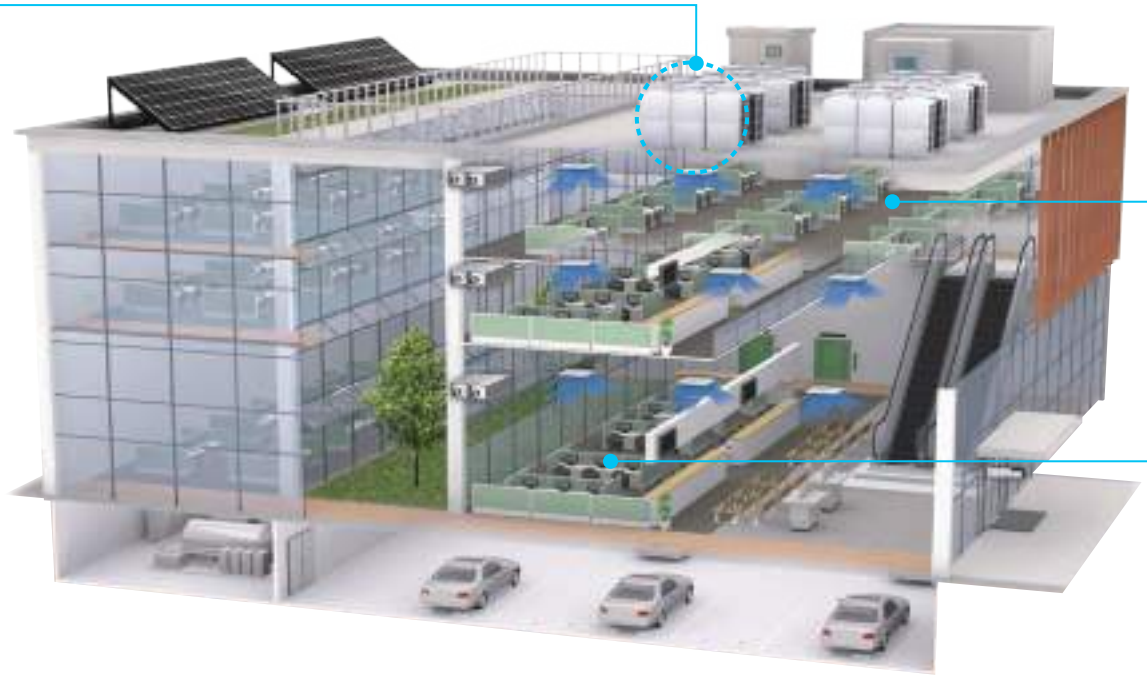
Able to collectively control all indoor units (up to 50 indoor units).



Advanced touch controller

Office

Air conditioning systems supplied by Mitsubishi Electric play an important role in providing comfort to the workers, preserving flexibility, by enabling control to be maintained of the whole building, as well as independent control of floors and spaces.



Outdoor unit / Heat source unit

Owners
Developers

Energy saving with zoned comfort

It is possible to manage air conditioning units independently by units, room or floor. Provides personal comfort for the room occupants and at the same time saves energy.

Adaptable to different design and structure

Depending on building structure and design, it is possible to choose the outdoor unit that fits in the available space and are visually discreet.

Low rise



Air-cooled side-flow S series

Small footprint suitable for installation around buildings or even on the balcony.

Middle rise



Air-cooled heat pump Y series

One outdoor unit connects up to 50 indoor units.
Max total piping length of 1,000m provides flexibility to match requirement of various buildings.

High rise



Water-cooled heat pump Y series

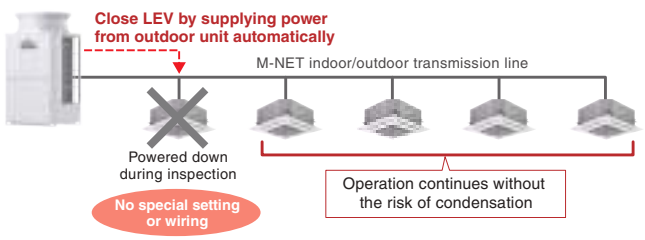
VRF system with a water circuit.
The compact heat source units are installed in machine rooms on each floor suitable for high rise buildings.



Owners
Tenants

High reliable system

Measures in case of malfunction or maintenance leads to higher reliability.



Mitsubishi Electric's original M-NET system enables indoor units to continue operation even when one unit in the system stops due to malfunction or maintenance.

Centralized Control - AE-C400E-X

Owners Developers

Assist quick response to error

Error notification e-mail and error log / icons on the display enables quick action in case of trouble.

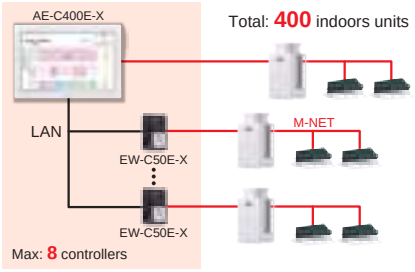
Time saving billing method

AE-C400E-X apportions the value on the WHM of the outdoor unit based on the operating time of each indoor unit.

Advanced energy saving with peakcut operation

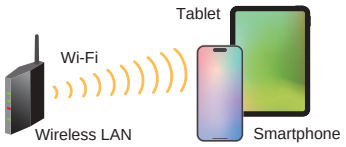
Energy saving with outdoor unit capacity control depending on demand level or the electric energy values.

On-site or Remote control



AE-C400E-X is a LCD color touch screen controller monitoring and controlling up to 400 indoor units/groups.
Enables on-site status monitoring, operation, scheduling, settings.

Remote management



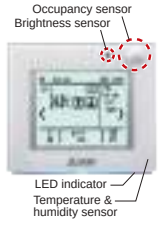
The monitoring and control information can also be viewed remotely from a LAN-connected PC, tablet, or smartphones.

BACnet®

The system can be combined into the large-scaled BMS management via BACnet.

Meeting rooms

Local Control



ME remote controller

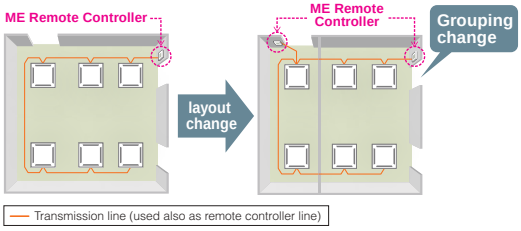
Energy saving management with automatic OFF

Vacancy detected by the built-in occupancy sensor.



Easy layout change with ME type controller

Able to smoothly respond to tenant requirement to change layout.



Open space

Indoor unit

Tenants

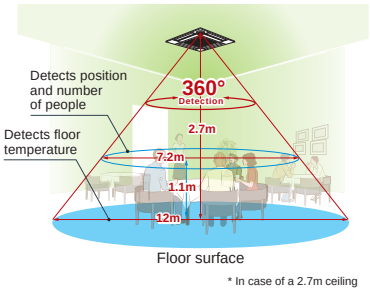
Various types of indoor units contribute to enhance air environment.

Customized airflow with i-see sensor

Realized with i-see sensor adjusting 4 vane direction (direct/indirect).



4-way airflow type



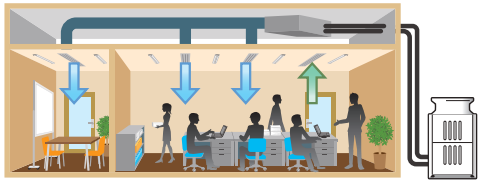
* In case of a 2.7m ceiling

Visually discreet with flexible duct design

The indoor units are concealed, and only the inlet and outlet slits can be seen. Static pressure up to 150Pa enables ducting to multiple rooms.



Medium static pressure ceiling concealed type



Hotels

The CITY MULTI series provides hotels a solution to realize greater comfort and energy conservation through daily operations.

Outdoor unit / Heat source unit

Owners
Developers

Energy saving with zoned comfort

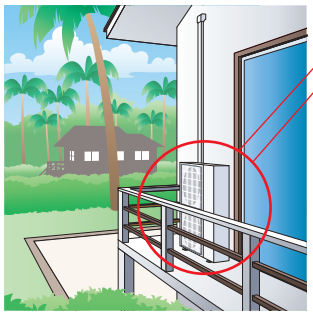
It is possible to manage air conditioning units independently by units, room or floor.

High partial load performance

In hotels, the occupancy rate depends on the season and day of the week. Having an efficient operation even at partial load is a great advantage in running cost.

Adaptable to different design and structure

Depending on building structure and design, it is possible to choose the outdoor unit that fits.



Villas and Cottages

Air-cooled side-flow S series

Small footprint suitable for installation around buildings or even on the balcony.



Middle-rise Hotels

Air-cooled heat pump Y series

One outdoor unit connects up to 50 indoor units.
Max total piping length of 1,000m provides flexibility to match requirement of various buildings.



High-rise Hotels

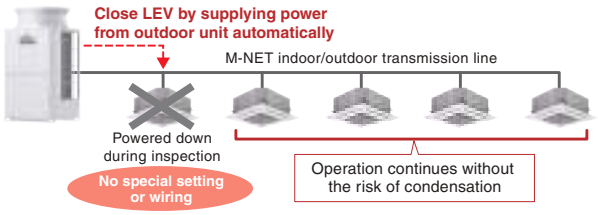
Water-cooled heat pump WY series

VRF system with a water circuit. The compact heat source units are installed in machine rooms on each floor suitable for high rise buildings.

Owners
Tenants

High reliable system

Measures in case of malfunction or maintenance leads to higher reliability.

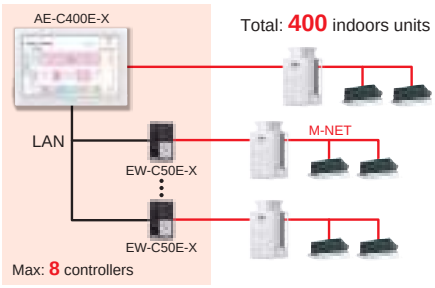


Centralized Control - AE-C400E-X

Owners

System management and control with AE-C400E-X

On-site or Remote control



AE-C400E-X is a LCD color touch screen controller monitoring and controlling up to 400 indoor units/ groups.
Enables on-site status monitoring, operation, scheduling, settings.

Remote management



Remote control/monitoring from a LAN-connected PC, tablet, or smartphone.

* A Wi-Fi router is required.

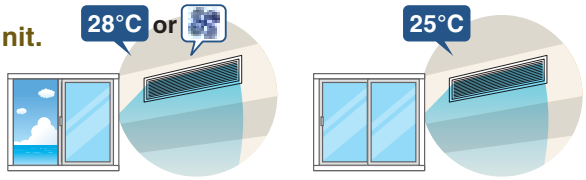
BACnet®

The system can be combined into the large-scaled BMS management via BACnet.

Owners

Prevent unnecessary operation of the indoor unit.

Change temperature setting when window or door to the balcony opens/closes.

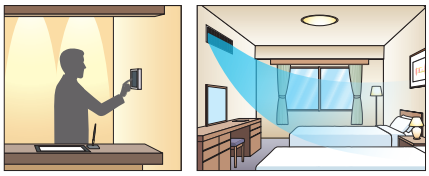


Guests

Prioritize guest comfort at all times

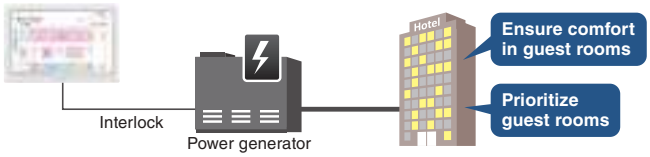
Pre-cooling / pre-heating the room

By using the centralized controller's schedule function, it is possible to pre-cool/pre-heat the room before the guest arrives.



Interlock functions to ensure comfort

By interlocking an in-house power generator and AE-C400E-X, in the case of a power shutdown, it is possible to reduce operating capacity in common areas such as the lobby or staff room.



Local Control

Guests

Easy to use with large-sized icons and full color touch panel display.

Customized display color and control paramaters.



MA touch remote controller



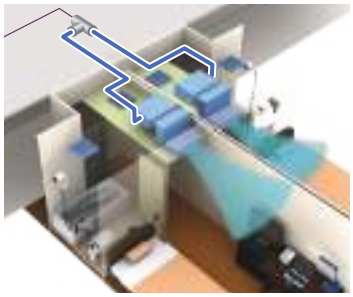
Indoor unit

Guests

Ceiling concealed low-noise type

Blends in various designed room and provide quiet sleeping atmosphere with low operation noise.





Schools

CITY MULTI series offer energy saving optimal air environment mandatory for students to concentrate and learn better.

Outdoor unit

Energy saving with zoned comfort

It is possible to manage air conditioning units independently by units, room or floor.

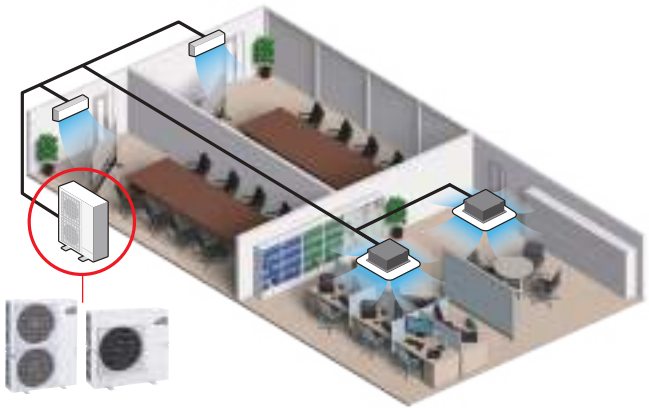
High partial load performance

In schools, not all rooms are used at once. Having an efficient operation even at partial load is a great advantage in running cost.

Small size

The air-cooled side-flow S series

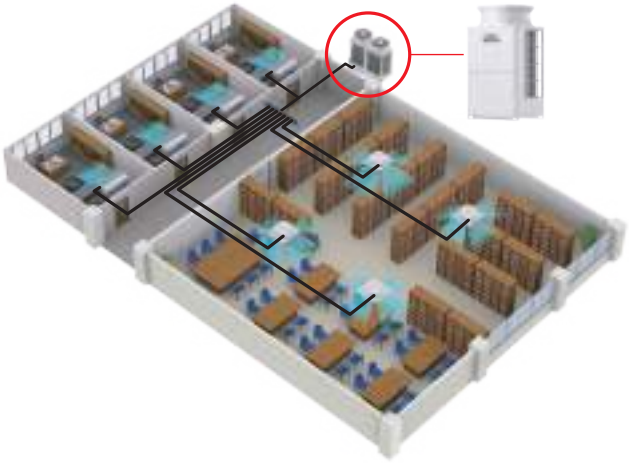
Small footprint suitable for low-rise school buildings where the buildings are separated by functions such as classrooms, libraries or even by grades.



Middle - Large size

The air-cooled heat pump Y series

One outdoor unit connecting up to 50 indoor units.
The unit can be installed collectively either on the roof or on the ground level depending on requirement.



Local Control



MA remote controller

Easy to use with basic controls

Schedule setting

Weekly schedule timer available. Different schedule can be set per day of week and 8 operation patterns (ON/OFF, Set temp)

Prevent unnecessary operation

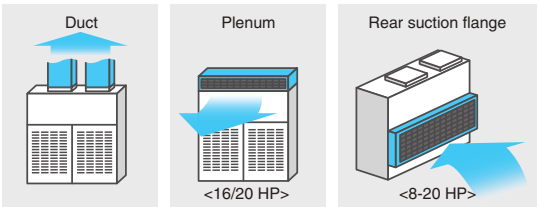
To limit the access of operation such as students, it is possible to prohibit operations such as, ON/OFF, Mode, Set temp, Menu, Fan, Louver, Vane.

Indoor unit

Wide selection to match design requirement

Floor standing exposed types

Offers wide range of airflow rate and static pressure options. Suitable for wide open areas such as the cafeteria and sports halls.





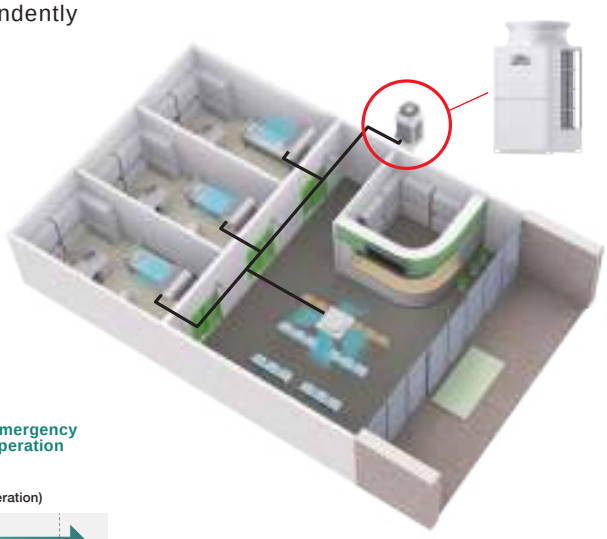
Hospitals

CITY MULTI series are energy efficient playing an important role to maintain comfortable air environment for the patients spending quality time in the facility and doctors and staff working long hours.

Outdoor unit

Energy saving with zoned comfort

It is possible to manage air conditioning units independently by units, room or floor.



High reliable operation modes

Rotation control

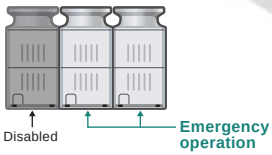
Longer service life by operating outdoor units alternately and reducing operating load.



Emergency operation mode

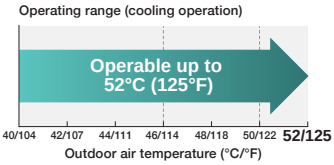
Outdoor unit temporary performs emergency operation if there is at least one module that can operate normally.

* There is a limit to the time that can be continued emergency operation.



Wide operation range

High operating capacity even at 52°C outside temperature.

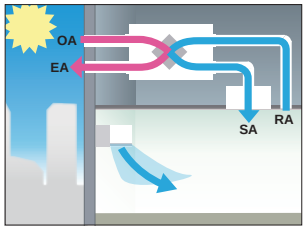


Fresh air



Optimized air quality with fresh air

Ventilation plays an important role to provide patients and doctors with adequate air quality throughout the day.
LOSSNAY system recovers the energy within the stale air from the inside and used to pre-cool the incoming fresh air from outside.



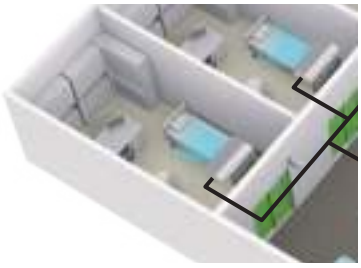
Control



Assist quick response to error

Error notification e-mail and error log / icons on the display enables quick action in case of trouble.

Indoor unit



Comfort air distribution with low noise level



Low static ceiling concealed type

Sound pressure level: Min. 22dB (P15)*
External static pressure: 5, 15, 35, 50 Pa



Medium static ceiling concealed type

Sound pressure level: Min.22dB (P20/25)*
External static pressure: 35 or 40, 50, 70, 100, 150 Pa

* Measured in anechoic room under testing condition. Actual noise depends on installation.

Outdoor/Heat source unit



Outdoor unit

* For the restrictions on piping, please refer to the DATABOOK.

Side flow type

- The side flow type, which has the selection from 4 HP up to 12 HP, contributes to reduction in installation space.
- 1 fan models are more compact, 981 mm [38-5/8 in.] in height



Cooling only (4-12HP)
- PUMY-CP VKM2
- PUMY-CP YKM2
- PUMY-CP YBM2

Heat pump (4-12HP)
- PUMY-SP V(Y)KM2
- PUMY-P YKM3
- PUMY-P YBM2

Top flow type

- A wide lineup of up to 60 HP
- Total piping length of 1000 m [3281 ft.], height difference of 50 m [164 ft.], and high flexibility in piping work
- Features various operation modes, and the unit can be set according to the intended use
- Both standard and high-efficiency models are available



Cooling only (8-60HP)
- PUCY-P Y(S)KE
- PUCY-GP Y(S)KE
- PUCY-EP Y(S)KE



Heat pump (8-60HP)
- PUHY-(E)P Y(S)KD

Heat source unit

- Use of water piping allows for individual air conditioning with no need to worry about height differences.
- Installation of heat source units in machine rooms help reduce influence on building exteriors.



Heat pump (8-36HP)
- PQHY-P YLM-A1

Wide selection of outdoor units

System	Series	Type	Model name	HP / Model	4 P100	5 P125	5.5 P140	7 P175	8 P200	9 P225	10 P250	12 P300	14 P350	16 P400
Air cooled	S	Cooling only	**S-Series** PUMY-CP VKM2 (-BS) PUMY-CP YKM2 (-BS) PUMY-CP YBM2 (-BS)  CP100-CP140 Page 27-Page 29		VKM2 / YKM2 (4)	VKM2 / YKM2 (5)	VKM2 / YKM2 (5.5)	YKM2 (7)	YKM2 (8)	YKM2 (9)	YBM2 (10)	YBM2 (12)		
		Heat Pump	**S-Series** PUMY-SP VKM2 (-BS) PUMY-SP YKM2 (-BS)  Page 30-Page 31		(4)	(5)	(5.5)							
		Heat Pump	**S-Series** PUMY-P YKM3(-BS) PUMY-P YBM2(-BS)  P175-P225 Page 32-Page 33					YKM3 (7)	YKM3 (8)	YKM3 (9)	YBM2 (10)	YBM2 (12)		
	Y	Cooling only	**Y-Series Standard type** PUCY-P YKE(-BS) PUCY-P YSKE(-BS)  Page 57-Page 66	S					(8)		(10)	(12)		
				L									(14)	(16)
				XL										
			Y-Series - High Standard type PUCY-GP YSKE(-BS)  Page 67-Page 71	S										(8)(8)
				L										
				XL										
			Y-Series - High Efficiency type PUCY-EP YKE(-BS)  **Single** Page 72-Page 73	S					(8)		(10)			
				XL								(12)	(14)	(16)
			PUCY-EP YSKE(-BS)  **Combination** Page 74-Page 82	S										(8)(8)
				XL										
		Heat Pump	**Y-Series** PUHY-P YKD(-BS) PUHY-P YSKD(-BS)  Page 83-Page 92	S					(8)		(10)	(12)		
				L									(14)	(16)
				XL										
		Heat Pump	**Y-Series - High Efficiency** PUHY-EP YSKD(-BS)  Page 93-Page 97	S										(8)(8)
				L										
				XL										
Water cooled	Y	Heat Pump	**WY-Series** PQHY-P YLM-A1 PQHY-P YSLM-A1  Page 103-Page 109	S					(8)		(10)	(12)		
				L									(14)	(16)
				S										(8)(8)
				L										

* The circled numbers in the table indicate horse power, and the combination of S, L, and XL modules.

18	20	22	24	26	28	30	32	34	36	38	40	42	44	46	48	50	52	54	56	58	60
P450	P500	P550	P600	P650	P700	P750	P800	P850	P900	P950	P1000	P1050	P1100	P1150	P1200	P1250	P1300	P1350	P1400	P1450	P1500
		10 12	10	10	10	12						12 12	12								
18			14	16	18	18	16 16	16 18	18 18	18		18	14 18	14 16 16	16 16 16	16 16 18	16 18 18	18 18 18	18 18	18	
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				14	14 14	14	14	14	14	14	14 14	14 14 14	14 14 16								
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8 10	10 10	8				8 8	8 10	10 10	8												
		14	12 12	12 14	14 14	14	14	14	14 14	12 12 14	12 14 14	14 14 14	14 14 16	14 16 16	16 16 16	16 16 18	16 18 18	18 18 18	18 18 20	18 20 20	20 20 20
		10 12	10	10	10	12						12 12	12								
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8 10	10 10			12		8 8	8 10	10 10	10 12	12 12	12										
				14	14 14	14	14	14	14	14	14 14	14 14 14	14 14 16								

S-series



PUMY

The line-up of side-flow type outdoor units includes models from 4 HP to 12 HP, which offers flexibility in installations in tight spaces. This type is suitable for small-scale offices and residences. 1-phase type (VKM) and 3-phase type (YKM/YBM) are available.

Heat pump

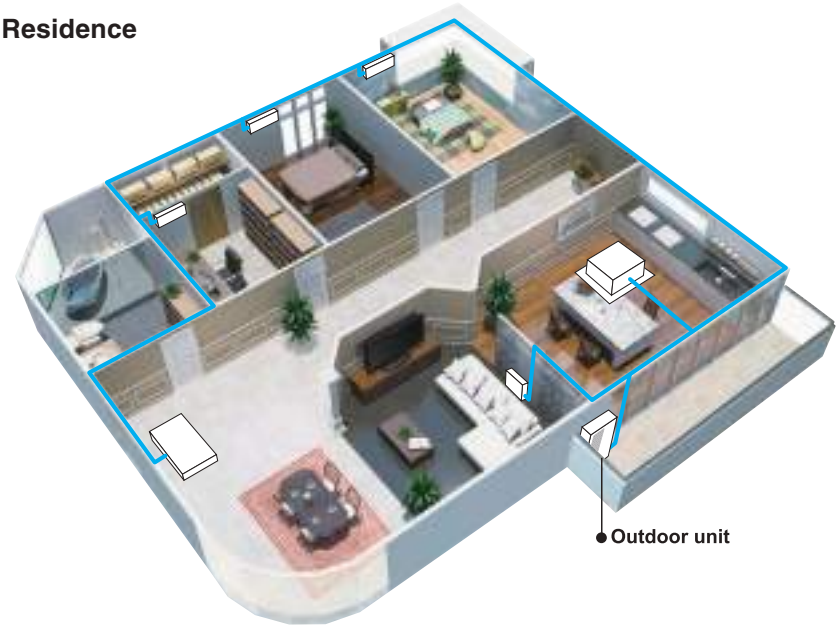
- PUMY-SP VKM2
- PUMY-SP YKM2
- PUMY-P YKM3
- PUMY-P YBM2

Cooling only

- PUMY-CP VKM2
- PUMY-CP YKM2
- PUMY-CP YBM2

Installation image

Residence



Advantage of PUMY (for residences)

One outdoor unit (10 HP-12 HP) can be connected up to 29 indoor units (P15-250). Even when indoor units are installed in many rooms, one outdoor unit can connect multiple indoor units.

↓

Space savings

Wide selection from 4 HP up to 12 HP

Model	100	125	140	175	200	225	250	300
Heat pump	SP100-140V(Y)KM2			P175-225YKM3			P250-300YBM2	
Cooling only	CP100-140V(Y)KM2			CP175-225YKM2			CP250-300YBM2	

10-12 HP (P250-P300) is available!

Heat pump



SP100-140 P175-225 P250-300

Cooling only



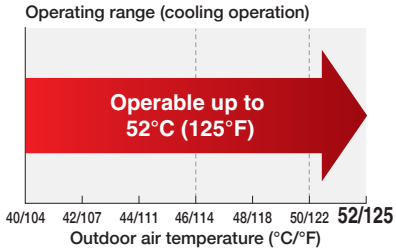
CP100-140 CP175-225 CP250-300

Features

①Operation guaranteed at an outside air temperature of up to 52°C [125°F].

- New inverter technology has made it possible for units to operate at an outdoor air temperature as high as 52°C [125°F].

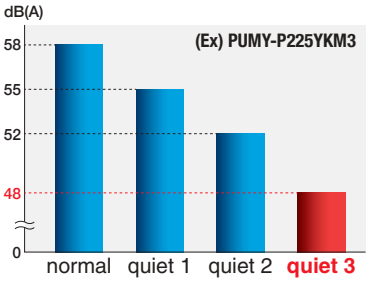
■ **Operation at high temperatures (52°C/125°F)**



②Quiet mode

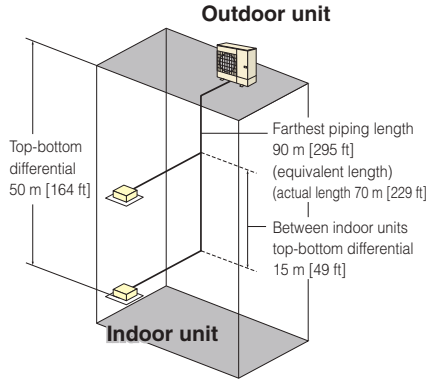
All models have three quiet modes in addition to the normal mode, and a suitable noise mode can be selected from among the four available modes. The noise level can be set according to the application, for example, in a residential zone where noise may be an issue.

* Capacity reduction differs by mode setting.
* PAC-SC36NA-E is required to activate this mode.
* Available during cooling only.



Piping length

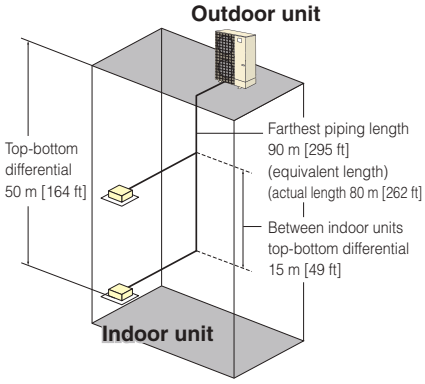
[CP100-140Y/VKM2] [SP100-140Y/VKM2]



Refrigerant Piping Lengths Maximum meters [feet]	
Total length	120 [393]
Maximum allowable length	70 (90 equivalent)[229 (295)]
Farthest indoor from first branch	50 [164]*1

Vertical differentials between units Maximum meters [feet]	
Indoor/outdoor (outdoor higher)	50 [164]
Indoor/outdoor (outdoor lower)	30 [98]
Indoor/indoor	15 [49]

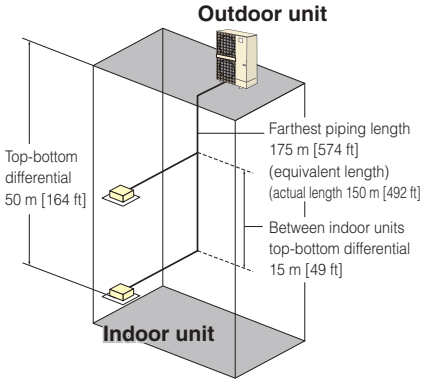
[CP175-225YKM2] [P175-225YKM3]



Refrigerant Piping Lengths Maximum meters [feet]	
Total length	150 [492]
Maximum allowable length	80 (90 equivalent) [262 (295)]
Farthest indoor from first branch	30 [98]

Vertical differentials between units Maximum meters [feet]	
Indoor/outdoor (outdoor higher)	50 [164]
Indoor/outdoor (outdoor lower)	40 [131]
Indoor/indoor	15 [49]

[CP250-300YBM2] [P250-300YBM2]



Refrigerant Piping Lengths Maximum meters [feet]	
Total length	310 [1,017]
Maximum allowable length	150 (175 equivalent) [492 (574)]
Farthest indoor from first branch	30 [98]

Vertical differentials between units Maximum meters [feet]	
Indoor/outdoor (outdoor higher)	50 [164]
Indoor/outdoor (outdoor lower)	40 [131]
Indoor/indoor	15 [49]

*1 Use liquid pipe of ø9.52 for less than P50 indoor units, when farthest length from the first branch exceeds 30m.

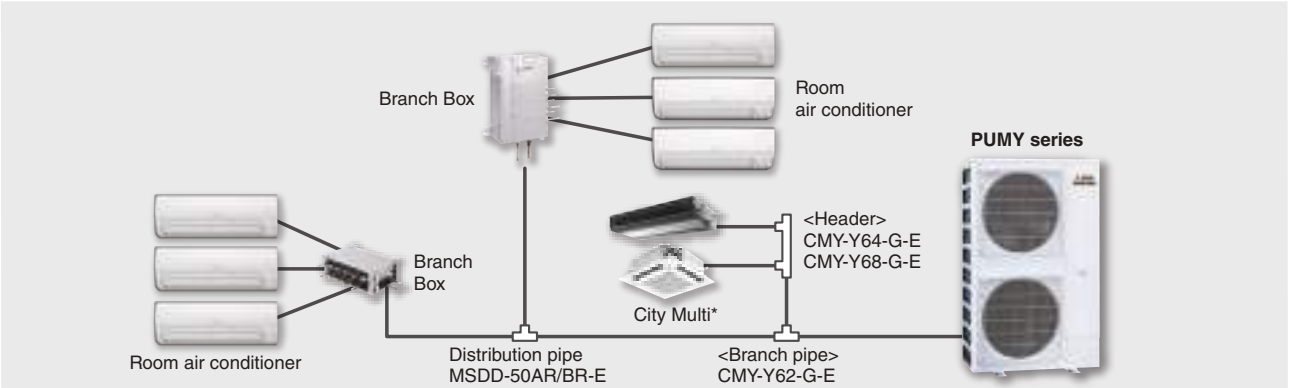
Features of the Branch Box

Connecting branch boxes makes it possible to connect to Mitsubishi Electric indoor units (room air conditioners, Mr. SLIM) that do not normally support M-NET connections.



System example

The use of branch boxes makes it possible for PUMY-Series devices to connect not only to CITY MULTI indoor units but also to Mitsubishi Electric indoor units that do not normally support M-NET connections. Thus it is possible to connect to room air conditioners and Mr. SLIM indoor units, allowing for a selection specifically designed to suit how the room is being used.



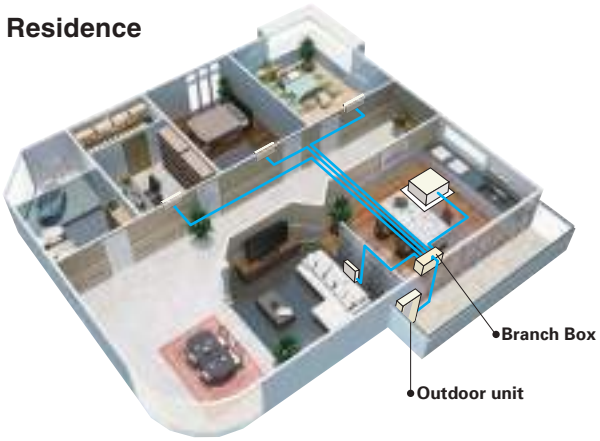
*PKFY-P15/20/25/32 VLM, PFFY-P**VKM, PFFY-P**VLEM and PFFY-P**VCM cannot be used in the mixed system with 4 to 5.5HP and 10 to 12HP outdoor units.

Specifications

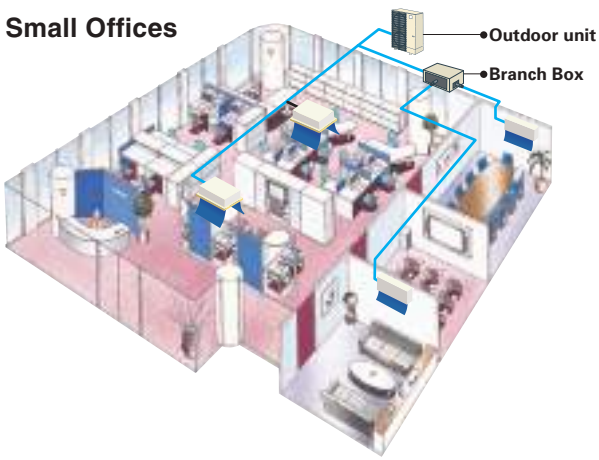
Model				PAC-MK54BC	PAC-MK34BC
Connectable Number of Indoor Units				Max. 5	Max. 3
Power Supply	Source			Outdoor power supply, Branch Box / Outdoor separate power supply	
	Outdoor (V/Phase/Hz)			1-phase, 220/230/240V, 50Hz, 1-phase, 220/230V, 60Hz	
Total Input			kW	0.003	
Operating Current			A	0.05	
Dimensions H x W x D			mm	170 × 450 × 280	
Weight			kg	7.4	6.7
Piping (diameter)	Branch (Indoor Side)	Liquid	mm	6.35 × 5	6.35 × 3
		Gas	mm	9.52 × 4, 12.7 × 1	9.52 × 3
	Main (Outdoor Side)	Liquid	mm	9.52	
		Gas	mm	15.88	
	Connection Method			Flared	
Wiring	to Indoor Unit			3-wire + Earth wire	
	to Outdoor Unit			3-wire + Earth wire	

Installation image

Residence



Small Offices



Consolidating heat sources for room air conditioners, which require a 1:1 connection between the outdoor unit and indoor unit, and reducing installation space is possible.
Because the branch box can be installed indoors or outdoors and mounted on a wall, ceiling, or floor, it is possible to meet the requirements of various installation situations flexibly.

*Please refer to installation manual for installation restrictions.

Precautions for unit construction

- The capacity and number of indoor units when using a branch box differs from situations when no branch box is used. Refer to the installation manual for the each outdoor unit for more information. Moreover, the indoor unit lineup varies from country to country, so contact your local distributor for details.
- Capacity calculations for the entire system will depend on the connected indoor unit. Refer to the installation manual for more information.
- Piping lengths also differ when using a branch box. Refer to the installation manual for the each outdoor unit for more information.

Comparison of Piping Lengths for PUMY-Series Models

			Maximum Meter			
			Only City Multi *1 Indoor Unit	Only Branch Box Connection	Mixed System (City Multi *1 Indoor Unit + Branch Box)	
					City Multi *1 Indoor Unit	Via Branch Box
P250/300 CP250/300	Refrigerant Piping Length	Total Length	310	240	310	
		Maximum Allowable Length	150 (175 equivalent) *2	80	85 (95 equivalent) *2	80
		Farthest Indoor From First Branch	30	30 *3	30	30 *3
	Vertical Differentials Between Units	Indoor/Outdoor(Outdoor higher)	50	50	50	
		Indoor/Outdoor(Outdoor Lower)	40	40	40	
		Indoor/Indoor	15	12	15 *4	
	Refrigerant Piping Length	Total branch pipe length	—	145	—	145
		Farthest branch pipe length	—	25	—	25
		Total main pipe length	—	95	—	95
		Farthest main pipe length	—	—	—	—
	Vertical Differentials Between Units	Branch box/Indoor	—	15	—	15
		Branch box/Branch box	—	15	—	15
P175/200/225 CP175/200/225	Refrigerant Piping Length	Total Length	150	150	150	
		Maximum Allowable Length	80 (90 equivalent) *5	80 *5	80 (90 equivalent) *5	80 *5
		Farthest Indoor From First Branch	30	30 *3	30	30 *3
	Vertical Differentials Between Units	Indoor/Outdoor(Outdoor higher)	50	50	50	
		Indoor/Outdoor(Outdoor Lower)	40	40	40	
		Indoor/Indoor	15	15 *4	15 *4	
	Refrigerant Piping Length	Total branch pipe length	—	95	—	95
		Farthest branch pipe length	—	25	—	25
		Total main pipe length	—	55	—	55
		Farthest main pipe length	—	55 *5	—	55 *5
	Vertical Differentials Between Units	Branch box/Indoor	—	15	—	15
		Branch box/Branch box	—	15	—	15
SP 100/125/140 CP100/125/140	Refrigerant Piping Length	Total Length	120	120	120	
		Maximum Allowable Length	70 (90 equivalent)	80	70 (90 equivalent)	80
		Farthest Indoor From First Branch	50 *6	50 *3	50 *6	50 *3 *6
	Vertical Differentials Between Units	Indoor/Outdoor(Outdoor higher)	50	50	50	
		Indoor/Outdoor(Outdoor Lower)	30	30	30	
		Indoor/Indoor	15	15 *4	15 *4	
	Refrigerant Piping Length	Total branch pipe length	—	95	—	95
		Farthest branch pipe length	—	25	—	25
		Total main pipe length	—	55	—	55
		Farthest main pipe length	—	55	—	55
	Vertical Differentials Between Units	Branch box/Indoor	—	15	—	15
		Branch box/Branch box	—	15	—	15

*1 Include system with connection kit
*2 Liquid pipe diameter: 12.7 mm, in case of further piping length is longer than 90 m, or connect with PEFY-P200/250.
*3 Farthest branch box from first branch.
*4 In case of branch box connection : 12m
*5 Liquid pipe diameter: 12.7 mm, in case of further piping length is longer than 60 m, or the farthest length of main pipe between outdoor unit and branch box is longer than 20 m in branch box system.
*6 Use liquid pipe of ø9.52 for less than P50 indoor units, when farthest length from the first branch exceeds 30m.

Optional Parts for Branch Boxes

Description		Model	Remarks
Joint pipe		MAC-A454JP-E	For φ9.52→φ12.7
		PAC-SG76RJ-E	For φ9.52→φ15.88
		PAC-493PI	For φ6.35→φ9.52
		MAC-A456JP-E	For φ12.7→φ15.88
		MAC-A455JP-E	For φ12.7→φ9.52
		PAC-SG71RJ-E	For φ15.88→φ22.2
		PAC-SG77RJ-E	For φ15.88→φ25.4
Port connector		PAC-SG75RJ-E	For φ15.88→φ19.05
2-Branch pipe	Braze	MSDD-50BR-E	To connect to two branch boxes
	Flare	MSDD-50AR-E	
Branch box outer cover		PAC-AK350CVR-E	
Filter dryer for liquid pipe		PAC-SG82DR-E	For φ9.52

OUTDOOR UNIT

S-series

PUMY-CP VKM2 (-BS)



Specifications

Model				PUMY-CP100VKM2 (-BS)	PUMY-CP125VKM2 (-BS)	PUMY-CP140VKM2 (-BS)
Power source				1-phase 220-230-240 V, 50 Hz; 1-phase 220 V, 60 Hz		
Cooling capacity (Nominal)		*1	kW	11.2	14.0	15.5
		*1	BTU/h	38,200	47,800	52,900
	Power input		kW	2.80	3.84	4.70
	Current input		A	12.99-12.42-11.90, 12.99	17.81-17.04-16.33, 17.81	21.80-20.85-19.98, 21.80
	EER		kW/kW	4.00	3.65	3.30
Temp. range of cooling	Indoor temp.		W.B.	15 to 24°C (59 to 75°F)		
	Outdoor temp.		D.B.	10 to 52°C (50 to 126°F)		
Indoor unit connectable	Total capacity			50 to 150% of outdoor unit capacity *2		
	Model/ Quantity	CITY MULTI		15–125/7	15–140/10	15–140/12
Sound pressure level (measured in anechoic room)		*3	dB <A>	52/-	53/-	54/-
Refrigerant piping diameter	Liquid pipe		mm (in.)	9.52 (3/8) Flared		
	Gas pipe		mm (in.)	15.88 (5/8) Flared		
Fan	Type x Quantity			Propeller Fan × 1		
	Air flow rate		m^3/min	78.8		
			L/s	1,313		
			cfm	2,782		
*4	Motor output		kW	0.20 x 1		
Compressor	Type x Quantity			Twin rotary hermetic compressor × 1		
	Starting method			Inverter		
	Motor output		kW	2.8	3.4	3.6
External finish				Galvanized Steel Sheet Munsell No. 3Y 7.8/1.1		
External dimension H x W x D			mm	981 × 1050 × 330 (+25)		
			in.	38-5/8 × 41-3/8 × 13 (+1)		
Protection devices	High pressure protection			High pressure switch		
	Inverter circuit (COMP./FAN)			Overcurrent detection, Overheat detection (Heat Sink thermistor)		
	Compressor			Compressor thermistor, Overcurrent detection, Compressor protector		
	Fan motor			Overheating, Voltage protection		
Refrigerant	Type x original charge			R410A 2.9kg		
Net weight			kg (lbs)	86 (190) *5		
Heat exchanger				Micro Slit Fin and Copper tube		
Defrosting method				—		
Optional parts				Joint: CMY-Y62-G-E, Header: CMY-Y64/68-G-E		

Notes:

*1 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27ºC DB/19ºC WB (81ºF DB/66ºF WB)	35ºC DB (95ºF DB)	7.5m (24-9/16ft.)	0m (0ft.)

*2 Up to 150% can be connected. However, up to 130% for simultaneous operation.
*3 Cooling mode/Heating mode
*4 External static pressure option is available (30Pa/3.1mmH_2O).
*5 87 (192), for PUMY-CP100/125/140VKM2-BS.
*Nominal conditions *1 are subject to ISO 15042.
*Due to continuing improvement, above specification may be subject to change without notice.
*To prevent noise issue, PUMY-P/SP/CP series cannot be connected with PLFY-P80/100/125VMMD model.

OUTDOOR UNIT

S-series
PUMY-CP YKM2 (-BS)



CP100~140 CP175~225

Specifications

Model				PUMY-CP100YKM2 (-BS)	PUMY-CP125YKM2 (-BS)	PUMY-CP140YKM2 (-BS)	PUMY-CP175YKM2 (-BS)	PUMY-CP200YKM2 (-BS)	PUMY-CP225YKM2 (-BS)
Power source				3-phase 380-400-415 V, 50 Hz; 3-phase 380 V, 60 Hz					
Cooling capacity (Nominal)		*1	kW	11.2	14.0	15.5	20.0	22.4	25.0
		*1	BTU/h	38,200	47,800	52,900	68,200	76,400	85,300
	Power input		kW	2.80	3.84	4.70	5.00	5.74	6.54
	Current input		A	4.48-4.25-4.10, 4.48	6.14-5.83-5.62, 6.14	7.52-7.14-6.88, 7.52	8.94-8.50-8.19, 8.94	10.03-9.53-9.18, 10.03	11.17-10.61-10.23, 11.17
	EER		kW/kW	4.00	3.65	3.30	4.00	3.90	3.82
Temp. range of cooling	Indoor temp.		W.B.	15.0 to 24.0°C (59 to 75°F)					
	Outdoor temp.		D.B.	10 to 52.0°C (50 to 126°F)					
Indoor unit connectable	Total capacity			50 to 150% of outdoor unit capacity *2					
	Model/ Quantity	CITY MULTI		15–125/7	15–140/10	15–140/12	15–200/12	15–250/12	15–250/12
Sound pressure level (measured in anechoic room)		*3	dB <A>	52/-	53/-	54/-	57/-	57/-	58/-
Refrigerant piping diameter	Liquid pipe		mm (in.)	9.52 (3/8) Flared			9.52 (3/8) Flared*4		
	Gas pipe		mm (in.)	15.88 (5/8) Flared			22.2 (7/8) Brazed		
Fan	Type x Quantity			Propeller Fan × 1			Propeller Fan × 2		
	Air flow rate		m^3/min	78.8			134	134	143.8
			L/s	1,313			2,233	2,233	2,397
			cfm	2,782			4,732	4,732	5,078
	*5 Motor output		kW	0.20 x 1			0.20 + 0.20		
Compressor	Type x Quantity			Twin rotary hermetic compressor × 1			Scroll hermetic compressor × 1		
	Starting method			Inverter					
	Motor output		kW	2.6	3.5	3.7	3.5	3.9	4.3
External finish				Galvanized Steel Sheet Munsell No. 3Y 7.8/1.1					
External dimension H x W x D			mm	981 × 1050 × 330 (+25)			1,338 × 1,050 × 330 (+25)		
			in.	38-5/8 × 41-3/8 × 13 (+1)			52-11/16 × 41-11/32 × 13 (+1)		
Protection devices	High pressure protection			High pressure switch					
	Inverter circuit (COMP./FAN)			Overcurrent detection, Overheat detection (Heat Sink thermistor)					
	Compressor			Compressor thermistor, Overcurrent detection, Compressor protector					
	Fan motor			Overheating, Voltage protection					
Refrigerant	Type x original charge			R410A 2.9kg			R410A 6.3kg		
Net weight			kg (lbs)	87 (191) *6			129 (285) *6		
Heat exchanger				Micro Slit Fin and Copper tube			Cross Fin and Copper tube		
Defrosting method				—			Reversed refrigerant circuit		
Optional parts				Joint: CMY-Y62-G-E, Header: CMY-Y64/68-G-E					

Notes:

*1 Nominal conditions

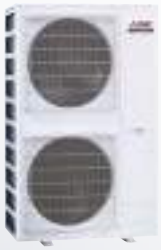
	Indoor	Outdoor	Pipe length	Level difference
Cooling	27ºC DB/19ºC WB (81ºF DB/66ºF WB)	35ºC DB (95ºF DB)	7.5m (24-9/16ft.)	0m (0ft.)

*2 Up to 150% can be connected. However, up to 130% for simultaneous operation.
*3 Cooling mode/Heating mode
*4 Liquid pipe diameter: 12.7mm in case that the farthest piping length is longer than 60m, or piping length from outdoor unit to a branch box is longer than 20m.
*5 External static pressure option for CP100/125/140 is available (30 Pa/3.1 mmH_2O).
*6 88 (195), for PUMY-CP100/125/140YKM2-BS. 130 (287) for PUMY-CP175/200/225YKM2-BS.
*Nominal conditions *1 are subject to ISO 15042.
*Due to continuing improvement, above specification may be subject to change without notice.
*To prevent noise issue, PUMY-P/SP/CP series cannot be connected with PLFY-P80/100/125VMMD model.

OUTDOOR UNIT

S-series

PUMY-CP YBM2 (-BS)



Specifications

Model				PUMY-CP250YBM2 (-BS)	PUMY-CP300YBM2 (-BS)
Power source				3-phase 380-400-415 V, 50 Hz; 3-phase 380 V, 60 Hz	
Cooling capacity (Nominal)	*1		kW	28.0	33.5
	*1		BTU/h	95,500	114,300
	Power input		kW	7.18	8.59
	Current input		A	11.73-11.14-10.74, 11.73	14.03-13.33-12.85, 14.03
	EER		kW/kW	3.90	3.90
Temp. range of cooling	Indoor temp.		W.B.	15.0 to 24.0°C (59 to 75°F)	
	Outdoor temp.		D.B.	10.0 to 52.0°C (50 to 126°F)	
Indoor unit connectable	Total capacity			50 to 150% of outdoor unit capacity *2	
	Model/ Quantity	CITY MULTI		15–250/24	15–250/29
Sound pressure level (measured in anechoic room)			dB <A>	59	60
Refrigerant piping diameter	Liquid pipe		mm (in.)	9.52(3/8) Flared *5	12.7(1/2) Flared
	Gas pipe		mm (in.)	22.2(7/8) Brazed	25.4(1) Brazed
Fan	Type x Quantity			Propeller Fan × 2	
	Air flow rate		m^3/min	178	178
			L/s	2,966	2,966
			cfm	6,285	6,285
	Motor output		kW	0.375 + 0.375	
Compressor *3	Type x Quantity			Scroll hermetic compressor × 1	
	Starting method			Inverter	
	Motor output		kW	6.77	7.59
External finish				Galvanized Steel Sheet Munsell No. 3Y 7.8/1.1	
External dimension H x W x D			mm	1,662 × 1,050 × 460 (+45)	
			in.	65-7/16 × 41-11/32 × 18-7/64 (+1-49/64)	
Protection devices	High pressure protection			High pressure switch	
	Inverter circuit			Overcurrent detection, Overheat detection (Heat Sink thermistor)	
	Compressor			Compressor thermistor, Overcurrent detection, Compressor protector	
	Fan motor			Overcurrent, Overheating, Voltage protection	
Refrigerant	Type x original charge			R410A 8.0kg	
Net weight			kg (lbs)	185 (408) *4	
Heat exchanger				Micro-Slit Fin and Copper tube	
Defrosting method				—	
Optional parts				Joint: CMY-Y62-G-E, Header: CMY-Y64/68-G-E	

Notes:

*1 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference	External static press.
Cooling	27ºC DB/19ºC WB (81ºF DB/66ºF WB)	35ºC DB (95ºF DB)	7.5m (24-9/16ft.)	0m (0ft.)	0 Pa

*2 Up to 150% can be connected. However, up to 130% for simultaneous operation.
*3 External static pressure option is available (30 Pa/3.1 mmH_2O).
*4 187 (413) for PUMY-CP250/300YBM2-BS.
*5 Liquid pipe diameter: 12.7mm, in case of farthest piping length (farthest indoor unit from outdoor unit) is longer than 90m, or connect with PEFY-P200/250.
*Nominal conditions *1 are subject to ISO 15042.
*Due to continuing improvement, above specification may be subject to change without notice.
*To prevent noise issue, PUMY-P/SP/CP series cannot be connected with PLFY-P80/100/125VMMD model.

OUTDOOR UNIT

S-series
PUMY-SP VKM2 (-BS)



Specifications

Model			PUMY-SP100VKM2 (-BS)	PUMY-SP125VKM2 (-BS)	PUMY-SP140VKM2 (-BS)
Power source			1-phase 220-230-240 V, 50 Hz; 1-phase 220 V, 60 Hz		
Cooling capacity (Nominal)	*1	kW	11.2	14.0	15.5
	*1	BTU/h	38,200	47,800	52,900
	Power input	kW	2.78	3.84	4.31
	Current input	A	12.89-12.33-11.82, 12.89	17.81-17.04-16.33, 17.81	19.99-19.12-18.32, 19.99
	EER	kW/kW	4.03	3.65	3.60
Temp. range of cooling	Indoor temp.	W.B.	15 to 24°C (59 to 75°F)		
	Outdoor temp.*3*4	D.B.	-5 to 52°C (23 to 126°F)		
Heating capacity (Nominal)	*2	kW	12.5	16.0	16.5
	*2	BTU/h	42,650	54,600	56,300
	Power input	kW	2.58	3.90	4.02
	Current input	A	11.97-11.45-10.97, 11.97	18.09-17.30-16.58, 18.09	18.65-17.83-17.09, 18.65
	COP	kW/kW	4.84	4.10	4.10
Temp. range of heating	Indoor temp.	D.B.	15 to 27°C (59 to 81°F)		
	Outdoor temp.	W.B.	-20 to 15°C (-4 to 59°F)		
Indoor unit connectable	Total capacity		50 to 130% of outdoor unit capacity		
	Model/ Quantity	CITY MULTI	15–125/7	15–140/10	15–140/12
Sound pressure level (Cooling/Heating) *5 (measured in anechoic room)		dB <A>	51/54	53/56	54/56
Refrigerant piping diameter	Liquid pipe	mm (in.)	9.52 (3/8) Flared		
	Gas pipe	mm (in.)	15.88 (5/8) Flared		
Fan	Type x Quantity		Propeller Fan × 1		
	Air flow rate	m^3/min	75	83	
		L/s	1,283	1,383	
		cfm	2,791	2,931	
*6	Motor output	kW	0.20 x 1		
Compressor	Type x Quantity		Twin rotary hermetic compressor × 1		
	Starting method		Inverter		
	Motor output	kW	2.8	3.4	3.6
External finish			Galvanized Steel Sheet Munsell No. 3Y 7.8/1.1		
External dimension H x W x D		mm	981 × 1050 × 330 (+25)		
		in.	38-5/8 × 41-3/8 × 13 (+1)		
Protection devices	High pressure protection		High pressure switch		
	Inverter circuit (COMP./FAN)		Overcurrent detection, Overheat detection (Heat Sink thermistor)		
	Compressor		Compressor thermistor, Overcurrent detection, Compressor protector		
	Fan motor		Overheating, Voltage protection		
Refrigerant	Type x original charge		R410A 3.5kg		
Net weight		kg (lbs)	93 (205) *7		
Heat exchanger			Cross Fin and Copper tube		
Defrosting method			Reversed refrigerant circuit		
Optional parts			Joint: CMY-Y62-G-E, Header: CMY-Y64/68-G-E, Air protect guide:PAC-SH95AG-E		

Notes:

*1, *2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27ºC DB/19ºC WB (81ºF DB/66ºF WB)	35ºC DB (95ºF DB)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºC DB (68ºF DB)	7ºC DB/6ºC WB (45ºF DB/43ºF WB)	7.5m (24-9/16ft.)	0m (0ft.)

*3 10 to 52ºC D.B. [50 to 126ºF D.B.], when connecting following models: PKFY-P15/20/25/32VLM, PFFY-P20/25/32VLEM, PFFY-P20/25/32VLRM(M), PFFY-P20/25/32VCM, PFFY-P20/25/32VKM, PEFY-P-VMA4 and M-Series, S-Series, and P-Series type indoor unit with branch box, M-Series type indoor unit with connection kit.
*4 -15 to 52ºC D.B. [5 to 126ºF D.B.], when using an optional air protect guide [PAC-SH95AG-E]. However, this condition does not apply to the indoor unit listed in*3.
*5 Cooling mode/Heating mode
*6 External static pressure option is available (30 Pa/3.1 mmH_2O).
*7 94 (207), for PUMY-SP100/125/140VKM2-BS. 95 (209), for PUMY-SP100/125/140YKM2-BS.
*Nominal conditions *1,*2 are subject to ISO 15042.
*Due to continuing improvement, above specification may be subject to change without notice.
*To prevent noise issue, PUMY-P/SP/CP series cannot be connected with PLFY-P80/100/125VMMD model.

OUTDOOR UNIT

S-series
PUMY-SP YKM2 (-BS)



Specifications

Model				PUMY-SP100YKM2 (-BS)	PUMY-SP125YKM2 (-BS)	PUMY-SP140YKM2 (-BS)
Power source				3-phase 380-400-415 V, 50 Hz; 3-phase 380 V, 60 Hz		
Cooling capacity (Nominal)	*1		kW	11.2	14.0	15.5
	*1		BTU/h	38,200	47,800	52,900
	Power input		kW	2.78	3.84	4.31
	Current input		A	4.45-4.22-4.07, 4.45	6.14-5.83-5.62, 6.14	6.89-6.55-6.31, 6.89
	EER		kW/kW	4.03	3.65	3.60
Temp. range of cooling	Indoor temp.		W.B.	15 to 24°C (59 to 75°F)		
	Outdoor temp.*3*4		D.B.	-5 to 52°C (23 to 126°F)		
Heating capacity (Nominal)	*2		kW	12.5	16.0	16.5
	*2		BTU/h	42,650	54,600	56,300
	Power input		kW	2.58	3.90	4.02
	Current input		A	4.13-3.92-3.78, 4.13	6.24-5.93-5.71, 6.24	6.43-6.11-5.89, 6.43
	COP		kW/kW	4.84	4.10	4.10
Temp. range of heating	Indoor temp.		D.B.	15 to 27°C (59 to 81°F)		
	Outdoor temp.		W.B.	-20 to 15°C (-4 to 59°F)		
Indoor unit connectable	Total capacity			50 to 130% of outdoor unit capacity		
	Model/ Quantity	CITY MULTI		15–125/7	15–140/10	15–140/12
Sound pressure level (Cooling/Heating) *5 (measured in anechoic room)			dB <A>	51/54	53/56	54/56
Refrigerant piping diameter	Liquid pipe		mm (in.)	9.52 (3/8) Flared		
	Gas pipe		mm (in.)	15.88 (5/8) Flared		
Fan	Type x Quantity			Propeller Fan × 1		
	Air flow rate		m^3/min	75	83	
			L/s	1,283	1,383	
			cfm	2,791	2,931	
*6	Motor output		kW	0.20 x 1		
Compressor	Type x Quantity			Twin rotary hermetic compressor × 1		
	Starting method			Inverter		
	Motor output		kW	2.6	3.5	3.7
External finish				Galvanized Steel Sheet Munsell No. 3Y 7.8/1.1		
External dimension H x W x D			mm	981 × 1050 × 330 (+25)		
			in.	38-5/8 × 41-3/8 × 13 (+1)		
Protection devices	High pressure protection			High pressure switch		
	Inverter circuit (COMP./FAN)			Overcurrent detection, Overheat detection (Heat Sink thermistor)		
	Compressor			Compressor thermistor, Overcurrent detection, Compressor protector		
	Fan motor			Overheating, Voltage protection		
Refrigerant	Type x original charge			R410A 3.5kg		
Net weight			kg (lbs)	94 (207) *7		
Heat exchanger				Cross Fin and Copper tube		
Defrosting method				Reversed refrigerant circuit		
Optional parts				Joint: CMY-Y62-G-E, Header: CMY-Y64/68-G-E, Air protect guide:PAC-SH95AG-E		

Notes:

*1, *2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27ºC DB/19ºC WB (81ºF DB/66ºF WB)	35ºC DB (95ºF DB)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºC DB (68ºF DB)	7ºC DB/6ºC WB (45ºF DB/43ºF WB)	7.5m (24-9/16ft.)	0m (0ft.)

*3 10 to 52ºC D.B. [50 to 126ºF D.B.], when connecting following models: PKFY-P15/20/25/32VLM, PFFY-P20/25/32VLEM, PFFY-P20/25/32VLRM(M), PFFY-P20/25/32VCM, PFFY-P20/25/32VKM, PEFY-P-VMA4 and M-Series, S-Series, and P-Series type indoor unit with branch box, M-Series type indoor unit with connection kit.
*4 -15 to 52ºC D.B. [5 to 126ºF D.B.], when using an optional air protect guide [PAC-SH95AG-E]. However, this condition does not apply to the indoor unit listed in*3.
*5 Cooling mode/Heating mode
*6 External static pressure option is available (30 Pa/3.1 mmH_2O).
*7 94 (207), for PUMY-SP100/125/140VKM2-BS. 95 (209), for PUMY-SP100/125/140YKM2-BS.
*Nominal conditions *1,*2 are subject to ISO 15042.
*Due to continuing improvement, above specification may be subject to change without notice.
*To prevent noise issue, PUMY-P/SP/CP series cannot be connected with PLFY-P80/100/125VMMD model.

OUTDOOR UNIT

S-series

PUMY-P YKM3 (-BS)



Specifications

Model			PUMY-P175YKM3 (-BS)	PUMY-P200YKM3 (-BS)	PUMY-P225YKM3 (-BS)
Power source			3-phase 380-400-415 V, 50 Hz; 3-phase 380 V, 60 Hz		
Cooling capacity (Nominal)	*1	kW	20.0	22.4	25.0
	*1	BTU/h	68,200	76,400	85,300
	Power input	kW	5.00	5.74	6.54
	Current input	A	8.94-8.50-8.19, 8.94	10.03-9.53-9.18, 10.03	11.17-10.61-10.23, 11.17
	EER	kW/kW	4.00	3.90	3.82
Temp. range of cooling	Indoor temp.	W.B.	15.0 to 24.0°C (59 to 75°F)		
	Outdoor temp. *3*4	D.B.	-5.0 to 52.0°C (23 to 126°F)		
Heating capacity (Nominal)	*2	kW	22.4	25.0	27.3
	*2	BTU/h	76,400	85,300	93,200
	Power input	kW	5.14	5.99	6.80
	Current input	A	9.19-8.73-8.42, 9.19	10.47-9.94-9.58, 10.47	11.61-11.03-10.63, 11.61
	COP	kW/kW	4.35	4.17	4.01
Temp. range of heating *4	Indoor temp.	D.B.	15.0 to 27.0°C (59 to 81°F)		
	Outdoor temp.	W.B.	-20.0 to 15.0°C (-4 to 59°F)		
Indoor unit connectable	Total capacity		50 to 130% of outdoor unit capacity		
	Model/ Quantity	CITY MULTI	15–200/12	15–250/12	15–250/12
Sound pressure level (measured in anechoic room)	*5	dB <A>	57/61	57/61	58/63
Refrigerant piping diameter	Liquid pipe	mm (in.)	9.52 (3/8) Flared *6		
	Gas pipe	mm (in.)	22.2 (7/8) Brazed		
Fan	Type x Quantity		Propeller Fan × 2		
	Air flow rate	m^3/min	134	134	143.8
		L/s	2,233	2,233	2,397
		cfm	4,732	4,732	5,078
	Motor output	kW	0.20 + 0.20		
Compressor	Type x Quantity		Scroll hermetic compressor × 1		
	Starting method		Inverter		
	Motor output	kW	4.3	5.2	5.4
External finish			Galvanized Steel Sheet Munsell No. 3Y 7.8/1.1		
External dimension H x W x D		mm	1,338 × 1,050 × 330 (+25)		
		in.	52-11/16 × 41-11/32 × 13 (+1)		
Protection devices	High pressure protection		High pressure switch		
	Inverter circuit (COMP./FAN)		Overcurrent detection, Overheat detection (Heat Sink thermistor)		
	Compressor		Compressor thermistor, Overcurrent detection, Compressor protector		
	Fan motor		Overheating, Voltage protection		
Refrigerant	Type x original charge		R410A 7.3kg		
Net weight		kg (lbs)	138 (305) *7		
Heat exchanger			Cross Fin and Copper tube		
Defrosting method			Reversed refrigerant circuit		
Optional parts			Joint: CMY-Y62-G-E, Header: CMY-Y64/68-G-E		

Notes:

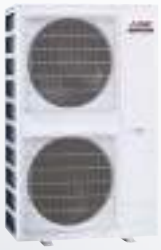
*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27ºC DB/19ºC WB (81ºF DB/66ºF WB)	35ºC DB (95ºF DB)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºC DB (68ºF DB)	7ºC DB/6ºC WB (45ºF DB/43ºF WB)	7.5m (24-9/16ft.)	0m (0ft.)

*3 10 to 52ºC D.B. : When connecting PKFY-P15/20/25/32VLM, PFFY-P20/25/32VKM, PFFY-P20/25/32VLEM, PFFY-P20/25/32VLRM(M), PFFY-P20/25/32VCM, PEFY-P-VMA4, M, S and P series indoor unit.
*4 -15 to 52ºC D.B. [5 to 126ºF D.B.], when using an optional air protect guide [PAC-SH95AG-E]. However, this condition does not apply to the indoor unit listed in*3.
*5 Cooling mode / Heating mode
*6 Liquid pipe diameter: 12.7mm in case that the farthest piping length is longer than 60m, or piping length from outdoor unit to a branch box is longer than 20m.
*7 139 (307) for PUMY-P175/200/225YKM3-BS.
*Nominal conditions *1,*2 are subject to ISO 15042.
*Due to continuing improvement, above specification may be subject to change without notice.
*To prevent noise issue, PUMY-P/SP/CP series cannot be connected with PLFY-P80/100/125VMMD model.

OUTDOOR UNIT

S-series
PUMY-P YBM2 (-BS)



Specifications

Model				PUMY-P250YBM2 (-BS)	PUMY-P300YBM2 (-BS)
Power source				3-phase 380-400-415 V, 50 Hz; 3-phase 380 V, 60 Hz	
Cooling capacity (Nominal)		*1	kW	28.0	33.5
		*1	BTU/h	95,500	114,300
	Power input		kW	6.83	8.17
	Current input		A	11.16-10.60-10.22, 11.16	13.35-12.68-12.22, 13.35
	EER		kW/kW	4.10	4.10
Temp. range of cooling	Indoor temp.		W.B.	15.0 to 24.0°C (59 to 75°F)	
	Outdoor temp.*3*4		D.B.	-5.0~52.0°C (23 to 126°F)	
Heating capacity (Nominal)		*2	kW	31.5	37.5
		*2	BTU/h	107,400	127,900
	Power input		kW	6.06	7.36
	Current input		A	9.90-9.41-9.07, 9.90	12.02-11.42-11.01, 12.02
	COP		kW/kW	5.20	5.10
Temp. range of heating *4	Indoor temp.		D.B.	15.0 to 27.0°C (59 to 81°F)	
	Outdoor temp.		W.B.	-20.0 to 15.0°C (-4 to 59°F)	
Indoor unit connectable	Total capacity			50 to 130% of outdoor unit capacity	
	Model/ Quantity	CITY MULTI		15–250/21	15–250/25
Sound pressure level (measured in anechoic room)		*5	dB <A>	59/60	60/62
Refrigerant piping diameter	Liquid pipe		mm (in.)	9.52(3/8) Flared *8	12.7(1/2) Flared
	Gas pipe		mm (in.)	22.2(7/8) Brazed	25.4(1) Brazed
Fan	Type x Quantity			Propeller Fan × 2	
	Air flow rate		m^3/min	187/183	187/197
			L/s	3116/3050	3116/3283
			cfm	6603/6462	6603/6956
*5	Motor output		kW	0.375 + 0.375	
Compressor	Type x Quantity			Scroll hermetic compressor × 1	
	Starting method			Inverter	
*6	Motor output		kW	6.65	7.35
External finish				Galvanized Steel Sheet Munsell No. 3Y 7.8/1.1	
External dimension H x W x D			mm	1,662 × 1,050 × 460 (+45)	
			in.	65-7/16 × 41-11/32 × 18-7/64 (+1-49/64)	
Protection devices	High pressure protection			High pressure switch	
	Inverter circuit (COMP./FAN)			Overcurrent detection, Overheat detection (Heat Sink thermistor)	
	Compressor			Compressor thermistor, Overcurrent detection, Compressor protector	
	Fan motor			Overcurrent, Overheating, Voltage protection	
Refrigerant	Type x original charge			R410A 9.3kg	
Net weight			kg (lbs)	192 (424) *7	
Heat exchanger				Ring Fin and Copper tube	
Defrosting method				Reversed refrigerant circuit	
Optional parts				Joint: CMY-Y62-G-E, Header: CMY-Y64/68-G-E	

Notes:

*1, *2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference	External static press.
Cooling	27ºC DB/19ºC WB (81°F DB/66°F WB)	35ºC DB (95°F DB)	7.5m (24-9/16ft.)	0m (0ft.)	0 Pa
Heating	20ºC DB	7ºC DB/6ºC WB (45°F DB/43°F WB)	7.5m (24-9/16ft.)	0m (0ft.)	0 Pa

*3 10 to 52ºC D.B. : When connecting PKFY-P15/20/25/32VLM, PFFY-P20/25/32VKM, PFFY-P20/25/32VLEM, PFFY-P20/25/32VLRM(M), PFFY-P20/25/32VCM, PEFY-P-VMA4, M, S and P series indoor unit.
*4 -15 to 52ºC D.B. [5 to 126ºF D.B.], when using an optional air protect guide [PAC-SH21AG-E]. However, this condition does not apply to the indoor unit listed in*3.
*5 Cooling mode/Heating mode
*6 External static pressure option is available (30 Pa/3.1 mmH_2O).
*7 194 (428) for PUMY-P250/300YBM2-BS.
*8 Liquid pipe diameter: 12.7mm, in case of farthest piping length (farthest indoor unit from outdoor unit) is longer than 90m, or connect with PEFY-P200/250.
*Nominal conditions *1,*2 are subject to ISO 15042.
*Due to continuing improvement, above specification may be subject to change without notice.
*To prevent noise issue, PUMY-P/SP/CP series cannot be connected with PLFY-P80/100/125VMMD model.

Optional Parts for Outdoor Units

For PUMY-Series

Description	Model	Remarks
Air protect guide	PAC-SH95AG-E	For PUMY-SP VKM2/YKM2, PUMY-CP VKM2/YKM2, PUMY-P YKM3* *Two are needed for PUMY-CP175/200/225YKM2, PUMY-P175/200/225YKM3
	PAC-SK21AG-E	Two are needed for PUMY-(C)P250/300YBM2
Air outlet guide	PAC-SH96SG-E	For PUMY-SP VKM2/YKM2, PUMY-CP VKM2/YKM2, PUMY-P YKM3* *Two are needed for PUMY-CP175/200/225YKM2,PUMY-P175/200/225YKM3
	PAC-SK22SG-E	Two are needed for PUMY-(C)P250/300YBM2
Drain socket	PAC-SG61DS-E	For PUMY-SP VKM2/YKM2, PUMY-CP VKM2/YKM2, PUMY-P YKM3
	PAC-SK27DS-E	For PUMY-(C)P250/300YBM2
Centralized drain pan	PAC-SH97DP-E	For PUMY-SP VKM2/YKM2, PUMY-CP VKM2/YKM2, PUMY-P YKM3
	PAC-SJ83DP-E	For PUMY-(C)P250/300YBM2
Connection kit	PAC-LV11M-J	
Branch pipe	CMY-Y62-G-E	For 2 branches
Header	CMY-Y64-G-E	For 4 branches
	CMY-Y68-G-E	For 8 branches

Y-series

PUCY/PUHY

These models are provided with high-performance inverter compressors to achieve high energy-saving performance. A wide lineup of models with up to 60 HP can be applied to various usage.



The CITY MULTI Y-Series (for large applications) makes use of a two-pipe refrigerant system, and realizes enhanced cooling capacity at high outside air temperatures. The compact outdoor unit utilizes R410A refrigerant and an INVERTER-driven compressor to use energy effectively. The CITY MULTI Series can be configured for all applications. Up to 50 (Y-Series) indoor units can be connected with up to 130% connected capacity to maximize engineering design options. This feature allows easy air conditioning in each area with convenient individual controllers.

System structure example

System Pipe Lengths

We use a two-pipe system. Unlike chiller system, VRF system does not require pumps or control panels, and these functions are integrated into the outdoor units. The piping can be designed appropriately to any building design by using joints and headers and flexibly adapted to many applications.

No separate transfer device such as pump required

Outdoor unit



PUCY/PUHY series

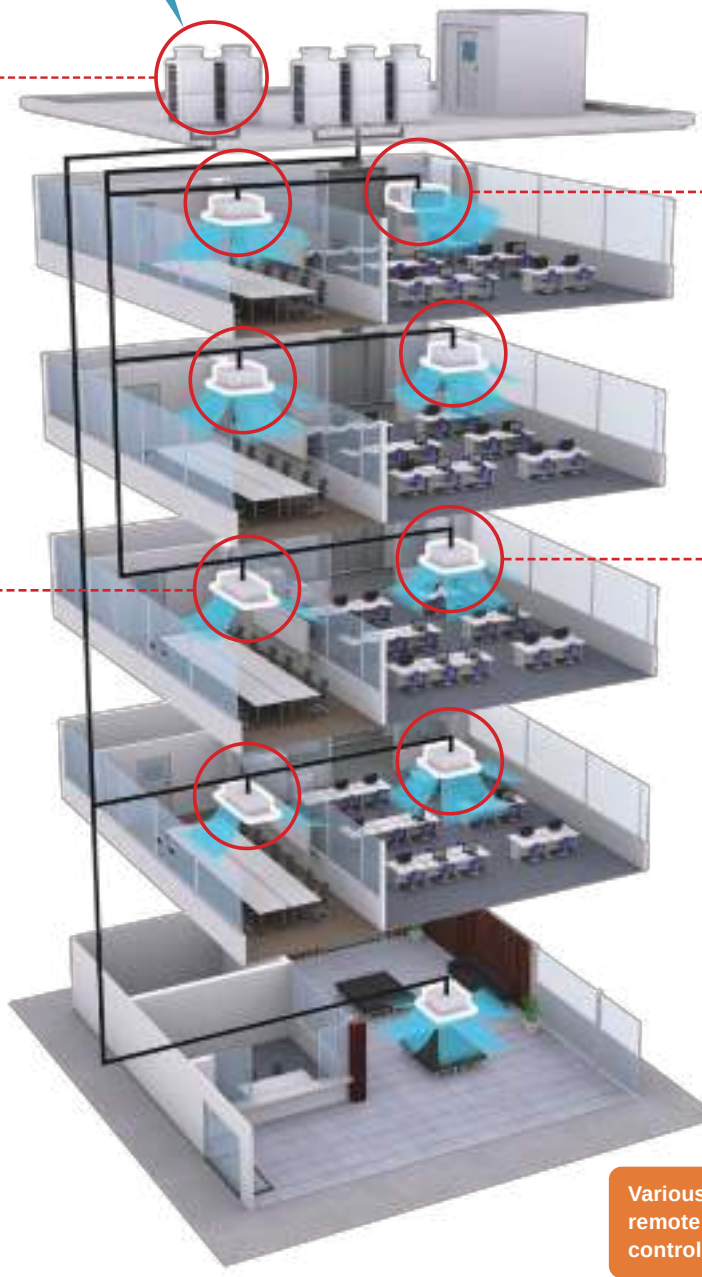
- Further enhanced energy savings
- High cooling capacity at high outdoor air temperatures
- High reliability

2-way air flow



PLFY-P VMMD

- Stylish design with well blended air inlet
- The unit is 290 mm [11-7/16 in.] in height and usable in corridor or a narrow room



Ceiling concealed



PEFY-P VMA(L)-E4

- Thin design with a body height of 250 mm [9-7/8 in.]
- The rear or bottom air inlet can be selected depending on the installation situation

4-way air flow



PLFY-P VHM-PA

- 3D i-see Sensor and versatile airflow variation provide comfort to all corners of the room.

Various control from local remote controllers to centralized controllers is possible



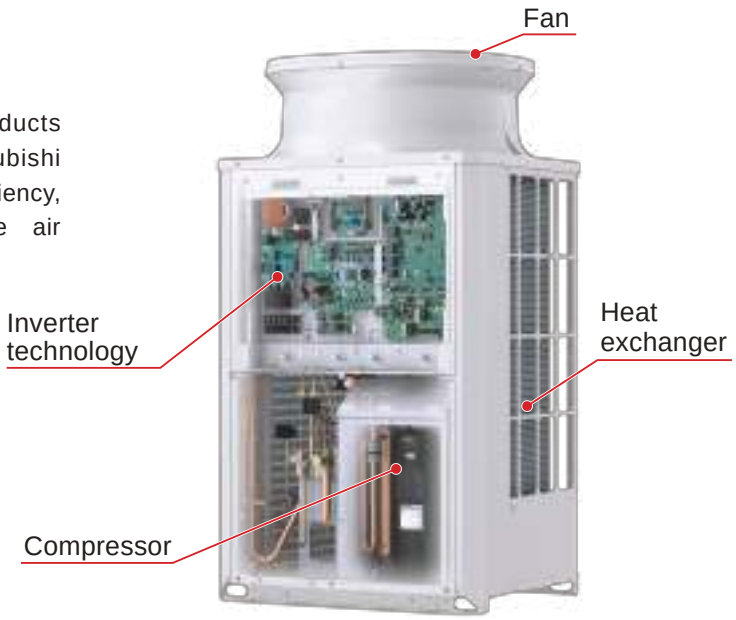
AE-C400E-X PAR-41MAAM

Various lineups

CITY MULTI includes various types of outdoor units, indoor units and controllers. The customers can easily select the models according to their situation. The units can be individually controlled, and it is possible to start or stop the air conditioner and set the conditions, such as temperature, in each room.

Key Technologies

All major parts of YKE and YKD series products reflect technological excellence of Mitsubishi Electric. This results in high energy efficiency, enhanced cooling capacity at high outside air temperatures, and further improved reliability.



Inverter technology

As a manufacturer of general electric equipment, our inverter-related components are developed and manufactured using Mitsubishi Electric technology.

All compressors are inverter-driven type and developed and manufactured by Mitsubishi Electric

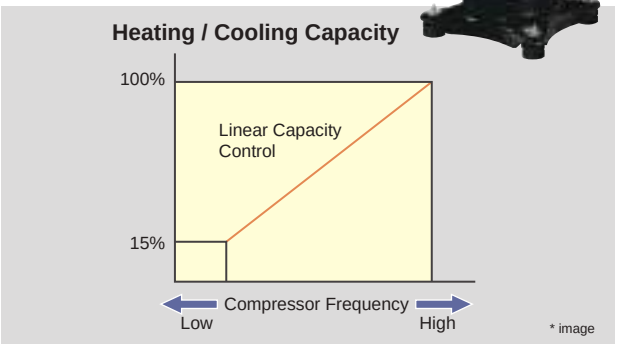
PUCY P PUCY GP PUCY EP PUHY P PUHY EP

Developed by Mitsubishi Electric



The compressor varies its speed to match the indoor cooling or heating demand, thus it only consumes the energy amount of energy required.

When an inverter driven system is operating at partial load, the energy efficiency of the system is significantly higher than that of a standard fixed speed, non inverter system.
The fixed speed system can only operate at 100%, although full load condition is not prevailed all time. Therefore, fixed speed systems cannot match the annual efficiency of inverter driven systems.



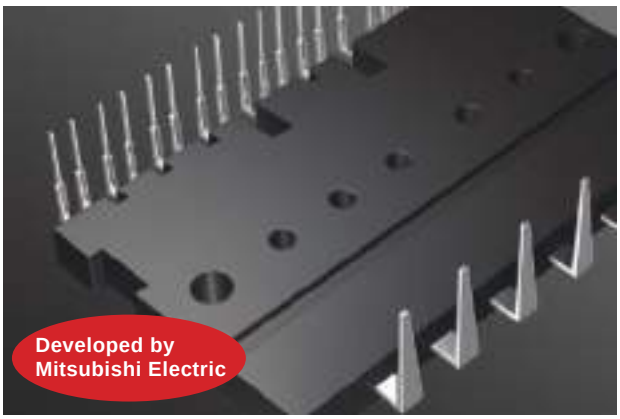
* Values vary depending on actual conditions, such as ambient temperature.

Intelligent Power Module (IPM) manufactured by Mitsubishi Electric

PUCY P PUCY GP PUCY EP PUHY P PUHY EP

Power modules manufactured by Mitsubishi Electric* are installed in the inverter circuit boads that drive compressors and fans. Furthermore, a specialized drive circuit that ensures excellent performance make a high-quality, high-performance inverter possible.
IPM technology ensures effective operation even at lower partial load and realizes automatic control to operate the air conditioners appropriately according to the situation, resulting in energy savings.

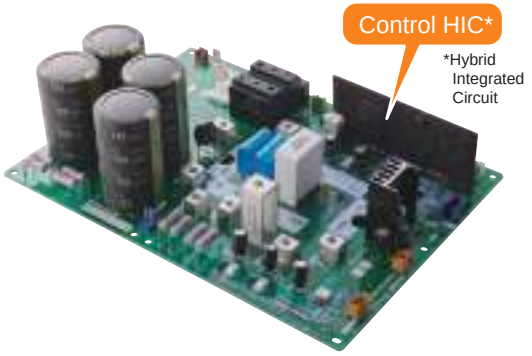
*Except models using PUHY-P200/250YKD module.



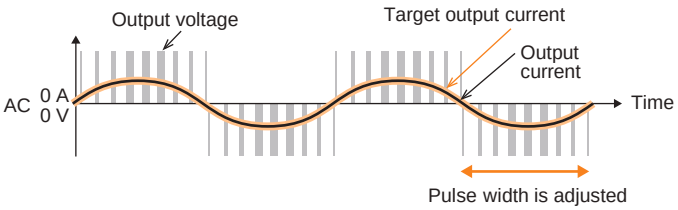
PWM control

PUCY P | PUCY GP | PUCY EP | PUHY P | PUHY EP

PWM control is used to control the number of motor revolutions according to operational load. It varies the inverter pulse width (electric signal wave occurring over a short period) to control the output.
Optimal control of electrical current is required according to operation.

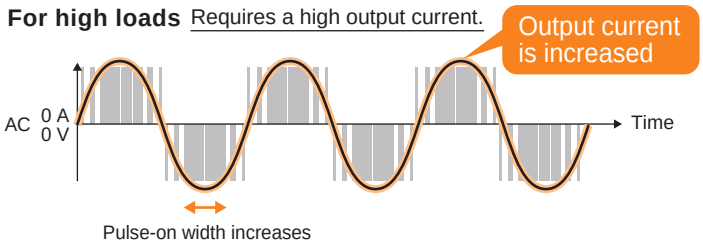


• For low loads Does not require a high target output current.



To achieve the target output current, the intervals at which the “pulse” signal is turned on are controlled to adjust the output current.
At low load time, the pulse-on width is minimized to save energy.

• For high loads Requires a high output current.



The increased pulse-on width increases both the duration that the voltage is applied and the amount of electrical current compared to the low load time, and accelerates the rotation speed of the compressor from 60 rps to 120 rps.*

*The number of compressor rotations differs depending on the usage condition.

The ability to adjust the pulse range and output current to suit a given load increases the operating range of the unit.

Compressor

Multi-port mechanism

PUCY P PUCY GP PUCY EP PUHY P PUHY EP

In addition to the conventional discharge port, the multi port design model features two sub-ports, which performes according to the air conditioning load. This prevents excessive compression and improves operation efficiency.

Conventional structure

		Operation pattern	
		Partial load	Rating, high pressure difference
Main port	Valve 1	Open	Open

Structure with multi-port design

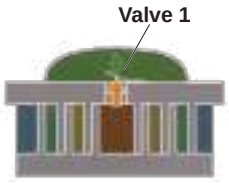
		Operation pattern	
		Partial load	Rating, high pressure difference
Main port	Valve 1	Open	Open
Sub-port	Valve 2/3	Open	Closed

The sub-port is opened during partial load operation to discharge the over-compressed gas.

In case of partial load operation

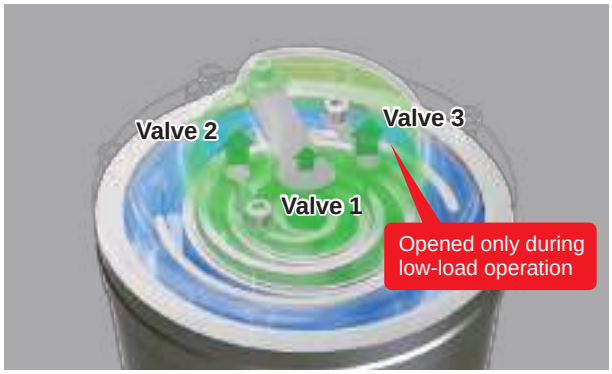
Conventional structure

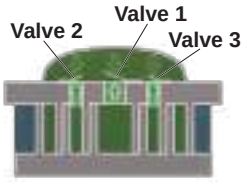




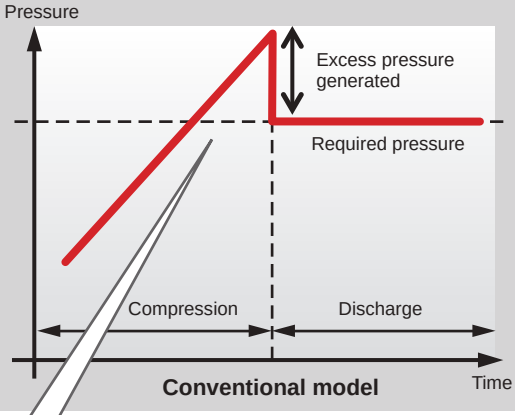
Structure with multi-port design

* Depend on model.

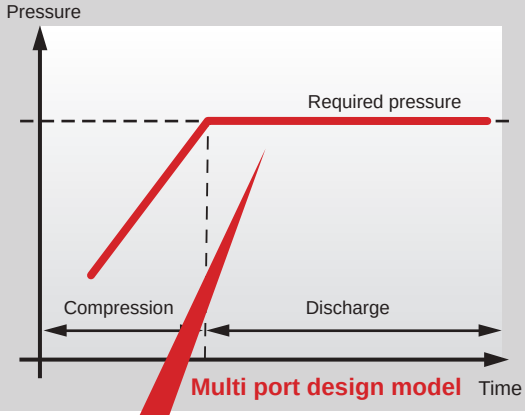




■ Concept of refrigerant pressure (during partial-load operation, etc.)



■ Concept of refrigerant pressure



Conventional model

Because there is only one discharge port, compression capacity is first raised regardless of load, and then lowered to the target discharge pressure. This results in operation loss due to over-compression.

Multi-port

When the target discharge pressure is reached, the multi-ports are opened to release refrigerant gas.
This reduces operation loss due to over-compression.

Compressor

Snap-in core

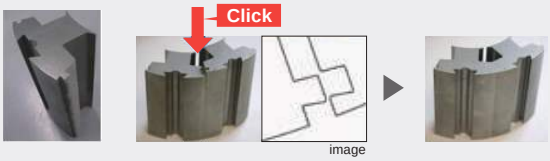
PUCY P PUCY GP PUCY EP PUHY P PUHY EP

Mitsubishi Electric has incorporated a new and original production process that wraps a conductor directly around the split core to create a compact and highly efficient motor.

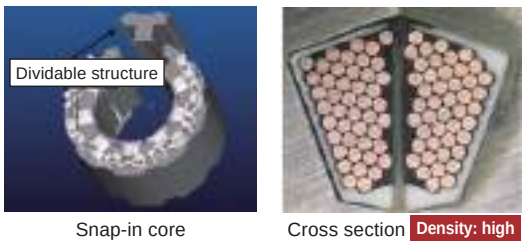
Feature 1: Coils wound around each core



Feature 2: Snap-in core



Compressor motor



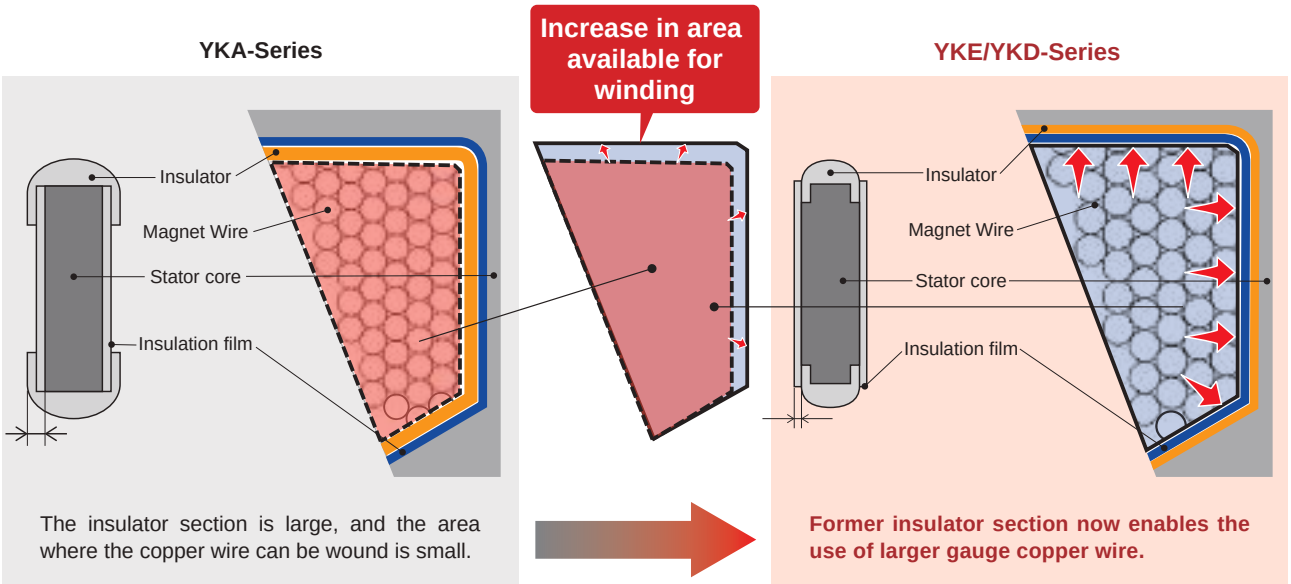
Motor efficiency is high at low speeds when coil occupancy is high, thus improving compression efficiency for low-load operation.

Improved high-efficiency motor

PUCY P PUCY GP PUCY EP PUHY P PUHY EP

*Except for models using PUHY-P200-350YKD, PUCY-P200-P300YKE, PUCY-EP200-EP350YKE modules.

Whereas the motor core of the conventional model had dead space between the insulator and insulation film, the YKE and YKD model has a smaller insulator with film on the inside. Consequently, the area for copper wire winding has increased by 9%. The wire diameter also was increased by two sizes, resulting in lower resistance and reduced insulation distance.
This boosts motor efficiency, thus also improving compressor efficiency.



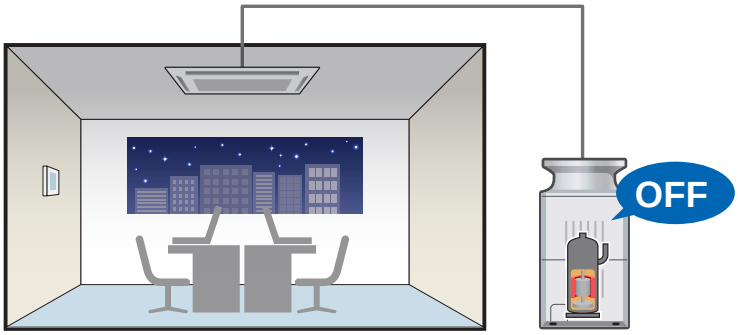
IH (induction heating) warmer

In order to prevent refrigerant and oil from mixing while the air conditioner is stopped, it is necessary to always warm the compressor. Mitsubishi Electric provides the required heating by energizing the windings of the compressor (using a voltage that does not drive the compressor motor) instead of a belt type heater that applies heat from the outside, resulting in reduced loss and lower power consumption. In addition, remains on for 30 minutes after operation is stopped, and subsequently is switched on and off every 30 minutes. Standby power consumption therefore is lower than with a belt heater that is constantly powered.

* Normally, the compressor is heated while the outdoor unit is stopped to prevent liquid refrigerant from remaining in the compressor and to evaporate the liquid refrigerant in the compressor.



Standby power consumption can be reduced when the air conditioner is stopped overnight in offices or other locations.

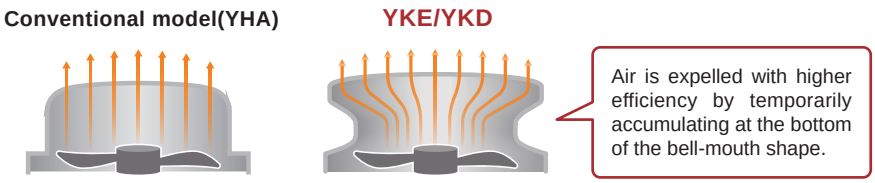


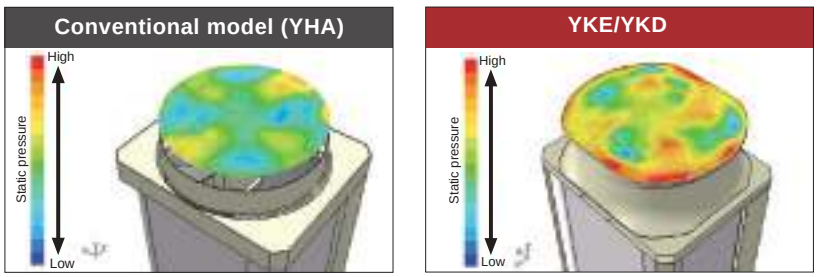
Internal heating reduces power consumption during standby.
This provides an advantage over designs that are constantly powered.

Fan and Fan motor

Bell-mouth shape design realizes higher air discharge efficiency

This design reduces the fan input value and contributes to energy savings. In addition, more efficient air discharge improves stability during operation at high outside air temperatures.





Heat Inter-Changer (HIC) circuit

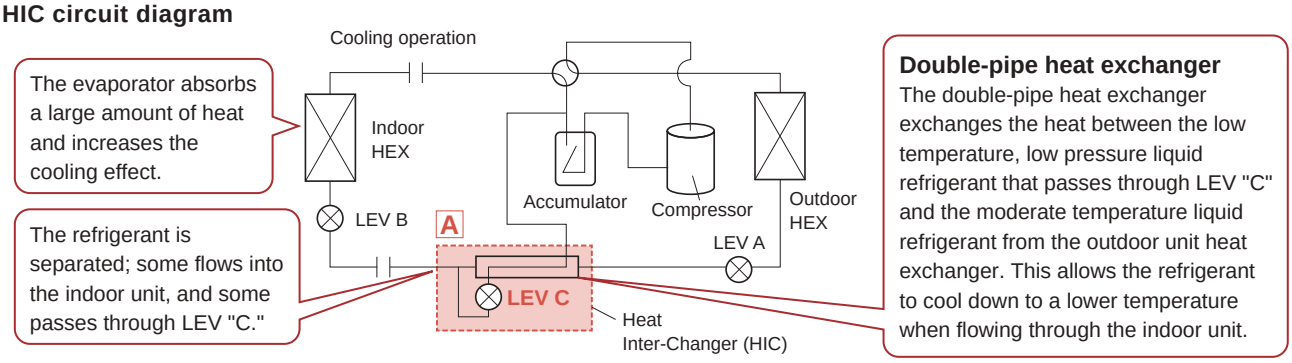
PUCY P PUCY GP PUCY EP PUHY P PUHY EP

The HIC circuit increases cooling efficiency. This technology raises the degree of supercooling, increasing both cooling capacity and cooling efficiency.
The HIC circuit is installed before the point at which the high pressure liquid refrigerant, which passes through the heat exchanger of the outdoor unit, flows into the indoor unit. The temperature of the liquid refrigerant, to which heat is discharged from the outdoor unit heat exchanger, is further lowered before the refrigerant enters the expansion valve, to allow the evaporator to absorb a large amount of heat and increase cooling efficiency.

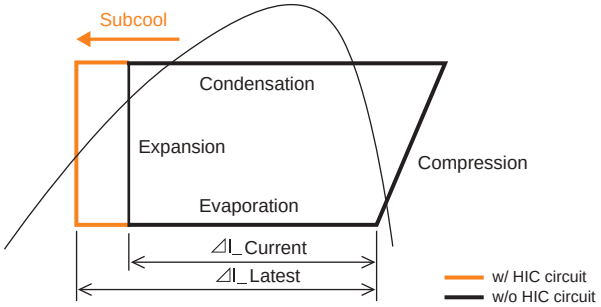
HIC mechanism

Some of the high pressure liquid refrigerant that passes through the outdoor unit heat exchanger flows directly into the indoor unit, and the rest passes through linear expansion valve (LEV) "C" to lower both the temperature and pressure. The heat is exchanged between the low temperature, low pressure liquid refrigerant that passes through LEV "C" and the moderate temperature liquid refrigerant from the outdoor unit heat exchanger. This further lowers the temperature of the liquid refrigerant before it enters LEV "B." This heat exchange system uses a "double-pipe" heat exchanger.

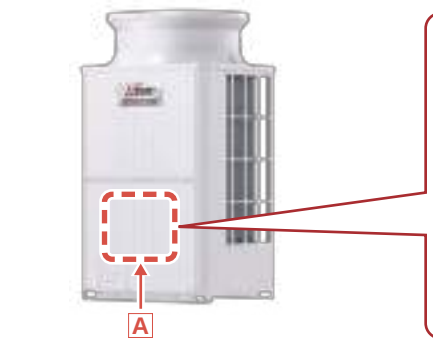
HIC circuit diagram



HIC circuit effect (Image using a Mollier diagram)

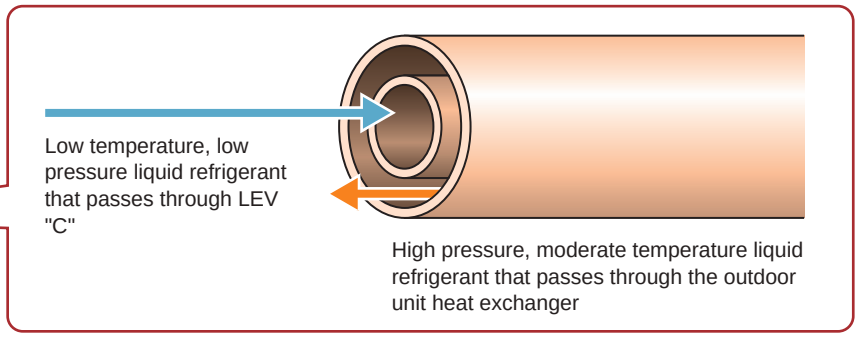


HIC circuit (Double-pipe heat exchanger)



Heat Inter-Changer (HIC) circuit

Double-pipe heat exchanger cross section (High-performance grooved pipe)



YKE-series

The YKE series not only realize high energy savings and quality performance from Mitsubishi Electric, they also feature further improved reliability. This is especially important in the Asian climate which requires cooling capacity at high outside air temperatures.



S module



L module



XL module

* Product images are PUCY models

Three lines of models meet a range of energy-saving requirements.

Standard (PUCY-P)

Compact design that delivers standard efficiency. Provides flexible installation options and high energy efficiency.

High standard (PUCY-GP)

Combining the standard line with even greater efficiency.

High efficiency (PUCY-EP)

Delivers the highest energy efficiency and partial load within the YKE series.

Further enhanced energy savings

- Higher EER rating in all models (compared to conventional models)
- Improved energy efficiency under partial load conditions
- Greater energy savings with evaporating temperature control

High cooling capacity in high outdoor air temperatures

- Operation is guaranteed up to an outside air temperature (intake temperature) of 52°C.
- The assist function boosts cooling power at high outside air temperatures.
- Startup time is reduced in rapid mode.

High reliability

- The structure comprises high-reliability components, including a low-pressure shell compressor and polyurethane-coated circuit boards.
- Enhanced operational reliability is achieved by an emergency operation mode, rotation function, etc.

High installation flexibility

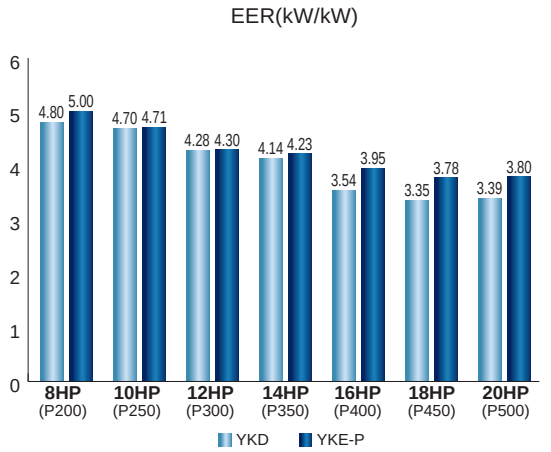
- A two-pipe system and M-NET wiring allow flexible installation options.
- External static pressure can be set to match site conditions.

Higher EER ratings

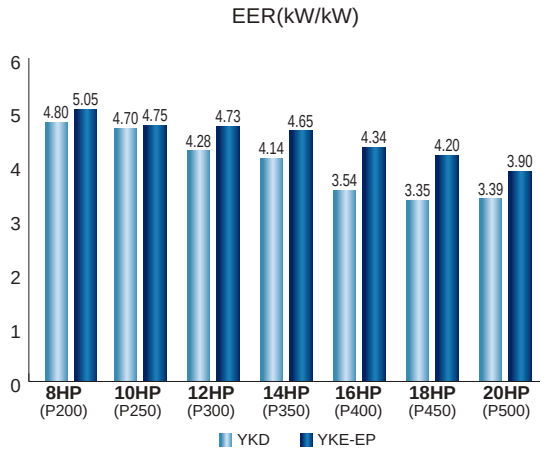
Improved ratings for all models

Compared to conventional products (YKD series), the YKE series achieves improved EER in all models and heat pump models from 8 to 60HP.

PUCY-P Standard (Cooling only)

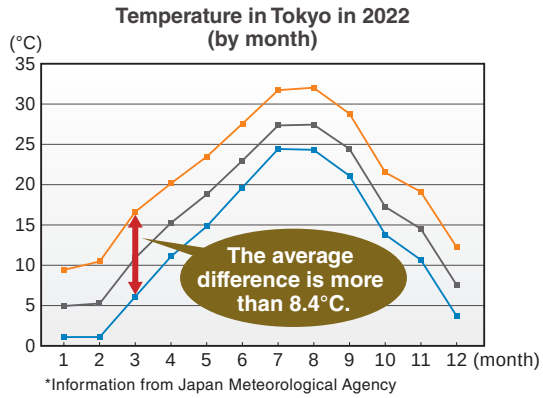


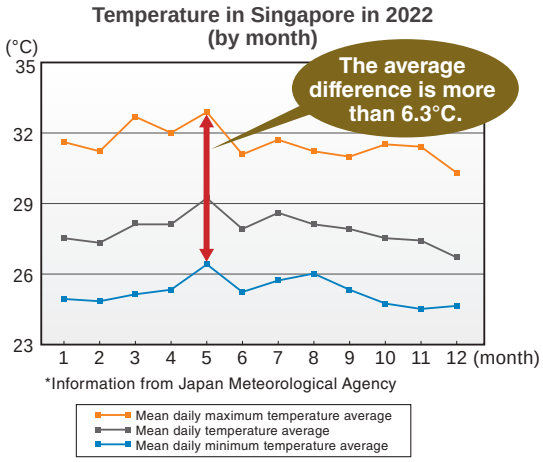
PUCY-EP High efficiency (Cooling only)

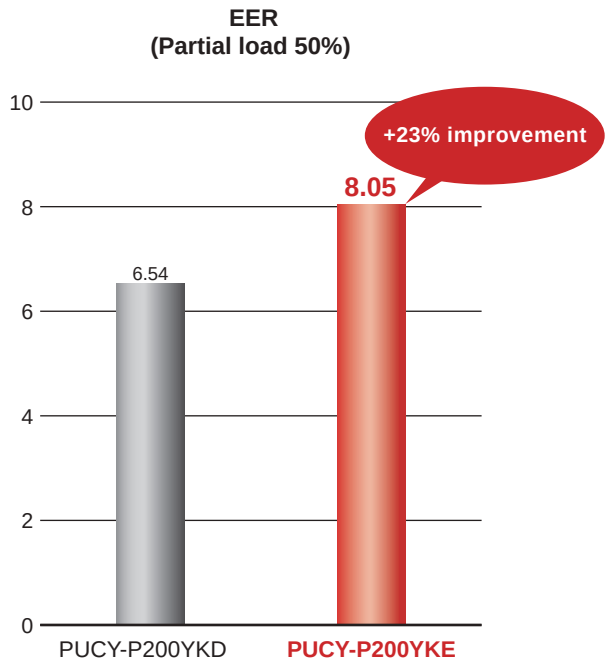


High partial-load performance

At times when the temperature difference between daytime and morning/evening is large, efficient operation also under low-load conditions is important. The multi-port design of the compressor helps to improve partial-load efficiency compared to conventional models, enabling highly efficient operation throughout the year, including season changeover periods.







Further enhanced energy savings

Energy saving assist function

In addition to the basic energy saving design, energy saving assist functions can be activated easily via DIP switch settings. This allows matching the equipment to various installation patterns.

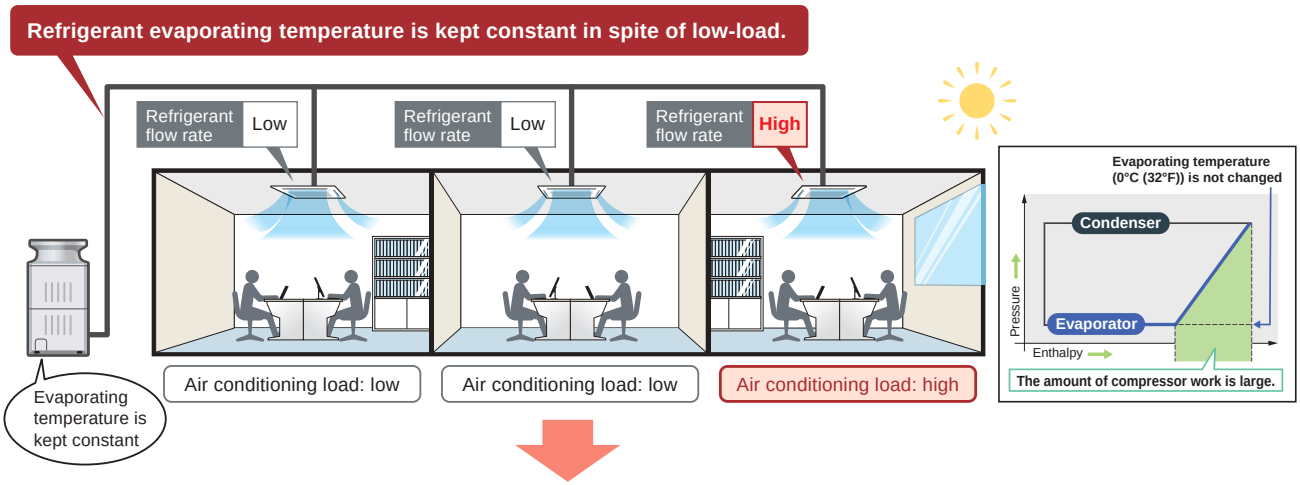
Evaporating temperature control

PUCY P | PUCY GP | PUCY EP | PUHY P | PUHY EP

During cooling operation, the temperature of the refrigerant can be controlled according to the air conditioning load. This helps energy efficient operation.

■ Normal mode

The evaporating temperature is kept constant regardless of the load. Even at low loads, the normal evaporating temperature does not change, which leads to energy waste during partial load operation.



■ Smart evaporation temperature control mode

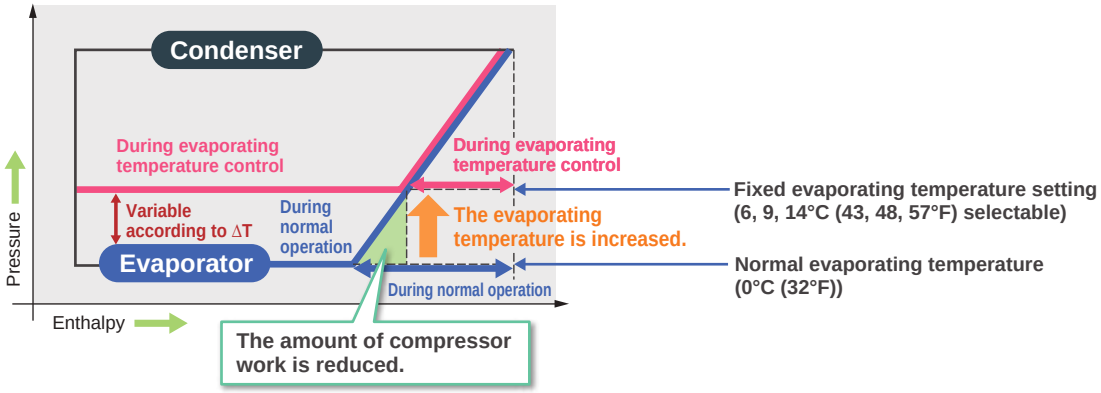
The YKE and YKD series supports evaporating temperature control which adjusts the refrigerant evaporating temperature. Two control methods are available: fixed control and automatic shift control.

* Changing the evaporating temperature is achieved by changing DIP switch settings on the outdoor unit. Refer to "Evaporating temperature setting method" and the Service Handbook for details.
* Raising the evaporating temperature will lower the latent heat processing capability. Select the appropriate mode for the installation location, taking factors such as ambient temperature into consideration.

1. Fixed control

The target evaporating temperature is changed and controlled to be constant. Selecting an evaporating temperature that is higher than for normal cooling will reduce the load of the compressor and improve operation efficiency.

• Concept of evaporating temperature control (fixed control)



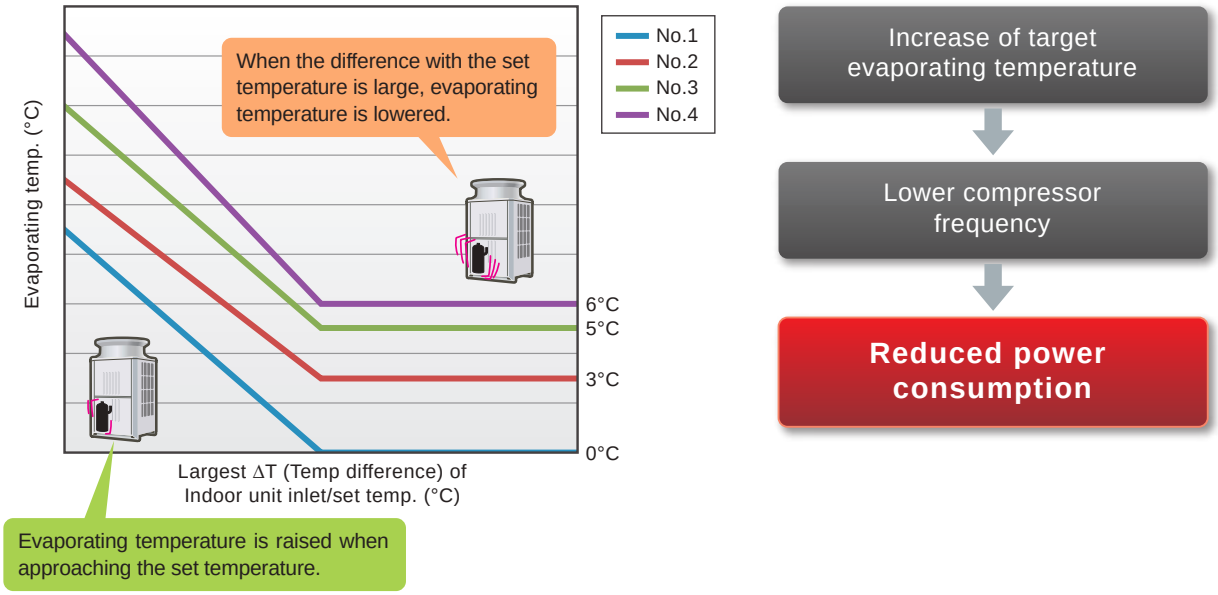
* Because evaporating temperature will constantly be higher, cooling capacity is reduced, which may result in the room not reaching the set temperature.
* To change the evaporating temperature setting, it is necessary to change the setting of the DIP switch on the outdoor unit.

2. Automatic shift control

Evaporating temperature is shifted according to the air conditioning load (ΔT). When approaching the set temperature, evaporating temperature is raised to reduce compressor workload and save energy. Four control patterns can be selected.

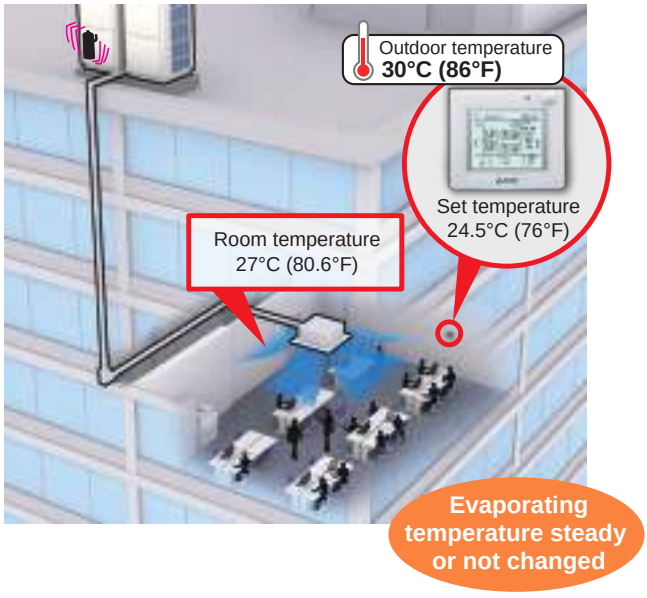
- **Concept of evaporating temperature control (automatic shift control)**

4 patterns for setting target evaporating temperature

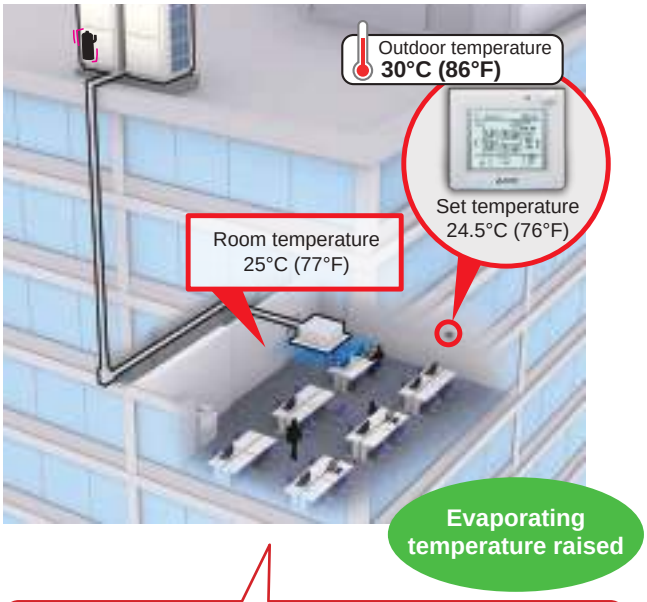


*1 To activate evaporating temperature control, use terminal external input.
*2 To change the evaporating temperature setting, it is necessary to change the setting of the DIP switch on the outdoor unit.

High load At start of operation / With many people inside the room



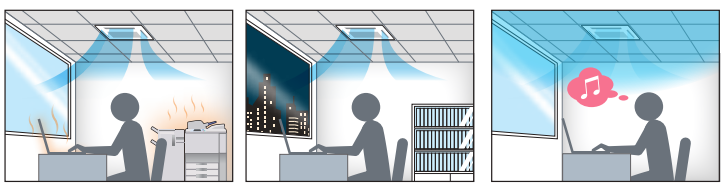
Low load As room temperature approaches set temperature



Evaporating temperature is changed according to the difference between room temperature and set temperature.

Suitable situations

(1) Locations with mainly sensible heat load by OA equipment (offices and similar)
(2) Relatively low-load conditions during air conditioning season (mornings or nights)
(3) When higher temperature of discharge air is desired in windy conditions



Cooling capacity at high outdoor air temperatures

1. Cooling operation possible up to intake temperature of 52°C

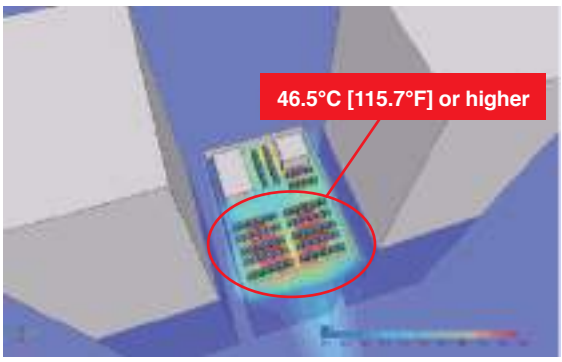
PUCY P | PUCY GP | PUCY EP | PUHY P | PUHY EP

In built-up areas with a high density of buildings, winds may be blocked, causing an accumulation of warm air in the vicinity of the outdoor unit. Because the operation range of the YKE series has been guaranteed up to 52°C (126°F), operation will remain stable even in such situations.

Example of flow analysis

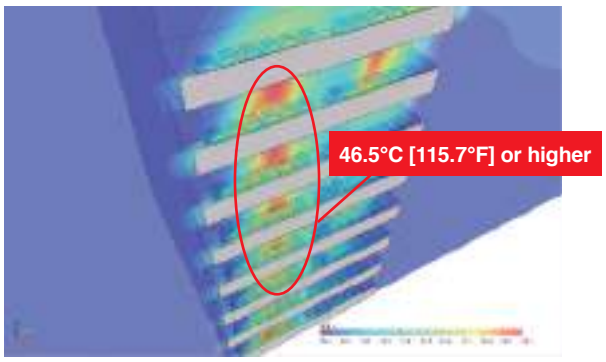
■ Conditions : Outdoor air temperature = 35°C (DB), Room temperature = 27°C (DB)

Built-up area with buildings and outdoor units



If the passage of air is blocked in a built-up area, the high-temperature air discharged from the outdoor units may be kept around the units.

Installation on each floor a high-rise building



When the outdoor units are installed on balconies, the high-temperature air discharged from the units may be kept in by upper balconies.

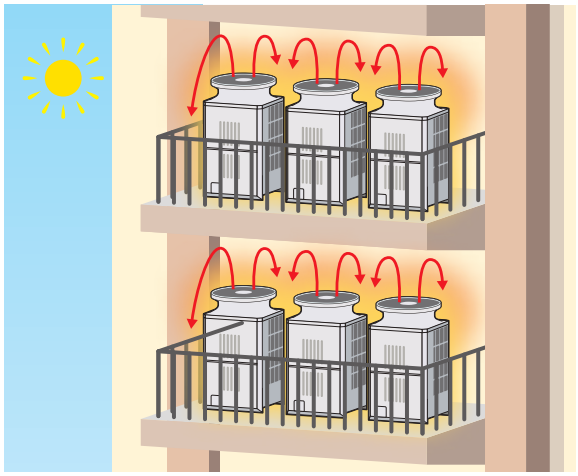
Cooling even under high outside temperature

Cooling only model

From 10°C [50°F] up to **52°C [126°F]**

Suitable situations

Installation in locations such as on balconies or between buildings, where high-temperature air may tend to accumulate.





2. Cooling operation assist function

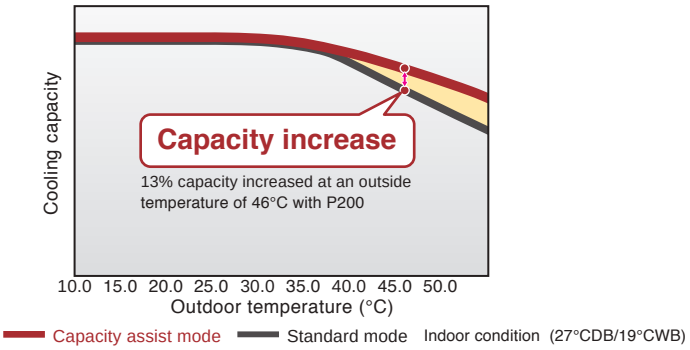
Capacity assist mode

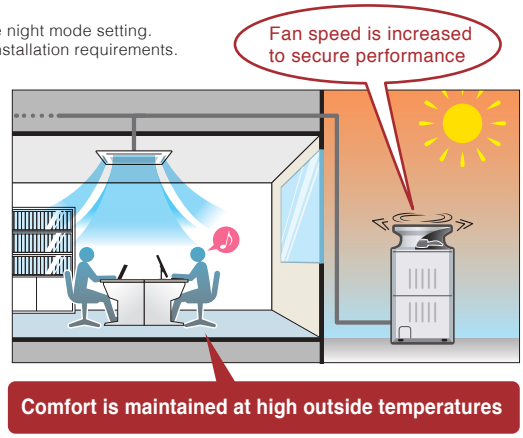
PUCY P PUCY GP PUCY EP PUHY P PUHY EP

During cooling operation at high outside temperatures, cooling capacity tends to be decreased. The YKE and YKD series provides capacity assist mode where the fan speed is automatically raised when the outside temperature reaches or exceeds around 38°C. This prevents a drop in cooling capacity during operation at high outside air temperatures. Comfort is improved, thanks to continued high performance of the unit.

* Requires a DIP switch setting
* This function will be disabled when the unit is set to the outdoor high static pressure setting or to the night mode setting. The outdoor unit will make more noise due to an increased airflow. Choose the mode according to installation requirements.

Cooling capacity, with indoor units running at 100%



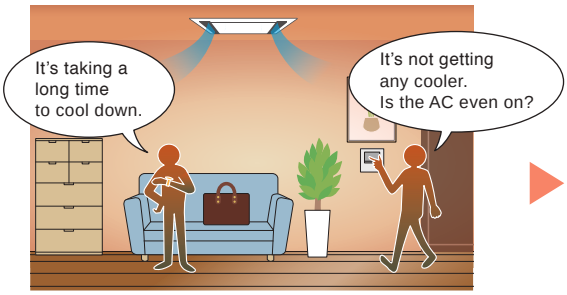


Rapid mode during startup (Quick-start up)

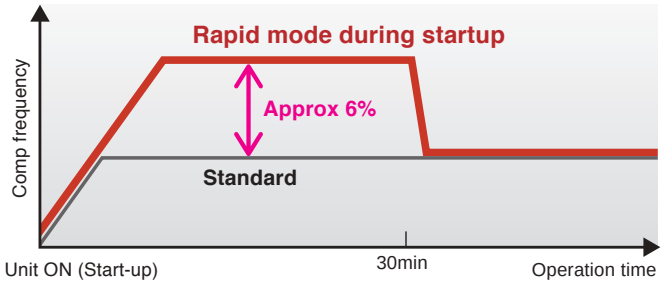
PUCY P PUCY GP PUCY EP PUHY P PUHY EP

The rotation speed of the compressor can be raised during the first 30 minutes after cooling startup, to quickly establish comfortable conditions when returning home or at the start of a workday.

* Requires a DIP switch setting
* Selecting this mode may increase operation noise. Choose the mode according to installation requirements.



The room does not cool off very quickly, and it takes a while before the room becomes comfortable.



Priority Cooling Function

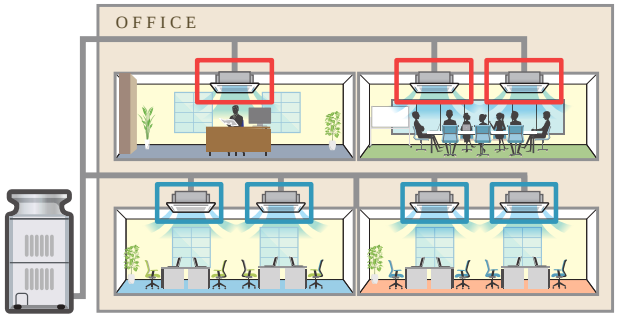
PUCY P PUCY GP PUCY EP

The cooling priority function enables the assurance of optimal comfort within designated spaces.

* Up to 3 indoor units can be priorizied
* Maximum 20% capacity of thermo-ON indoor units

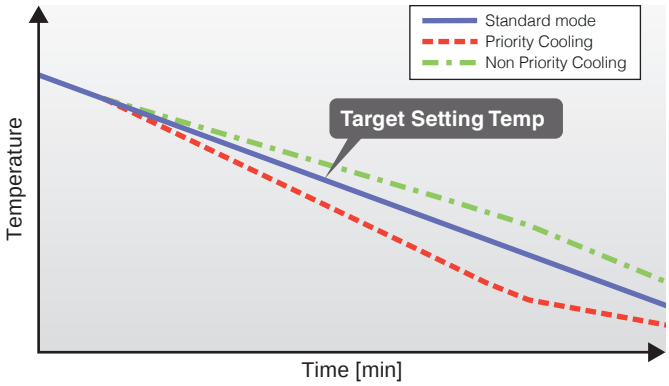
Priority Indoor Units
* The room temp with Priority Cooling Indoor Units decreases faster

Non-Priority Indoor Units
* Capacity with Non-priority cooling Indoor unit become a lower cooling capacity



Indoor units located in rooms which requires to be cooled down quickly can be selected for priority cooling.

Priority Cooling Temperature transition image



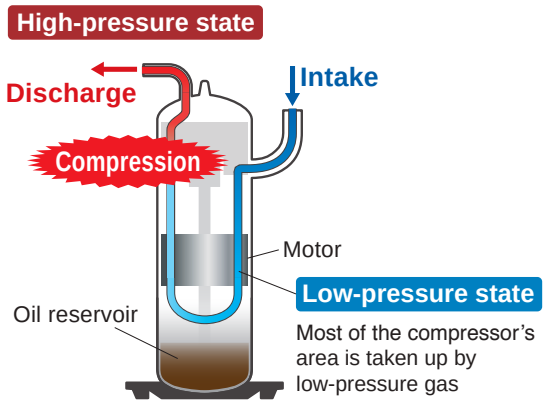
High reliability

1. Compressor

Liquid and gas refrigerants are separated beforehand by the accumulator to prevent liquid refrigerant from flowing into the compressor. Moreover, compressor structure is filled with low-pressure gas refrigerant. If liquid backflow occurs, the liquid will not enter the scroll of the compressed part directly.

Low-pressure shells

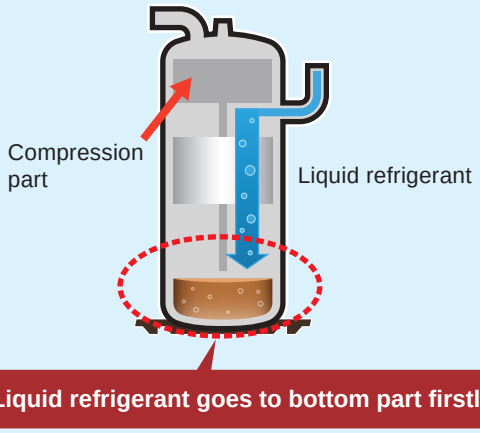
PUCY P PUCY GP PUCY EP PUHY P PUHY EP



Cross section of compressor

Most of the area in the compressor is taken up by the low-pressure gas. This prevents the motor and bearings from being heated up by the compressed high-pressure gas. The refrigerant is collected at the bottom of the shell to reduce the rate of compressor damage caused by liquid refrigerant compression.

When liquid backflow has occurred



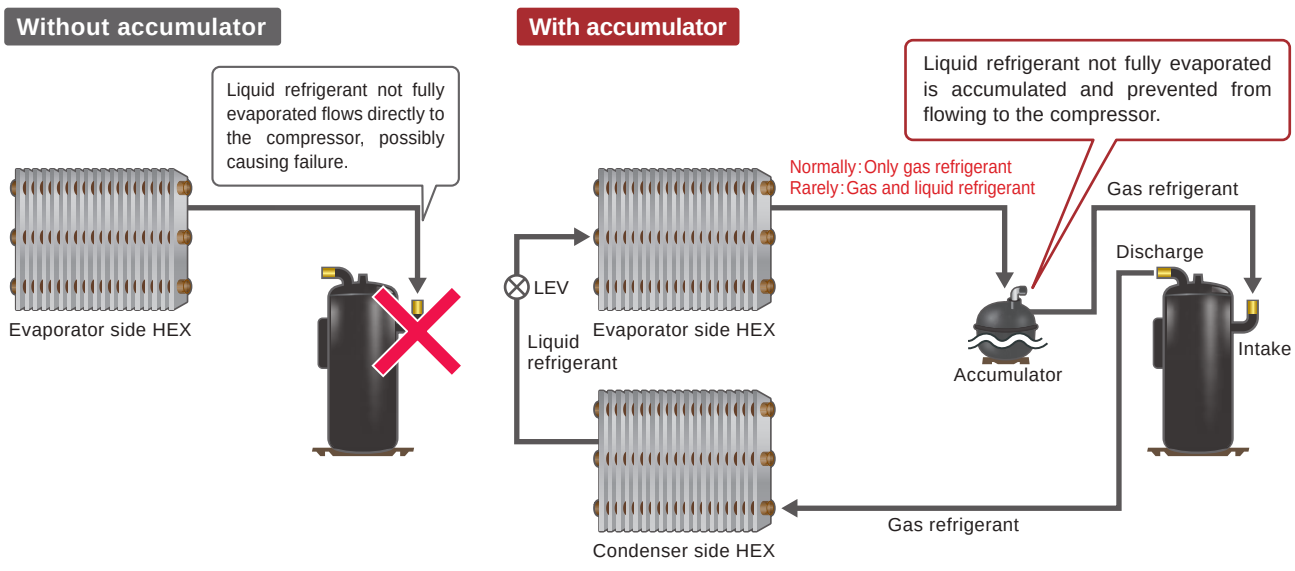
Liquid refrigerant doesn't go to compression part directly so that compressor itself is protected from malfunction due to liquid back .

Accumulator for preventing liquid backflow

PUCY P PUCY GP PUCY EP PUHY P PUHY EP

When the refrigerant is not completely evaporated by the evaporator, it may remain as a liquid, flowing back into the compressor and causing liquid compression, which poses the risk of serious damage to the compressor. To counter this problem, Mitsubishi Electric uses an accumulator placed between the evaporator and the compressor to separate the liquid refrigerant.

* Adding too much refrigerant will cause excess refrigerant to accumulate in the accumulator, resulting in liquid back flow. Be sure to add only the proper amount of refrigerant.



Operation with one compressor up to 20HP.

PUCY P PUCY EP PUHY P PUHY EP

Outdoor units can be operated by one compressor, which contributes to improve service with less refrigerant piping work and compornents.

1 compressor model



S module

Lower number of required key parts reduces maintenance requirements



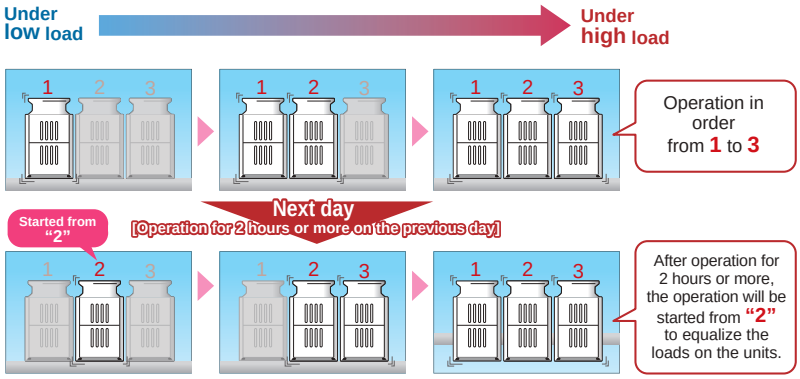
No need for our model

XL module

Rotation control

PUCY P PUCY GP PUCY EP PUHY P PUHY EP

With the combination model, the outdoor units operate alternately. This reduces the operating load and leads to a longer service life.
After operation for 2 hours or more, the next operation will be started from the outdoor unit “2.” The unit to be started first is changed to equalize the operating time of the units.

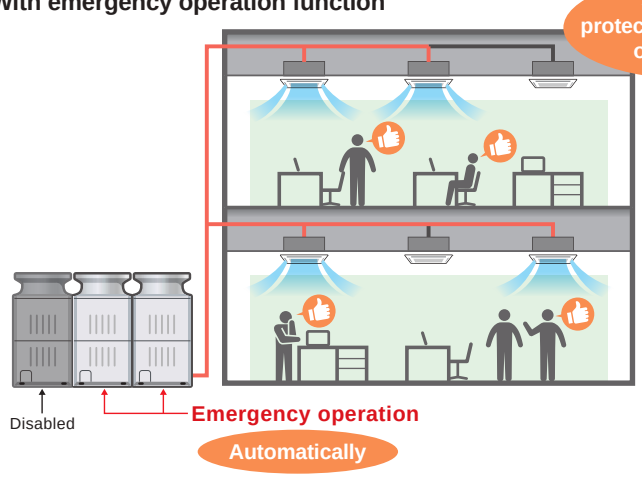


Emergency operation mode

PUCY P PUCY GP PUCY EP PUHY P PUHY EP

Emergency operation is possible with the indoor unit's remote control. With the combination model, if there is at least one module that can operate normally, the other outdoor unit temporaly performs emergency operation.

With emergency operation function



Even when one unit has fell in a malfunction, other outdoor units continue to operate.

* The number of indoor units that can continue to operate during emergency operation is limited. For information on the maximum total capacity of indoor units, refer to the Service Handbook for the outdoor unit.

High reliability

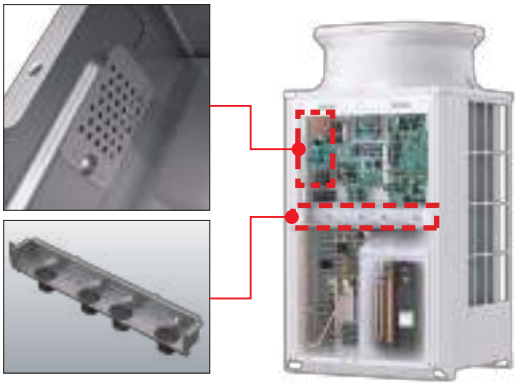
2. Electric parts

Gecko Guard

The YKE series is equipped with preventive measures that keep insects from entering the control board box and causing a malfunction.

A slit prevents geckos from entering from the side.

A preventive measure at the bottom of the control board also keeps geckos out.



Allowable operating up to ±10% voltage range

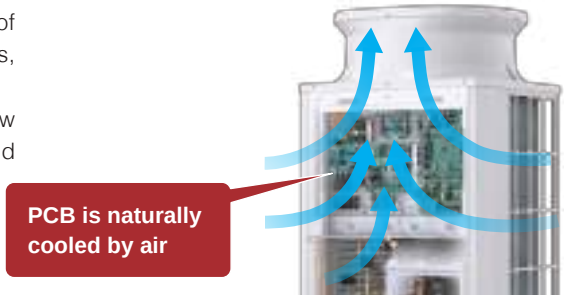
Operation of this model is guaranteed even for voltages up to 10% more or less than the indicated allowable voltage.



* When used 380V, operation is guaranteed even for voltages of up to maximum +20%

Naturally cooled PCB (Print circuit board)

PCBs (printed circuit boards) carry a large number of electronic components. When operation load increases, suitable cooling measures are required.
Mitsubishi Electric places PCBs in the natural air flow path which enables air cooling to maintain efficiency and improve reliability of each electronic component.



Access from front panel

Electrical parts are concentrated in the upper part of the panel which can be opened for easy replacement of PCBs if required.
Because the compressor is located in the lower right when the panel is opened, the service technician can easily perform maintenance from the front.



* Arrange a qualified technician for maintenance or service.

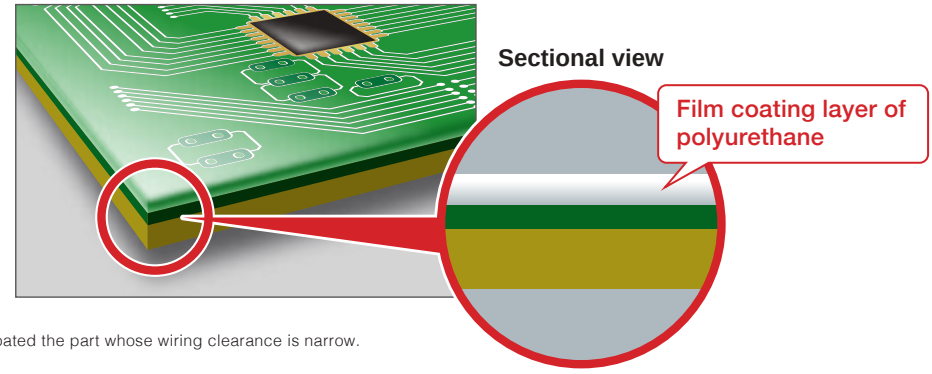
3. Corrosion resistance

Even in installation environments near coastal areas, Mitsubishi Electric products reduce the effects of corrosion due to salt damage by using a special coating designed for outdoor units.

* Effectiveness varies depending on the installation location.

Film coating on PCB (Print circuit board) PUCY P PUCY GP PUCY EP PUHY P PUHY EP

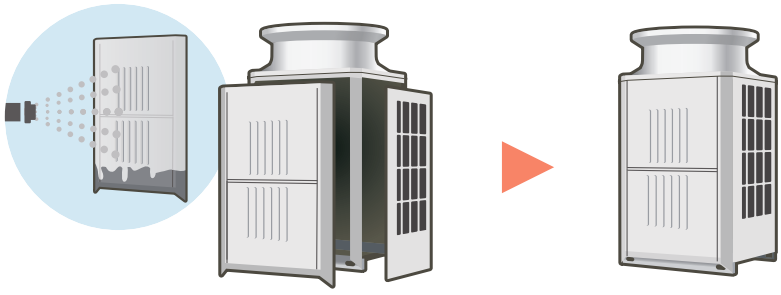
The printed circuit boards are protected by a film coating of polyurethane that covers the entire board to ensure resistance against salt corrosion.



* Standard model is only coated the part whose wiring clearance is narrow.

Polyester coated sheet PUCY P PUCY GP PUCY EP PUHY P PUHY EP

To prevent corrosion of the unit even in locations subject to the influence of sea breezes, the outdoor units are made with polyester coated steel sheets compliant with the JRA 9002 standard. The panel coating is used both on standard models and BS models, while BS models also include a thicker coating.



New heat exchanger design PUCY P PUCY GP PUCY EP

The new YKE series incorporates a new heat exchanger comprising aluminum alloy flat tubes and fins treated with zinc for anti-corrosion. This design is especially effective in coastal and urban environments where salt or traffic exhaust can damage aluminum heat exchangers and reduce their capacity and life expectancy of the unit.



High reliability

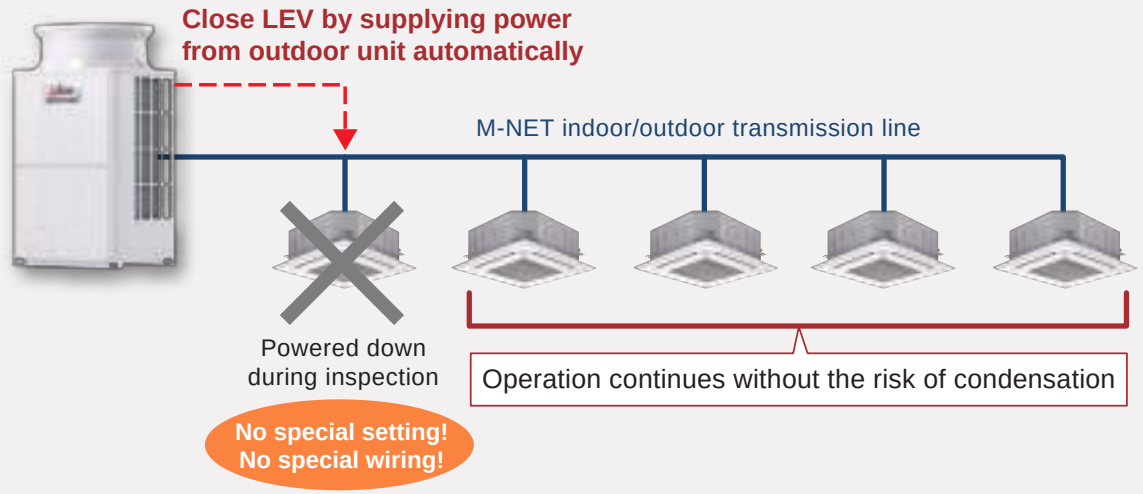
4. Operation support function

Without requiring any special settings or control steps, Mitsubishi Electric's original M-NET system enables other indoor units to continue operation even when one unit has stopped due to malfunction.

* Support for PUMY and PQHY models available.

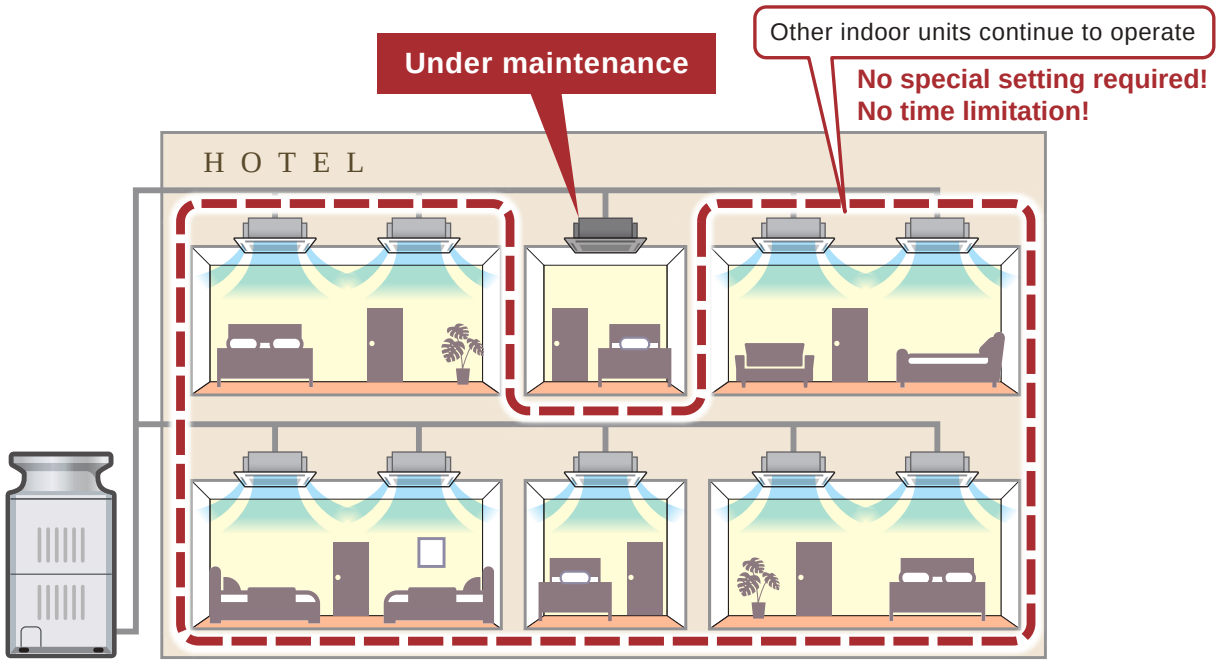
With M-NET indoor/outdoor unit communication function (CITY MULTI)

Because Mitsubishi Electric's M-NET transmission line can also supply power, it is possible to close the LEV of indoor units that has caused problem through control command from outdoor unit. This eliminates the risk of condensation and enables the other units to keep working.



For hotel application

Even if the system in one guest room cannot be used, air conditioning in other rooms does not need to be shut down, allowing business to continue.



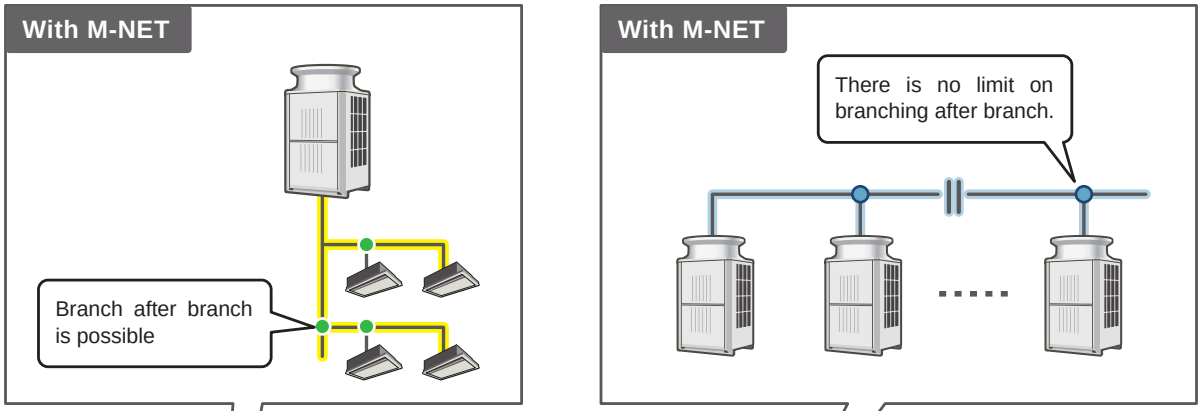
High installation flexibility

1. Flexible wiring design

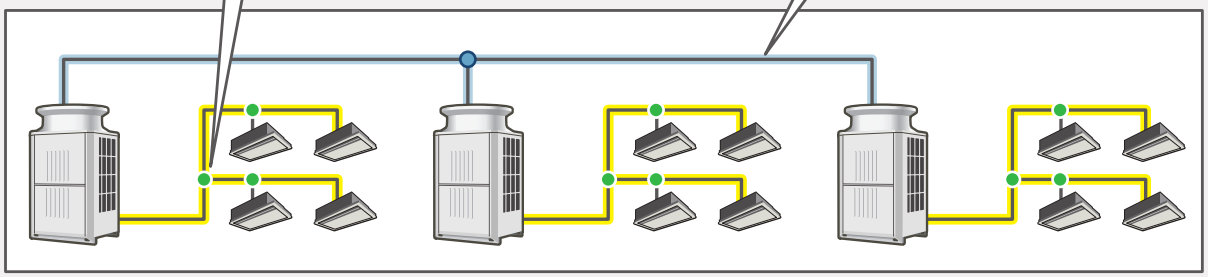
Flexible M-NET design

PUCY P PUCY GP PUCY EP PUHY P PUHY EP

The total wiring length of the original M-NET system connecting the CITY MULTI units of Mitsubishi Electric is unlimited. The system also supports multiple branching levels which greatly increases design flexibility for various buildings.



Installation image



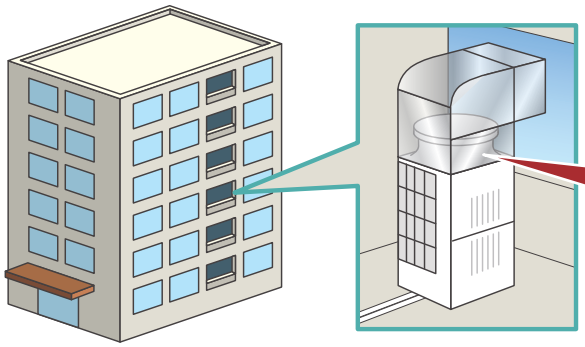
* The maximum power-supply distance of M-NET communication is 200 meters, a booster unit is required over 200 meters.
Regarding maximum distance to the farthest device, please refer to "Explanatory material for M-NET 1000 m."

2. Flexible external static pressure setting

Selectable external static pressure of the outdoor unit

PUCY P PUCY GP PUCY EP PUHY P PUHY EP

The static pressure specification of the outdoor unit can be selected (0, 30, 60 Pa).
This facilitates installation of the unit on each floor of a high-rise building or on balconies.



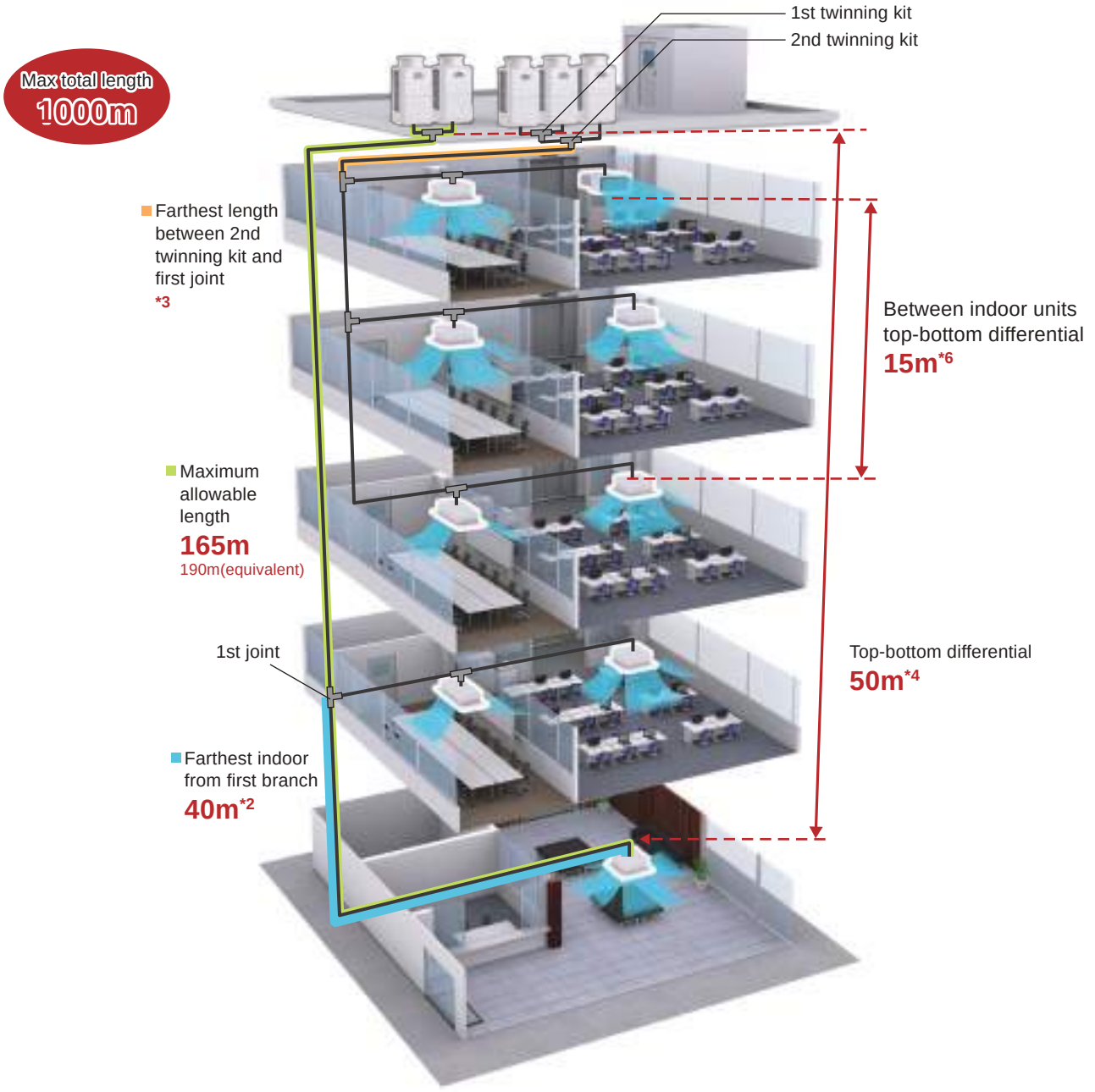
Long exhaust hoods can be connected.
This facilitates installation of the unit on each floor of a high-rise building or on balconies.

Maximum external static pressure 60 Pa (local setting)

High installation flexibility

3. Long piping length

Piping design also provides the flexibility to match the requirements of various buildings. With CITY MULTI, even large-scale building installations are no problem.



Refrigerant Piping Lengths	Maximum meters [feet]
Total length	1,000 [3,280]*1
Maximum allowable length	165 (190 equivalent) [541 (623)]
Farthest indoor from first branch	40 [131]*2
Farthest length between 2nd twinning kit and first joint	*3

Vertical differentials between units	Maximum meters [feet]
Indoor/outdoor (outdoor higher)	50 [164]*4
Indoor/outdoor (outdoor lower)	40 [131]*5
Indoor/indoor	15 [49]*6

*1 The maximum total piping length in systems with model units P1400 through P1500 800 m [2625 ft.].
*2 90m is available. When the piping length exceeds 40m, use one size larger liquid pipe starting with the section of piping where 40m is exceeded and all piping after that point.
[for PUCY-P-YKE(-BS) / PUCY-GP-YKE(-BS) / PUCY-EP-YKE(-BS)/ PUHY-(E)P-YKD(-BS)]
*3 In systems with model units P1400 through P1500, pipe length restrictions apply to the main pipes as follows:
P1400: 110 m [360 ft.] max.
P1450: 90 m [295 ft.] max.
P1500: 60 m [197 ft.] max.
*4 Depending on the model and installation conditions, top-bottom differential 90m [295ft]. For more detailed information, please contact your nearest sales office or distributor.
*5 4 m [13 ft.] or less in cooling at outdoor temperature 10°C [50°F] or lower for heat pump series.
*6 30m is available. If the height difference between indoor units exceeds 15 m [49 ft.] (but does not exceed 30 m [98 ft.]), use pipes that are one size larger for indoor unit liquid pipes.
[for PUCY-P-YKE(-BS) / PUCY-GP-YKE(-BS) / PUCY-EP-YKE(-BS) / PUHY-(E)P-YKD(-BS)]

Other useful functions

Flexible noise setting

PUCY P / PUCY GP / PUCY EP *1 PUHY P / PUHY EP *2

The low-noise mode provides four fan speed levels — 85%, 70%, 60% and 50%. A level that matches customer requests can be set using the dip switch on the outdoor unit when low-noise operation is required.

*1 PUCY-P/GP/EP: Low-noise mode can reduce noise by 85%, 70%, 60%, and 50%.
*2 PUHY-P/EP: Low noise mode can reduce noise by 50%.

- Quiet night-time operation
- 4 noise level options
- Flexible response to various situations
- Easy setting and scheduling by using the AE-C400E-X



PUCY-P200YKE

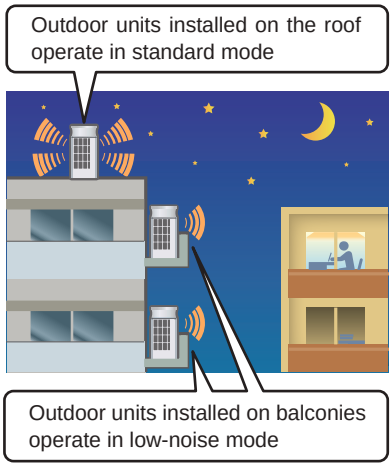
Standard 57dB
-13 dB
Flexible noise setting 44dB* (50%)

* Operation noise may be higher depending on the installation environment or operation status.
* Increased adaptability and model selection range for buildings where low noise is essential.



AE-C400E-X

Flexible noise setting can be scheduled from the AE-C400E-X browser by connecting a PC.



System changeover (for heat pump)

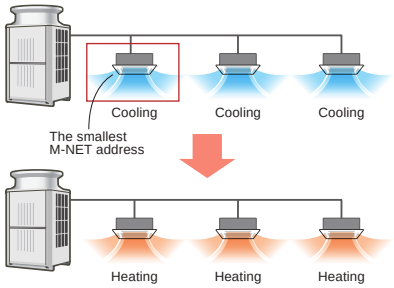
PUHY P / PUHY EP

Normal switching between cooling and heating

With CITY MULTI's switchable cooling/heating models, in order to switch from cooling to heating, the operation mode of all indoor units performing cooling operation needs to be manually switched.

Using system-changeover to switch between cooling and heating

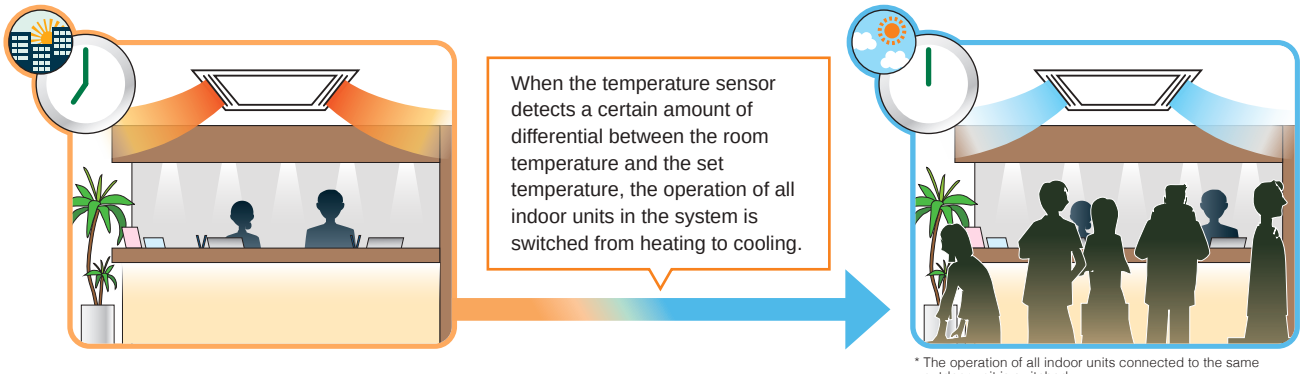
Depending on the dip switch settings, all indoor units can automatically switch their operation mode according to the operation mode of a specific indoor unit (the unit with the smallest M-NET address). Operation can be automatically switched between cooling and heating according to the temperature difference between the preset temperature on a specific indoor unit and the room temperature.



* Please avoid the indoor unit with the smallest number address to group with other indoor units.

Suitable situations

When both cooling and heating operations are required in a single day due to an extreme differences between the hottest and coldest parts of the day.



* The operation of all indoor units connected to the same outdoor unit is switched.

OUTDOOR UNIT

YKE-series - Cooling-only Standard type

PUCY-P YKE (-BS)



Specifications

Model			PUCY-P200YKE (-BS)	PUCY-P250YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P350YKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	22.4	28.5	33.5	40.0
		BTU/h	76,400	97,200	114,300	136,500
	Power input	kW	4.48	6.04	7.78	9.45
	Current input	A	7.5-7.1-6.9	10.1-9.6-9.3	13.1-12.4-12.0	15.9-15.1-14.6
	EER	kW/kW	5.00	4.71	4.30	4.23
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~17	1~21	1~26	1~30
Sound power level (measured in anechoic room)		dB <A>	77.5	78.5	78.5	81.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed (12.7 (1/2) Brazed, farthest length >= 90 m)	9.52 (3/8) Brazed (12.7 (1/2) Brazed, farthest length >= 40 m)	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	150	150	150	210
		L/s	2,500	2,500	2,500	3,500
		cfm	5,296	5,296	5,296	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter	Inverter
	Motor output	kW	3.0	4.3	5.8	7.3
	Case heater	kW	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	170 (375)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube
Optional parts			Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series - Cooling-only Standard type

PUCY-P YKE (-BS)



Specifications

Model			PUCY-P400YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P500YKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	44.0	48.0	56.0
		BTU/h	150,100	163,800	191,100
	Power input	kW	11.12	12.67	14.73
	Current input	A	18.7-17.8-17.1	21.3-20.3-19.5	24.8-23.6-22.7
	EER	kW/kW	3.95	3.78	3.80
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~34	1~39	1~43
Sound power level (measured in anechoic room)		dB <A>	83.5	83.5	82.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 2
	Air flow rate	m^3/min	250	250	320
		L/s	4,167	4,167	5,333
		cfm	8,828	8,828	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 2
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter
	Motor output	kW	8.7	10.0	10.9
	Case heater	kW	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,750 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	207 (457)	207 (457)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube
Optional parts			Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only Standard type

PUCY-P YSKE (-BS)



Specifications

Model			PUCY-P550YSKE (-BS)	PUCY-P600YSKE (-BS)	PUCY-P650YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	62.0	68.5	72.5
		BTU/h	211,500	233,700	247,400
	Power input	kW	14.09	15.39	17.63
	Current input	A	23.7-22.5-21.7	25.9-24.6-23.7	29.7-28.2-27.2
	EER	kW/kW	4.40	4.45	4.11
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~47	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	81.5	83.5	85
Refrigerant piping diameter	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed

Set Model

Model			PUCY-P250YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P250YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P250YKE (-BS)	PUCY-P400YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	150	150	150	210	150	250
		L/s	2,500	2,500	2,500	3,500	2,500	4,167
		cfm	5,296	5,296	5,296	7,415	5,296	8,828
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	4.3	5.8	4.3	7.3	4.3	8.7
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	170 (375)	207 (457)	170 (375)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only Standard type
PUCY-P YSKE (-BS)



Specifications

Model			PUCY-P700YSKE (-BS)	PUCY-P750YSKE (-BS)	PUCY-P800YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	76.5	81.5	88.0
		BTU/h	261,000	278,100	300,300
	Power input	kW	18.98	21.27	23.46
	Current input	A	32.0-30.4-29.3	35.9-34.1-32.8	39.6-37.6-36.2
	EER	kW/kW	4.03	3.83	3.75
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	85	85	86.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed

Set Model

Model			PUCY-P250YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P400YKE (-BS)	PUCY-P400YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	150	250	150	250	250	250
		L/s	2,500	4,167	2,500	4,167	4,167	4,167
		cfm	5,296	8,828	5,296	8,828	8,828	8,828
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
	*2 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	4.3	10.0	5.8	10.0	8.7	8.7
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	170 (375)	207 (457)	170 (375)	207 (457)	207 (457)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	15.88 (5/8) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only Standard type

PUCY-P YSKE (-BS)



Specifications

Model			PUCY-P850YSKE (-BS)	PUCY-P900YSKE (-BS)	PUCY-P950YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	92.0	96.0	104.0
		BTU/h	313,900	327,600	354,800
	Power input	kW	25.06	26.74	28.88
	Current input	A	42.3-40.1-38.7	45.1-42.8-41.3	48.7-46.3-44.6
	EER	kW/kW	3.67	3.59	3.60
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	86.5	86.5	86
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P400YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P500YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 2
	Air flow rate	m^3/min	250	250	250	250	250	320
		L/s	4,167	4,167	4,167	4,167	4,167	5,333
		cfm	8,828	8,828	8,828	8,828	8,828	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 2
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	8.7	10.0	10.0	10.0	10.0	10.9
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,750 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	207 (457)	207 (457)	207 (457)	207 (457)	207 (457)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only Standard type
PUCY-P YSKE (-BS)



Specifications

Model			PUCY-P1000YSKE (-BS)	PUCY-P1050YSKE (-BS)	PUCY-P1100YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	112.0	115.0	121.5
		BTU/h	382,100	392,400	414,600
	Power input	kW	31.02	29.33	30.91
	Current input	A	52.3-49.7-47.9	49.5-47.0-45.3	52.1-49.5-47.7
	EER	kW/kW	3.61	3.92	3.93
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	85.5	86	86.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P500YKE (-BS)	PUCY-P500YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P450YKE (-BS)
Fan	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	320	320	150	150	250	150	210	250
		L/s	5,333	5,333	2,500	2,500	4,167	2,500	3,500	4,167
		cfm	11,299	11,299	5,296	5,296	8,828	5,296	7,415	8,828
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
	*2 External static press.		0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	10.9	10.9	5.8	5.8	10.0	5.8	7.3	10.0
	Case heater	kW	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	260 (574)	260 (574)	170 (375)	170 (375)	207 (457)	170 (375)	207 (457)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH$_2$O, 6.1 mmH$_2$O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series - Cooling-only Standard type

PUCY-P YSKE (-BS)



Specifications

Model			PUCY-P1150YSKE (-BS)	PUCY-P1200YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	128.0	132.0
		BTU/h	436,700	450,400
	Power input	kW	33.33	35.20
	Current input	A	56.2-53.4-51.5	59.4-56.4-54.4
	EER	kW/kW	3.84	3.75
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	88	88.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P350YKE (-BS)	PUCY-P400YKE (-BS)	PUCY-P400YKE (-BS)	PUCY-P400YKE (-BS)	PUCY-P400YKE (-BS)	PUCY-P400YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	210	250	250	250	250	250
		L/s	3,500	4,167	4,167	4,167	4,167	4,167
		cfm	7,415	8,828	8,828	8,828	8,828	8,828
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	7.3	8.7	8.7	8.7	8.7	8.7
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	207 (457)	207 (457)	207 (457)	207 (457)	207 (457)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series - Cooling-only Standard type

PUCY-P YSKE (-BS)



Specifications

Model			PUCY-P1250YSKE (-BS)	PUCY-P1300YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	136.0	140.0
		BTU/h	464,000	477,700
	Power input	kW	36.85	38.46
	Current input	A	62.2-59.0-56.9	64.9-61.6-59.4
	EER	kW/kW	3.69	3.64
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		2~50	2~50
Sound power level (measured in anechoic room)		dB <A>	88.5	88.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P400YKE (-BS)	PUCY-P400YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P400YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P450YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	250	250	250	250	250	250
		L/s	4,167	4,167	4,167	4,167	4,167	4,167
		cfm	8,828	8,828	8,828	8,828	8,828	8,828
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	8.7	8.7	10.0	8.7	10.0	10.0
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	207 (457)	207 (457)	207 (457)	207 (457)	207 (457)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only Standard type

PUCY-P YSKE (-BS)



Specifications

Model			PUCY-P1350YSKE (-BS)	PUCY-P1400YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	144.0	152.0
		BTU/h	491,300	518,600
	Power input	kW	40.11	42.33
	Current input	A	67.7-64.3-62.0	71.4-67.8-65.4
	EER	kW/kW	3.59	3.59
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		2~50	2~50
Sound power level (measured in anechoic room)		dB <A>	88.5	88
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P450YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P450YKE (-BS)	PUCY-P500YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 2
	Air flow rate	m^3/min	250	250	250	250	250	320
		L/s	4,167	4,167	4,167	4,167	4,167	5,333
		cfm	8,828	8,828	8,828	8,828	8,828	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 2
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	10.0	10.0	10.0	10.0	10.0	10.9
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,750 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	207 (457)	207 (457)	207 (457)	207 (457)	207 (457)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only Standard type
PUCY-P YSKE (-BS)



Specifications

Model			PUCY-P1450YSKE (-BS)	PUCY-P1500YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	160.0	168.0
		BTU/h	545,900	573,200
	Power input	kW	44.44	46.53
	Current input	A	75.0-71.2-68.6	78.5-74.6-71.9
	EER	kW/kW	3.60	3.61
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		2~50	2~50
Sound power level (measured in anechoic room)		dB <A>	88	87.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P450YKE (-BS)	PUCY-P500YKE (-BS)	PUCY-P500YKE (-BS)	PUCY-P500YKE (-BS)	PUCY-P500YKE (-BS)	PUCY-P500YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	250	320	320	320	320	320
		L/s	4,167	5,333	5,333	5,333	5,333	5,333
		cfm	8,828	11,299	11,299	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	10.0	10.9	10.9	10.9	10.9	10.9
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	207 (457)	260 (574)	260 (574)	260 (574)	260 (574)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series - Cooling-only High Standard type

PUCY-GP YSKE (-BS)



Specifications

Model			PUCY-GP400YSKE (-BS)	PUCY-GP450YSKE (-BS)	PUCY-GP500YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	44.8	50.9	57.0
		BTU/h	152,900	173,700	194,500
	Power input	kW	9.43	11.04	12.75
	Current input	A	15.9-15.1-14.5	18.6-17.7-17.0	21.5-20.4-19.7
	EER	kW/kW	4.75	4.61	4.47
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~34	1~39	1~43
Sound power level (measured in anechoic room)		dB <A>	80.5	81	81.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed

Set Model

Model			PUCY-P200YKE (-BS)	PUCY-P200YKE (-BS)	PUCY-P200YKE (-BS)	PUCY-P250YKE (-BS)	PUCY-P250YKE (-BS)	PUCY-P250YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	150	150	150	150	150	150
		L/s	2,500	2,500	2,500	2,500	2,500	2,500
		cfm	5,296	5,296	5,296	5,296	5,296	5,296
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	3.0	3.0	3.0	4.3	4.3	4.3
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	170 (375)	170 (375)	170 (375)	170 (375)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only High Standard type
PUCY-GP YSKE (-BS)



Specifications

Model			PUCY-GP650YSKE (-BS)	PUCY-GP700YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	73.5	80.0
		BTU/h	250,800	273,000
	Power input	kW	18.14	19.51
	Current input	A	30.6-29.0-28.0	32.9-31.2-30.1
	EER	kW/kW	4.05	4.10
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	83.5	84.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	34.93 (1-3/8) Brazed

Set Model

Model			PUCY-P300YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P350YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	150	210	210	210
		L/s	2,500	3,500	3,500	3,500
		cfm	5,296	7,415	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
	*2 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter
	Motor output	kW	5.8	7.3	7.3	7.3
	Case heater	kW	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	170 (375)	207 (457)	207 (457)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only High Standard type

PUCY-GP YSKE (-BS)



Specifications

Model			PUCY-GP750YSKE (-BS)	PUCY-GP800YSKE (-BS)	PUCY-GP850YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	84.8	90.9	97.0
		BTU/h	289,300	310,200	331,000
	Power input	kW	18.84	20.61	22.45
	Current input	A	31.8-30.2-29.1	34.7-33.0-31.8	37.8-36.0-34.7
	EER	kW/kW	4.50	4.41	4.32
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	84	84.5	84.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P200YKE (-BS)	PUCY-P200YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P200YKE (-BS)	PUCY-P250YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P250YKE (-BS)	PUCY-P250YKE (-BS)	PUCY-P350YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	150	150	210	150	150	210	150	150	210
		L/s	2,500	2,500	3,500	2,500	2,500	3,500	2,500	2,500	3,500
		cfm	5,296	5,296	7,415	5,296	5,296	7,415	5,296	5,296	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	3.0	3.0	7.3	3.0	4.3	7.3	4.3	4.3	7.3
	Case heater	kW	–	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	207 (457)	170 (375)	170 (375)	207 (457)	170 (375)	170 (375)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only High Standard type
PUCY-GP YSKE (-BS)



Specifications

Model			PUCY-GP900YSKE (-BS)	PUCY-GP950YSKE (-BS)	PUCY-GP1000YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	102.0	107.0	113.5
		BTU/h	348,000	365,100	387,300
	Power input	kW	24.34	26.35	28.09
	Current input	A	41.0-39.0-37.6	44.4-42.2-40.7	47.4-45.0-43.4
	EER	kW/kW	4.19	4.06	4.04
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	84.5	84.5	85.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P250YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P300YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P350YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	150	150	210	150	150	210	150	210	210
		L/s	2,500	2,500	3,500	2,500	2,500	3,500	2,500	3,500	3,500
		cfm	5,296	5,296	7,415	5,296	5,296	7,415	5,296	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
	*2 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	4.3	5.8	7.3	5.8	5.8	7.3	5.8	7.3	7.3
	Case heater	kW	–	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	207 (457)	170 (375)	170 (375)	207 (457)	170 (375)	207 (457)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only High Standard type

PUCY-GP YSKE (-BS)



Specifications

Model			PUCY-GP1050YSKE (-BS)	PUCY-GP1100YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	120.0	124.0
		BTU/h	409,400	423,100
	Power input	kW	28.91	31.63
	Current input	A	48.8-46.3-44.6	53.3-50.7-48.8
	EER	kW/kW	4.15	3.92
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	86.5	87
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-P350YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P350YKE (-BS)	PUCY-P400YKE (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	210	210	210	210	210	250
		L/s	3,500	3,500	3,500	3,500	3,500	4,167
		cfm	7,415	7,415	7,415	7,415	7,415	8,828
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	7.3	7.3	7.3	7.3	7.3	8.7
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	207 (457)	207 (457)	207 (457)	207 (457)	207 (457)	207 (457)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only High Efficiency type
PUCY-EP YKE (-BS)



Specifications

Model			PUCY-EP200YKE (-BS)	PUCY-EP250YKE (-BS)	PUCY-EP300YKE (-BS)	PUCY-EP350YKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal) *1		kW	22.4	28.5	33.5	40.0
		BTU/h	76,400	97,200	114,300	136,500
	Power input	kW	4.43	6.00	7.08	8.60
	Current input	A	7.4-7.1-6.8	10.1-9.6-9.2	11.9-11.3-10.9	14.5-13.7-13.2
	EER	kW/kW	5.05	4.75	4.73	4.65
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~17	1~21	1~26	1~30
Sound power level (measured in anechoic room)		dB <A>	77.5	78.5	80.5	80
Refrigerant piping diameter	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed (12.7 (1/2) Brazed, farthest length >= 90 m)	9.52 (3/8) Brazed (12.7 (1/2) Brazed, farthest length >= 40 m)	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
FAN	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	150	150	320	320
		L/s	2,500	2,500	5,333	5,333
		cfm	5,296	5,296	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 2	0.92 x 2
*2	External static press.		0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter	Inverter
	Motor output	kW	2.9	4.3	4.3	5.6
	Case heater	kW	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	247 (545)	262 (578)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube
Optional parts			Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH$_2$O, 6.1 mmH$_2$O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only High Efficiency type

PUCY-EP YKE (-BS)



Specifications

Model			PUCY-EP400YKE (-BS)	PUCY-EP450YKE (-BS)	PUCY-EP500YKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	44.0	48.0	56.0
		BTU/h	150,100	163,800	191,100
	Power input	kW	10.13	11.42	14.33
	Current input	A	17.1-16.2-15.6	19.2-18.3-17.6	24.1-22.9-22.1
	EER	kW/kW	4.34	4.20	3.90
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~34	1~39	1~43
Sound power level (measured in anechoic room)		dB <A>	80	80.5	82.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
FAN	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	320	320	320
		L/s	5,333	5,333	5,333
		cfm	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 2
*2	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter
	Motor output	kW	6.9	8.0	10.6
	Case heater	kW	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	260 (574)	260 (574)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube	Salt-resistant corrugated fin & aluminium alloy tube
Optional parts			Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only High Efficiency type
PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP400YSKE (-BS)	PUCY-EP450YSKE (-BS)	PUCY-EP500YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	44.8	50.9	57.0
		BTU/h	152,900	173,700	194,500
	Power input	kW	9.35	10.94	12.63
	Current input	A	15.7-14.9-14.4	18.4-17.5-16.9	21.3-20.2-19.5
	EER	kW/kW	4.79	4.65	4.51
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~34	1~39	1~43
Sound power level (measured in anechoic room)		dB <A>	80.5	81	81.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed

Set Model

Model			PUCY-EP200YKE (-BS)	PUCY-EP200YKE (-BS)	PUCY-EP200YKE (-BS)	PUCY-EP250YKE (-BS)	PUCY-EP250YKE (-BS)	PUCY-EP250YKE (-BS)
FAN	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	150	150	150	150	150	150
		L/s	2,500	2,500	2,500	2,500	2,500	2,500
		cfm	5,296	5,296	5,296	5,296	5,296	5,296
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
	*2 External static press.		0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	2.9	2.9	2.9	4.3	4.3	4.3
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	170 (375)	170 (375)	170 (375)	170 (375)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH$_2$O, 6.1 mmH$_2$O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only High Efficiency type

PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP550YSKE (-BS)	PUCY-EP600YSKE (-BS)	PUCY-EP650YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	62.4	68.5	73.5
		BTU/h	212,900	233,700	250,800
	Power input	kW	13.56	15.25	16.51
	Current input	A	22.8-21.7-20.9	25.7-24.4-23.5	27.8-26.4-25.5
	EER	kW/kW	4.60	4.49	4.45
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~47	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	82	83.5	83.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed

Set Model

Model			PUCY-EP200YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP300YKE (-BS)	PUCY-EP300YKE (-BS)	PUCY-EP300YKE (-BS)	PUCY-EP350YKE (-BS)
FAN	Type x Quantity		Propeller fan x 1	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	150	320	320	320	320	320
		L/s	2,500	5,333	5,333	5,333	5,333	5,333
		cfm	5,296	11,299	11,299	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
	*2 External static press.		0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)	0 Pa (0 mmH$_2$O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	2.9	5.6	4.3	4.3	4.3	5.6
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	170 (375)	262 (578)	247 (545)	247 (545)	247 (545)	262 (578)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH$_2$O, 6.1 mmH$_2$O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only High Efficiency type
PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP700YSKE (-BS)	PUCY-EP750YSKE (-BS)	PUCY-EP800YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	80.0	84.8	90.9
		BTU/h	273,000	289,300	310,200
	Power input	kW	18.14	18.15	19.89
	Current input	A	30.6-29.0-28.0	30.6-29.1-28.0	33.5-31.8-30.7
	EER	kW/kW	4.41	4.67	4.57
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	83	83.5	84
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed

Set Model

Model			PUCY-EP350YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP200YKE (-BS)	PUCY-EP200YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP200YKE (-BS)	PUCY-EP250YKE (-BS)	PUCY-EP350YKE (-BS)
FAN	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 1	Propeller fan x 1	Propeller fan x 2	Propeller fan x 1	Propeller fan x 1	Propeller fan x 2
	Air flow rate	m^3/min	320	320	150	150	320	150	150	320
		L/s	5,333	5,333	2,500	2,500	5,333	2,500	2,500	5,333
		cfm	11,299	11,299	5,296	5,296	11,299	5,296	5,296	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 1	0.92 x 1	0.92 x 2	0.92 x 1	0.92 x 1	0.92 x 2
	*2 External static press.		0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	5.6	5.6	2.9	2.9	5.6	2.9	4.3	5.6
	Case heater	kW	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,750 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,750 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	262 (578)	262 (578)	170 (375)	170 (375)	262 (578)	170 (375)	170 (375)	262 (578)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube		Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH₂O, 6.1 mmH₂O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only High Efficiency type

PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP850YSKE (-BS)	PUCY-EP900YSKE (-BS)	PUCY-EP950YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	97.0	102.4	107.0
		BTU/h	331,000	349,400	365,100
	Power input	kW	21.65	22.55	23.99
	Current input	A	36.5-34.7-33.4	38.0-36.1-34.8	40.4-38.4-37.0
	EER	kW/kW	4.48	4.54	4.46
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	84	84.5	85.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-EP250YKE (-BS)	PUCY-EP250YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP200YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP300YKE (-BS)	PUCY-EP300YKE (-BS)	PUCY-EP350YKE (-BS)
FAN	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 2	Propeller fan x 1	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	150	150	320	150	320	320	320	320	320
		L/s	2,500	2,500	5,333	2,500	5,333	5,333	5,333	5,333	5,333
		cfm	5,296	5,296	11,299	5,296	11,299	11,299	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 2	0.92 x 1	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
	*2 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	4.3	4.3	5.6	2.9	5.6	5.6	4.3	4.3	5.6
	Case heater	kW	–	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,750 x 740	1,650 x 920 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 3.0 kg (7 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 3.0 kg (7 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	262 (578)	170 (375)	262 (578)	262 (578)	247 (545)	247 (545)	262 (578)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only High Efficiency type
PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP1000YSKE (-BS)	PUCY-EP1050YSKE (-BS)	PUCY-EP1100YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	113.5	120.0	124.0
		BTU/h	387,300	409,400	423,100
	Power input	kW	25.56	27.21	28.77
	Current input	A	43.1-40.9-39.5	45.9-43.6-42.0	48.5-46.1-44.4
	EER	kW/kW	4.44	4.41	4.31
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	85	85	85
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-EP300YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP350YKE (-BS)	PUCY-EP400YKE (-BS)
FAN	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	320	320	320	320	320	320	320	320	320
		L/s	5,333	5,333	5,333	5,333	5,333	5,333	5,333	5,333	5,333
		cfm	11,299	11,299	11,299	11,299	11,299	11,299	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
	*2 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	4.3	5.6	5.6	5.6	5.6	5.6	5.6	5.6	6.9
	Case heater	kW	–	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	247 (545)	262 (578)	262 (578)	262 (578)	262 (578)	262 (578)	262 (578)	262 (578)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only High Efficiency type

PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP1150YSKE (-BS)	PUCY-EP1200YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	128.0	132.0
		BTU/h	436,700	450,400
	Power input	kW	30.33	31.96
	Current input	A	51.2-48.6-46.8	53.9-51.2-49.4
	EER	kW/kW	4.22	4.13
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		1~50	1~50
Sound power level (measured in anechoic room)		dB <A>	85	85
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-EP350YKE (-BS)	PUCY-EP400YKE (-BS)	PUCY-EP400YKE (-BS)	PUCY-EP400YKE (-BS)	PUCY-EP400YKE (-BS)	PUCY-EP400YKE (-BS)
FAN	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	320	320	320	320	320	320
		L/s	5,333	5,333	5,333	5,333	5,333	5,333
		cfm	11,299	11,299	11,299	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
	*2 External static press.		0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)	0 Pa (0 mmH₂O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	5.6	6.9	6.9	6.9	6.9	6.9
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	262 (578)	260 (574)	260 (574)	260 (574)	260 (574)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH₂O, 6.1 mmH₂O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only High Efficiency type
PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP1250YSKE (-BS)	PUCY-EP1300YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	136.0	140.0
		BTU/h	464,000	477,700
	Power input	kW	32.92	34.73
	Current input	A	55.5-52.7-50.8	58.6-55.6-53.6
	EER	kW/kW	4.13	4.03
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		2~50	2~50
Sound power level (measured in anechoic room)		dB <A>	85	85.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-EP400YKE (-BS)	PUCY-EP400YKE (-BS)	PUCY-EP450YKE (-BS)	PUCY-EP400YKE (-BS)	PUCY-EP450YKE (-BS)	PUCY-EP450YKE (-BS)
FAN	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	320	320	320	320	320	320
		L/s	5,333	5,333	5,333	5,333	5,333	5,333
		cfm	11,299	11,299	11,299	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
	*2 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	6.9	6.9	8.0	6.9	8.0	8.0
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	260 (574)	260 (574)	260 (574)	260 (574)	260 (574)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKE-series

- Cooling-only High Efficiency type

PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP1350YSKE (-BS)	PUCY-EP1400YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	144.0	152.0
		BTU/h	491,300	518,600
	Power input	kW	36.09	39.07
	Current input	A	60.9-57.8-55.7	65.9-62.6-60.3
	EER	kW/kW	3.99	3.89
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		2~50	2~50
Sound power level (measured in anechoic room)		dB <A>	85.5	86
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-EP450YKE (-BS)	PUCY-EP450YKE (-BS)	PUCY-EP450YKE (-BS)	PUCY-EP450YKE (-BS)	PUCY-EP450YKE (-BS)	PUCY-EP500YKE (-BS)
FAN	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	320	320	320	320	320	320
		L/s	5,333	5,333	5,333	5,333	5,333	5,333
		cfm	11,299	11,299	11,299	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
	*2 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	8.0	8.0	8.0	8.0	8.0	10.6
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	260 (574)	260 (574)	260 (574)	260 (574)	260 (574)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT
YKE-series
- Cooling-only High Efficiency type
PUCY-EP YSKE (-BS)



Specifications

Model			PUCY-EP1450YSKE (-BS)	PUCY-EP1500YSKE (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	160.0	168.0
		BTU/h	545,900	573,200
	Power input	kW	42.10	45.40
	Current input	A	71.0-67.5-65.0	76.6-72.8-70.1
	EER	kW/kW	3.80	3.70
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	10.0~52.0 °C (50~126 °F)	10.0~52.0 °C (50~126 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Quantity		2~50	2~50
Sound power level (measured in anechoic room)		dB <A>	87	87.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUCY-EP450YKE (-BS)	PUCY-EP500YKE (-BS)	PUCY-EP500YKE (-BS)	PUCY-EP500YKE (-BS)	PUCY-EP500YKE (-BS)	PUCY-EP500YKE (-BS)
FAN	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	320	320	320	320	320	320
		L/s	5,333	5,333	5,333	5,333	5,333	5,333
		cfm	11,299	11,299	11,299	11,299	11,299	11,299
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
	*2 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	8.0	10.6	10.6	10.6	10.6	10.6
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	260 (574)	260 (574)	260 (574)	260 (574)	260 (574)	260 (574)
Heat exchanger			Salt-resistant corrugated fin & aluminium alloy tube			Salt-resistant corrugated fin & aluminium alloy tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-2)

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °C D.B./19 °C W.B. (81 °F D.B./66 °F W.B.)	35 °C D.B. (95 °F D.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*2 External static pressure option is available (30 Pa, 60 Pa/3.1 mmH_2O, 6.1 mmH_2O). Consult your dealer about the specification when setting External static pressure option.
*3 The sound level may increase at high outside air temperature.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YKD (-BS)



Specifications

Model			PUHY-P200YKD (-BS)	PUHY-P250YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P350YKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	22.4	28.0	33.5	40.0
		BTU/h	76,400	95,500	114,300	136,500
	Power input	kW	4.48	5.88	7.59	9.66
	Current input	A	7.5-7.1-6.9	9.9-9.4-9.0	12.8-12.1-11.7	16.3-15.4-14.9
	EER	kW/kW	5.00	4.76	4.41	4.14
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	22.4	28.0	33.5	40.0
		BTU/h	76,400	95,500	114,300	136,500
	Power input	kW	5.05	6.33	8.11	9.61
	Current input	A	8.5-8.0-7.8	10.6-10.1-9.7	13.6-13.0-12.5	16.2-15.4-14.8
	COP	kW/kW	4.43	4.42	4.13	4.16
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P250/1~17	P15~P250/1~21	P15~P300/1~26	P15~P300/1~30
Sound pressure level (measured in anechoic room)		dB <A>	57	58	61	61
Refrigerant piping diameter	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed (12.7 (1/2) Brazed, farthest length >= 90 m)	9.52 (3/8) Brazed (12.7 (1/2) Brazed, farthest length >= 40 m)	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	175	175	185	210
		L/s	2,917	2,917	3,083	3,500
		cfm	6,179	6,179	6,532	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter	Inverter
	Motor output	kW	5.5	6.9	8.1	10.4
	Case heater	kW	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
Refrigerant	Type x original charge		R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	191 (422)	191 (422)	204 (450)	243 (536)
Heat exchanger			Salt-resistant cross fin & copper tube	Salt-resistant cross fin & copper tube	Salt-resistant cross fin & aluminium tube	Salt-resistant cross fin & copper tube
Optional parts			Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YKD (-BS)



Specifications

Model			PUHY-P400YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P500YKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	45.0	48.0	55.0
		BTU/h	153,500	163,800	187,700
	Power input	kW	12.71	14.32	16.22
	Current input	A	21.4-20.3-19.6	24.1-22.9-22.1	27.3-26.0-25.0
	EER	kW/kW	3.54	3.35	3.39
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	45.0	48.0	55.0
		BTU/h	153,500	163,800	187,700
	Power input	kW	10.92	13.33	15.71
	Current input	A	18.4-17.5-16.8	22.5-21.3-20.6	26.5-25.1-24.2
	COP	kW/kW	4.12	3.60	3.50
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P400/1~34	P15~P400/1~39	P15~P500/1~43
Sound pressure level (measured in anechoic room)		dB <A>	63	63	65
Refrigerant piping diameter	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 2
	Air flow rate	m^3/min	210	210	360
		L/s	3,500	3,500	6,000
		cfm	7,415	7,415	12,712
	Control, Driving mechanism		Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor	Inverter-control, Direct-driven by motor
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 2
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter
	Motor output	kW	10.8	12.4	13.3
	Case heater	kW	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,750 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
Refrigerant	Type x original charge		R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.8 kg (27 lbs)
Net weight		kg (lbs)	241 (532)	241 (532)	285 (629)
Heat exchanger			Salt-resistant cross fin & copper tube	Salt-resistant cross fin & copper tube	Salt-resistant cross fin & copper tube
Optional parts			Joint: CMY-Y102SS/LS-G2,CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2,CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	Joint: CMY-Y102SS/LS-G2,CMY-Y202S-G2 Header: CMY-Y104/108/1010-G

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YSKD (-BS)



Specifications

Model			PUHY-P550YSKD (-BS)	PUHY-P600YSKD (-BS)	PUHY-P650YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	63.0	68.0	73.0
		BTU/h	215,000	232,000	249,100
	Power input	kW	14.25	15.34	17.80
	Current input	A	24.0-22.8-22.0	25.8-24.6-23.7	30.0-28.5-27.5
	EER	kW/kW	4.42	4.43	4.10
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	63.0	68.0	73.0
		BTU/h	215,000	232,000	249,100
	Power input	kW	15.51	16.70	18.02
	Current input	A	26.1-24.8-23.9	28.1-26.7-25.8	30.4-28.8-27.8
	COP	kW/kW	4.06	4.07	4.05
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P500/1~47	P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	63	63	64.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed

Set Model

Model			PUHY-P250YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P250YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P250YKD (-BS)	PUHY-P400YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	175	185	175	210	175	210
		L/s	2,917	3,083	2,917	3,500	2,917	3,500
		cfm	6,179	6,532	6,179	7,415	6,179	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	6.9	8.1	6.9	10.4	6.9	10.8
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	191 (422)	204 (450)	191 (422)	243 (536)	191 (422)	241 (532)
Heat exchanger			Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YSKD (-BS)



Specifications

Model			PUHY-P700YSKD (-BS)	PUHY-P750YSKD (-BS)	PUHY-P800YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	76.0	81.5	90.0
		BTU/h	259,300	278,100	307,100
	Power input	kW	19.24	21.39	25.56
	Current input	A	32.4-30.8-29.7	36.1-34.3-33.0	43.1-40.9-39.5
	EER	kW/kW	3.95	3.81	3.52
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	76.0	81.5	90.0
		BTU/h	259,300	278,100	307,100
	Power input	kW	20.00	22.20	23.01
	Current input	A	33.7-32.0-30.9	37.4-35.6-34.3	38.8-36.9-35.5
	COP	kW/kW	3.80	3.67	3.91
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/1~50	P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	64.5	65.5	66
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed

Set Model

Model			PUHY-P250YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P400YKD (-BS)	PUHY-P400YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	175	210	185	210	210	210
		L/s	2,917	3,500	3,083	3,500	3,500	3,500
		cfm	6,179	7,415	6,532	7,415	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	6.9	12.4	8.1	12.4	10.8	10.8
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	191 (422)	241 (532)	204 (450)	241 (532)	241 (532)	241 (532)
Heat exchanger			Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	15.88 (5/8) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YSKD (-BS)



Specifications

Model			PUHY-P850YSKD (-BS)	PUHY-P900YSKD (-BS)	PUHY-P950YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	93.0	96.0	103.0
		BTU/h	317,300	327,600	351,400
	Power input	kW	27.27	29.00	31.30
	Current input	A	46.0-43.7-42.1	48.9-46.5-44.8	52.8-50.1-48.3
	EER	kW/kW	3.41	3.31	3.29
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	93.0	96.0	103.0
		BTU/h	317,300	327,600	351,400
	Power input	kW	25.40	28.07	30.56
	Current input	A	42.8-40.7-39.2	47.3-45.0-43.3	51.5-49.0-47.2
	COP	kW/kW	3.66	3.42	3.37
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/1~50	P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	66	66	67.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P400YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P500YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 2
	Air flow rate	m^3/min	210	210	210	210	210	360
		L/s	3,500	3,500	3,500	3,500	3,500	6,000
		cfm	7,415	7,415	7,415	7,415	7,415	12,712
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 2
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	10.8	12.4	12.4	12.4	12.4	13.3
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,750 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.8 kg (27 lbs)
Net weight		kg (lbs)	241 (532)	241 (532)	241 (532)	241 (532)	241 (532)	285 (629)
Heat exchanger			Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YSKD (-BS)



Specifications

Model			PUHY-P1000YSKD (-BS)	PUHY-P1050YSKD (-BS)	PUHY-P1100YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	110.0	115.0	121.5
		BTU/h	375,300	392,400	414,600
	Power input	kW	33.63	29.26	30.83
	Current input	A	56.7-53.9-51.9	49.3-46.9-45.2	52.0-49.4-47.6
	EER	kW/kW	3.27	3.93	3.94
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	110.0	115.0	121.5
		BTU/h	375,300	392,400	414,600
	Power input	kW	33.13	31.50	33.80
	Current input	A	55.9-53.1-51.2	53.1-50.5-48.6	57.0-54.2-52.2
	COP	kW/kW	3.32	3.65	3.59
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/1~50	P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	68	66.5	66.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P500YKD (-BS)	PUHY-P500YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P450YKD (-BS)
Fan	Type x Quantity		Propeller fan x 2	Propeller fan x 2	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	360	360	185	185	210	185	210	210
		L/s	6,000	6,000	3,083	3,083	3,500	3,083	3,500	3,500
		cfm	12,712	12,712	6,532	6,532	7,415	6,532	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 2	0.92 x 2	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	13.3	13.3	8.1	8.1	12.4	8.1	10.4	12.4
	Case heater	kW	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 11.8 kg (27 lbs)	R410A x 11.8 kg (27 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	285 (629)	285 (629)	204 (450)	204 (450)	241 (532)	204 (450)	243 (536)	241 (532)
Heat exchanger			Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YSKD (-BS)



Specifications

Model			PUHY-P1150YSKD (-BS)	PUHY-P1200YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	130.0	135.0
		BTU/h	443,600	460,600
	Power input	kW	34.12	38.35
	Current input	A	57.5-54.7-52.7	64.7-61.5-59.2
	EER	kW/kW	3.81	3.52
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	130.0	135.0
		BTU/h	443,600	460,600
	Power input	kW	35.51	37.70
	Current input	A	59.9-56.9-54.8	63.6-60.4-58.2
	COP	kW/kW	3.66	3.58
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	67.5	68
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P350YKD (-BS)	PUHY-P400YKD (-BS)	PUHY-P400YKD (-BS)	PUHY-P400YKD (-BS)	PUHY-P400YKD (-BS)	PUHY-P400YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	210	210	210	210	210	210
		L/s	3,500	3,500	3,500	3,500	3,500	3,500
		cfm	7,415	7,415	7,415	7,415	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	10.4	10.8	10.8	10.8	10.8	10.8
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	243 (536)	241 (532)	241 (532)	241 (532)	241 (532)	241 (532)
Heat exchanger			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YSKD (-BS)



Specifications

Model			PUHY-P1250YSKD (-BS)	PUHY-P1300YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	138.0	141.0
		BTU/h	470,900	481,100
	Power input	kW	40.00	41.83
	Current input	A	67.5-64.1-61.8	70.6-67.0-64.6
	EER	kW/kW	3.45	3.37
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	138.0	141.0
		BTU/h	470,900	481,100
	Power input	kW	40.35	42.98
	Current input	A	68.1-64.7-62.3	72.5-68.9-66.4
	COP	kW/kW	3.42	3.28
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/2~50	P15~P600/2~50
Sound pressure level (measured in anechoic room)		dB <A>	68	68
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P400YKD (-BS)	PUHY-P400YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P400YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P450YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	210	210	210	210	210	210
		L/s	3,500	3,500	3,500	3,500	3,500	3,500
		cfm	7,415	7,415	7,415	7,415	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	10.8	10.8	12.4	10.8	12.4	12.4
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	241 (532)	241 (532)	241 (532)	241 (532)	241 (532)	241 (532)
Heat exchanger			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YSKD (-BS)



Specifications

Model			PUHY-P1350YSKD (-BS)	PUHY-P1400YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	144.0	151.0
		BTU/h	491,300	515,200
	Power input	kW	43.63	45.89
	Current input	A	73.6-69.9-67.4	77.4-73.5-70.9
	EER	kW/kW	3.30	3.29
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	144.0	151.0
		BTU/h	491,300	515,200
	Power input	kW	46.15	49.50
	Current input	A	77.9-74.0-71.3	83.5-79.3-76.5
	COP	kW/kW	3.12	3.05
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/2~50	P15~P600/2~50
Sound pressure level (measured in anechoic room)		dB <A>	68	68.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P450YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P450YKD (-BS)	PUHY-P500YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 2
	Air flow rate	m^3/min	210	210	210	210	210	360
		L/s	3,500	3,500	3,500	3,500	3,500	6,000
		cfm	7,415	7,415	7,415	7,415	7,415	12,712
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 2
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	12.4	12.4	12.4	12.4	12.4	13.3
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,750 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.8 kg (27 lbs)
Net weight		kg (lbs)	241 (532)	241 (532)	241 (532)	241 (532)	241 (532)	285 (629)
Heat exchanger			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series
PUHY-P YSKD (-BS)



Specifications

Model			PUHY-P1450YSKD (-BS)	PUHY-P1500YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	158.0	165.0
		BTU/h	539,100	563,000
	Power input	kW	48.17	50.45
	Current input	A	81.3-77.2-74.4	85.1-80.9-77.9
	EER	kW/kW	3.28	3.27
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	158.0	165.0
		BTU/h	539,100	563,000
	Power input	kW	52.49	56.12
	Current input	A	88.6-84.1-81.1	94.7-90.0-86.7
	COP	kW/kW	3.01	2.94
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/2~50	P15~P600/2~50
Sound pressure level (measured in anechoic room)		dB <A>	69.5	70
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P450YKD (-BS)	PUHY-P500YKD (-BS)	PUHY-P500YKD (-BS)	PUHY-P500YKD (-BS)	PUHY-P500YKD (-BS)	PUHY-P500YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2	Propeller fan x 2
	Air flow rate	m^3/min	210	360	360	360	360	360
		L/s	3,500	6,000	6,000	6,000	6,000	6,000
		cfm	7,415	12,712	12,712	12,712	12,712	12,712
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2	0.92 x 2
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	12.4	13.3	13.3	13.3	13.3	13.3
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740	1,650 x 1,750 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16	65 x 68-15/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 11.5 kg (26 lbs)	R410A x 11.8 kg (27 lbs)	R410A x 11.8 kg (27 lbs)	R410A x 11.8 kg (27 lbs)	R410A x 11.8 kg (27 lbs)	R410A x 11.8 kg (27 lbs)
Net weight		kg (lbs)	241 (532)	285 (629)	285 (629)	285 (629)	285 (629)	285 (629)
Heat exchanger			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series - High Efficiency
PUHY-EP YSKD (-BS)



Specifications

Model			PUHY-EP400YSKD (-BS)	PUHY-EP450YSKD (-BS)	PUHY-EP500YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	44.8	50.4	56.0
		BTU/h	152,900	172,000	191,100
	Power input	kW	9.21	10.54	11.91
	Current input	A	15.5-14.7-14.2	17.7-16.9-16.2	20.1-19.1-18.4
	EER	kW/kW	4.86	4.78	4.70
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	44.8	50.4	56.0
		BTU/h	152,900	172,000	191,100
	Power input	kW	10.66	12.00	13.36
	Current input	A	17.9-17.0-16.4	20.2-19.2-18.5	22.5-21.4-20.6
	COP	kW/kW	4.20	4.20	4.19
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P400/1~34	P15~P400/1~39	P15~P500/1~43
Sound pressure level (measured in anechoic room)		dB <A>	60	60.5	61
Refrigerant piping diameter	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed

Set Model

Model			PUHY-P200YKD (-BS)	PUHY-P200YKD (-BS)	PUHY-P200YKD (-BS)	PUHY-P250YKD (-BS)	PUHY-P250YKD (-BS)	PUHY-P250YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	175	175	175	175	175	175
		L/s	2,917	2,917	2,917	2,917	2,917	2,917
		cfm	6,179	6,179	6,179	6,179	6,179	6,179
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
	*3 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	5.5	5.5	5.5	6.9	6.9	6.9
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 920 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)
Net weight		kg (lbs)	191 (422)	191 (422)	191 (422)	191 (422)	191 (422)	191 (422)
Heat exchanger			Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series - High Efficiency
PUHY-EP YSKD (-BS)



Specifications

Model			PUHY-EP650YSKD (-BS)	PUHY-EP700YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	73.5	80.0
		BTU/h	250,800	273,000
	Power input	kW	17.83	19.75
	Current input	A	30.0-28.5-27.5	33.3-31.6-30.5
	EER	kW/kW	4.12	4.05
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	73.5	80.0
		BTU/h	250,800	273,000
	Power input	kW	18.70	20.25
	Current input	A	31.5-29.9-28.9	34.1-32.4-31.3
	COP	kW/kW	3.93	3.95
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	64	64
Refrigerant piping diameter	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	34.93 (1-3/8) Brazed

Set Model

Model			PUHY-P300YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P350YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	185	210	210	210
		L/s	3,083	3,500	3,500	3,500
		cfm	6,532	7,415	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor		Inverter-control, Direct-driven by motor	
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter
	Motor output	kW	8.1	10.4	10.4	10.4
	Case heater	kW	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>	
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
Refrigerant	Type x original charge		R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	204 (450)	243 (536)	243 (536)	243 (536)
Heat exchanger			Salt-resistant cross fin & copper tube		Salt-resistant cross fin & copper tube	
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		Outdoor Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series - High Efficiency
PUHY-EP YSKD (-BS)



Specifications

Model			PUHY-EP750YSKD (-BS)	PUHY-EP800YSKD (-BS)	PUHY-EP850YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	84.8	90.4	96.0
		BTU/h	289,300	308,400	327,600
	Power input	kW	19.18	20.82	22.53
	Current input	A	32.3-30.7-29.6	35.1-33.3-32.1	38.0-36.1-34.8
	EER	kW/kW	4.42	4.34	4.26
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	84.8	90.4	96.0
		BTU/h	289,300	308,400	327,600
	Power input	kW	20.58	21.99	23.35
	Current input	A	34.7-33.0-31.8	37.1-35.2-33.9	39.4-37.4-36.0
	COP	kW/kW	4.12	4.11	4.11
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/1~50	P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	64	64	64
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P200YKD (-BS)	PUHY-P200YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P200YKD (-BS)	PUHY-P250YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P250YKD (-BS)	PUHY-P250YKD (-BS)	PUHY-P350YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	175	175	210	175	175	210	175	175	210
		L/s	2,917	2,917	3,500	2,917	2,917	3,500	2,917	2,917	3,500
		cfm	6,179	6,179	7,415	6,179	6,179	7,415	6,179	6,179	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	5.5	5.5	10.4	5.5	6.9	10.4	6.9	6.9	10.4
	Case heater	kW	–	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	191 (422)	191 (422)	243 (536)	191 (422)	191 (422)	243 (536)	191 (422)	191 (422)	243 (536)
Heat exchanger			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series - High Efficiency
PUHY-EP YSKD (-BS)



Specifications

Model			PUHY-EP900YSKD (-BS)	PUHY-EP950YSKD (-BS)	PUHY-EP1000YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	101.5	107.0	113.5
		BTU/h	346,300	365,100	387,300
	Power input	kW	24.16	26.75	28.80
	Current input	A	40.7-38.7-37.3	45.1-42.9-41.3	48.6-46.1-44.5
	EER	kW/kW	4.20	4.00	3.94
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	101.5	107.0	113.5
		BTU/h	346,300	365,100	387,300
	Power input	kW	25.24	27.22	28.80
	Current input	A	42.6-40.4-39.0	45.9-43.6-42.0	48.6-46.1-44.5
	COP	kW/kW	4.02	3.93	3.94
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/1~50	P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	65	66	66
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P250YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P300YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P350YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	175	185	210	185	185	210	185	210	210
		L/s	2,917	3,083	3,500	3,083	3,083	3,500	3,083	3,500	3,500
		cfm	6,179	6,532	7,415	6,532	6,532	7,415	6,532	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
*3	External static press.		0 Pa ($0\ mmH_2O$)	0 Pa ($0\ mmH_2O$)	0 Pa ($0\ mmH_2O$)	0 Pa ($0\ mmH_2O$)	0 Pa ($0\ mmH_2O$)	0 Pa ($0\ mmH_2O$)	0 Pa ($0\ mmH_2O$)	0 Pa ($0\ mmH_2O$)	0 Pa ($0\ mmH_2O$)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	6.9	8.1	10.4	8.1	8.1	10.4	8.1	10.4	10.4
	Case heater	kW	–	–	–	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 920 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 36-1/4 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 8.0 kg (18 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	191 (422)	204 (450)	243 (536)	204 (450)	204 (450)	243 (536)	204 (450)	243 (536)	243 (536)
Heat exchanger			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed
	Gas pipe	mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / $3.1 mmH_2O$, $6.1 mmH_2O$).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

OUTDOOR UNIT

YKD-series - High Efficiency
PUHY-EP YSKD (-BS)



Specifications

Model			PUHY-EP1050YSKD (-BS)	PUHY-EP1100YSKD (-BS)
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	120.0	125.0
		BTU/h	409,400	426,500
	Power input	kW	29.62	32.55
	Current input	A	50.0-47.5-45.7	54.9-52.2-50.3
	EER	kW/kW	4.05	3.84
Temp. range of cooling	Indoor	W.B.	15.0~24.0 °C (59~75 °F)	15.0~24.0 °C (59~75 °F)
	Outdoor	D.B.	-5.0~52.0 °C (23~126 °F)	-5.0~52.0 °C (23~126 °F)
Heating capacity (Nominal)	*2	kW	120.0	125.0
		BTU/h	409,400	426,500
	Power input	kW	31.25	33.24
	Current input	A	52.7-50.1-48.3	56.1-53.3-51.3
	COP	kW/kW	3.84	3.76
Temp. range of heating	Indoor	D.B.	15.0~27.0 °C (59~81 °F)	15.0~27.0 °C (59~81 °F)
	Outdoor	W.B.	-20.0~15.5 °C (-4~60 °F)	-20.0~15.5 °C (-4~60 °F)
Indoor unit connectable	Total capacity		50~130% of outdoor unit capacity	50~130% of outdoor unit capacity
	Model/Quantity		P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	66	67
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PUHY-P350YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P350YKD (-BS)	PUHY-P400YKD (-BS)
Fan	Type x Quantity		Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1	Propeller fan x 1
	Air flow rate	m^3/min	210	210	210	210	210	210
		L/s	3,500	3,500	3,500	3,500	3,500	3,500
		cfm	7,415	7,415	7,415	7,415	7,415	7,415
	Control, Driving mechanism		Inverter-control, Direct-driven by motor			Inverter-control, Direct-driven by motor		
	Motor output	kW	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1	0.92 x 1
	*3 External static press.		0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)	0 Pa (0 mmH_2O)
Compressor	Type		Inverter scroll hermetic compressor			Inverter scroll hermetic compressor		
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	10.4	10.4	10.4	10.4	10.4	10.8
	Case heater	kW	–	–	–	–	–	–
External finish			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>			Pre-coated galvanized steel sheets (+powder coating for -BS type) <MUNSELL 3Y 7.8/1.1 or similar>		
External dimension H x W x D		mm	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740	1,650 x 1,220 x 740
		in.	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16	65 x 48-1/16 x 29-3/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)			High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		
	Inverter circuit (COMP./FAN)		Over-heat protection, Over-current protection			Over-heat protection, Over-current protection		
Refrigerant	Type x original charge		R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)	R410A x 11.5 kg (26 lbs)
Net weight		kg (lbs)	243 (536)	243 (536)	243 (536)	243 (536)	243 (536)	241 (532)
Heat exchanger			Salt-resistant cross fin & copper tube			Salt-resistant cross fin & copper tube		
Pipe between unit and distributor	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Optional parts			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G			Outdoor Twinning kit: CMY-Y300VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S/302S-G2 Header: CMY-Y104/108/1010-G		

Notes:

*1,*2 Nominal conditions

	Indoor	Outdoor	Pipe length	Level difference
Cooling	27 °CD.B./19 °CW.B. (81 °FD.B./66 °FW.B.)	35 °CD.B. (95 °FD.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)
Heating	20 °CD.B. (68°FD.B.)	7 °CD.B./6 °CW.B. (45 °FD.B./43 °FW.B.)	7.5 m (24-9/16 ft.)	0 m (0 ft.)

*3 External static pressure option is available (30Pa, 60Pa / 3.1mmH_2O, 6.1mmH_2O).
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specifications may be subject to change without notice.

Optional Parts for Outdoor Units

For PUCY-Series

Description	Model	Remarks
Twinning kit	CMY-Y100VBK3	For PUCY-P550-P650YSKE / GP400-GP650YSKE / EP400-EP650YSKE
	CMY-Y200VBK2	For PUCY-P700-P1000YSKE / GP700YSKE / EP700YSKE
	CMY-Y300VBK3	For PUCY-P1050-P1500YSKE / GP750-GP1100YSKE / EP750-EP1500YSKE
Branch pipe (Joint)	CMY-Y102SS-G2	200 or below (Total capacity of indoor unit)
	CMY-Y102LS-G2	201-400 (Total capacity of indoor unit)
	CMY-Y202S-G2	401-650 (Total capacity of indoor unit)
		The 1st branch of P450-P650
	CMY-Y302S-G2	651 or above (Total capacity of indoor unit)
		The 1st branch of P700-P1250
Branch pipe (Header)	CMY-Y104-G	For 4 branches
	CMY-Y108-G	For 8 branches
	CMY-Y1010-G	For 10 branches

Note: Indoor unit capacities: the capacity of an indoor unit is the same as the number used for its type identification.

For PUHY-Series

Description	Model	Remarks
Twinning kit	CMY-Y100VBK3	For PUHY-P550-P650YSKD / EP400-EP650YSKD
	CMY-Y200VBK2	For PUHY-P700-P1000YSKD / EP700YSKD
	CMY-Y300VBK3	For PUHY-P1050-P1500YSKD / EP750-EP1100YSKD
Branch pipe (Joint)	CMY-Y102SS-G2	200 or below (Total capacity of indoor unit)
	CMY-Y102LS-G2	201-400 (Total capacity of indoor unit)
	CMY-Y202S-G2	401-650 (Total capacity of indoor unit)
		The 1st branch of P450-P650
	CMY-Y302S-G2	651 or above (Total capacity of indoor unit)
		The 1st branch of P700-P1250
Branch pipe (Header)	CMY-Y104-G	For 4 branches
	CMY-Y108-G	For 8 branches
	CMY-Y1010-G	For 10 branches

Note: Indoor unit capacities: the capacity of an indoor unit is the same as the number used for its type identification.

WY-series

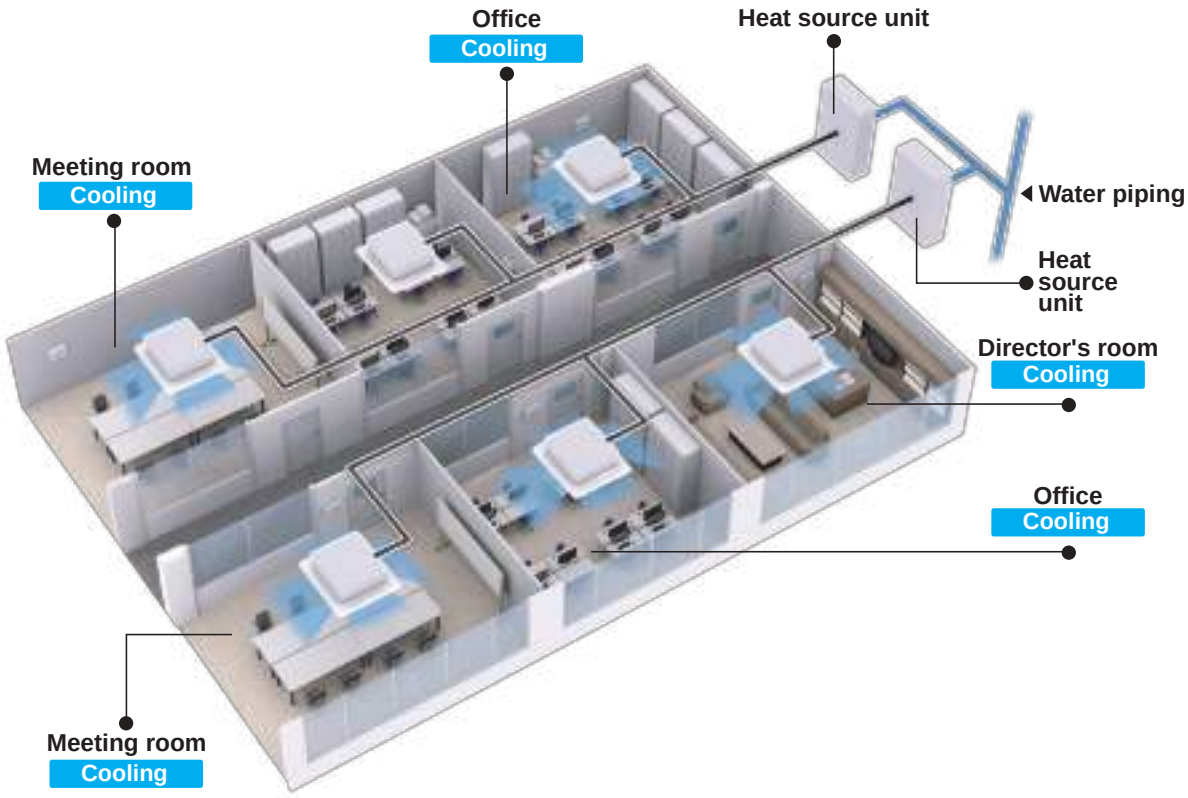
PQHY

An another offer using a water circuit for VRF. The water cooled systems offer greater flexibility in installation.





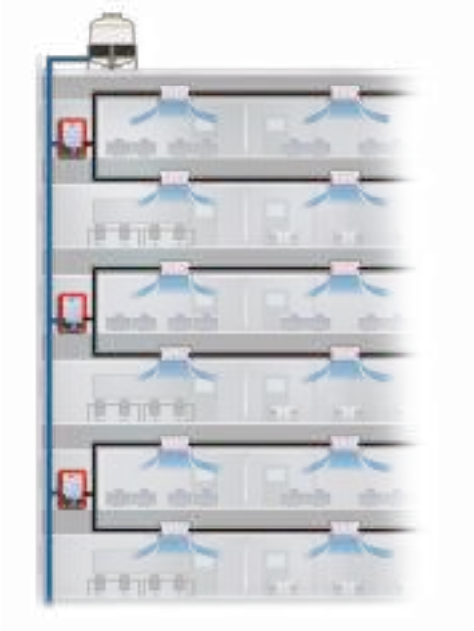
Installation image (WY-Series)



The CITY MULTI WY-Series has all the benefits of the Y-Series using water source condensing units. Condensing units can be situated indoors allowing greater design flexibility.
Depending on capacity, up to 15 to 50 indoor units can be connected to a single condensing unit with individualized and/or centralized control. The two-pipe system allows all CITY MULTI solutions to switch between cooling and heating while maintaining a constant indoor temperature.

Compact outdoor units can be easily installed in the machine rooms on each floor. This helps overcome the restriction on differences in height of refrigerant piping. Individual air conditioning can be easily provided in high-rise buildings using this system.

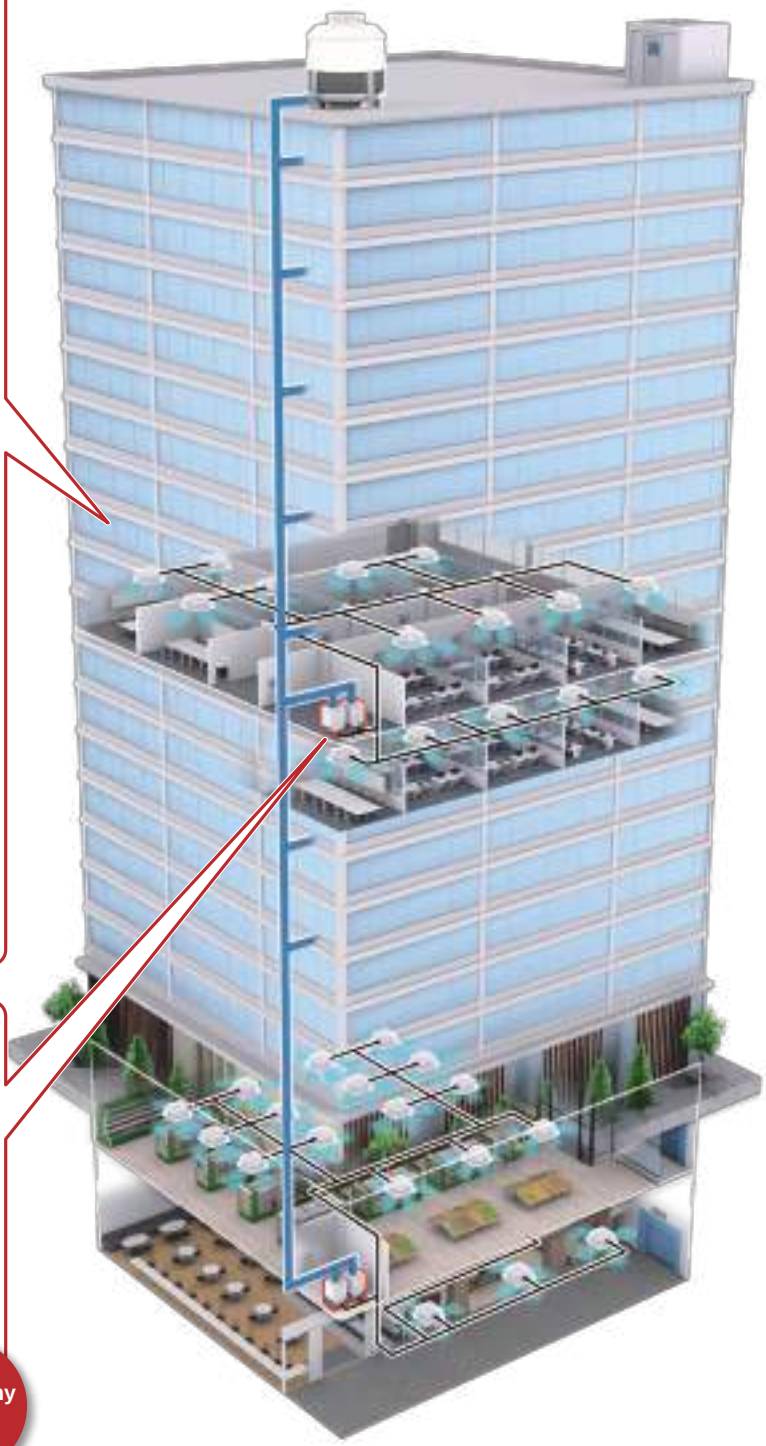
Individual air conditioning in high-rise buildings and underground shopping districts are made possible by using water piping, which offers greater usability over longer distances.



- Water cooled systems can be used even in buildings that are taller than 50 m by running a main water pipe through each floor*.
  * Depends on filed supplied water circuit.
- Any heat source system that can supply heat source water between 10°C to 45°C can be used.

Heat source units can be installed in the machine room of each individual floor.



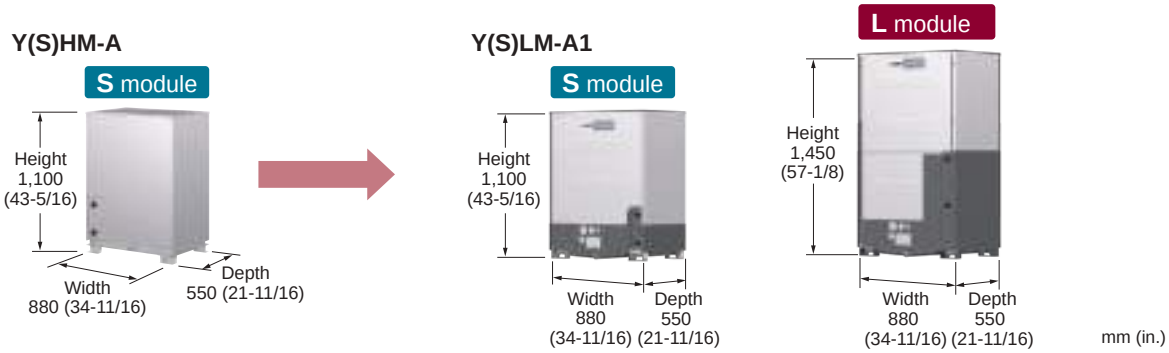


YLM-Series

Wide capacity range available, single module capable of up to P600 and combination module up to P900.



Single- or combination-module units are available to meet various installation conditions and capacity requirements.



WY-Series

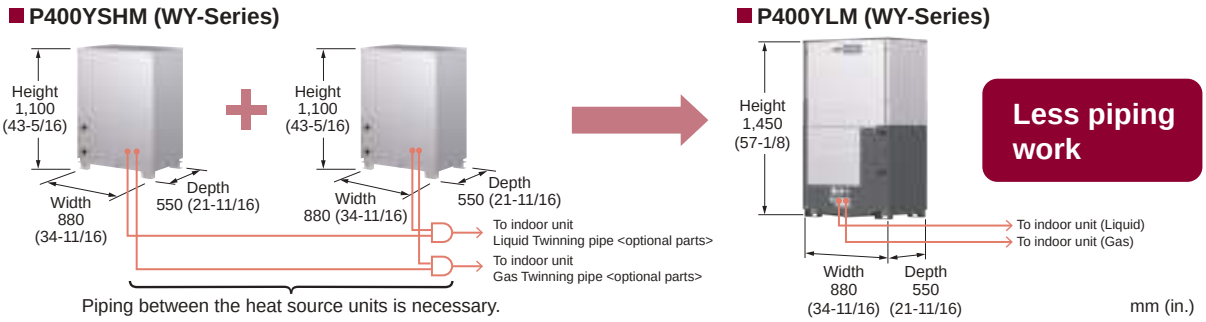
Single-module units available up to P600

		P200	P250	P300	P350	P400	P450	P500	P550	P600	P650	P700	P750	P800	P850	P900
PQHY-P Y(S)LM-A1	Single	S	S	S	L	L	L	L	L	L						
PQHY-P Y(S)HM-A	Single	S	S	S												
PQHY-P Y(S)LM-A1	Combination					S+S	S+S	S+S	S+S	S+S		L+L	L+L	L+L	L+L	L+L
PQHY-P Y(S)HM-A	Combination					S+S	S+S	S+S	S+S	S+S	S+S+S	S+S+S	S+S+S	S+S+S	S+S+S	S+S+S

Benefit of single module wide capacity range

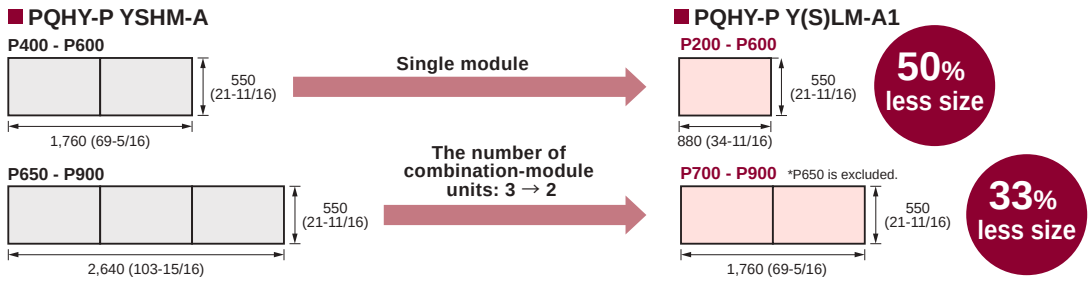
Less piping work

Capable of covering up to P600 (24 HP) with a single module.



Less footprint

Less footprint by the enhancement of the lineup of single-module units.

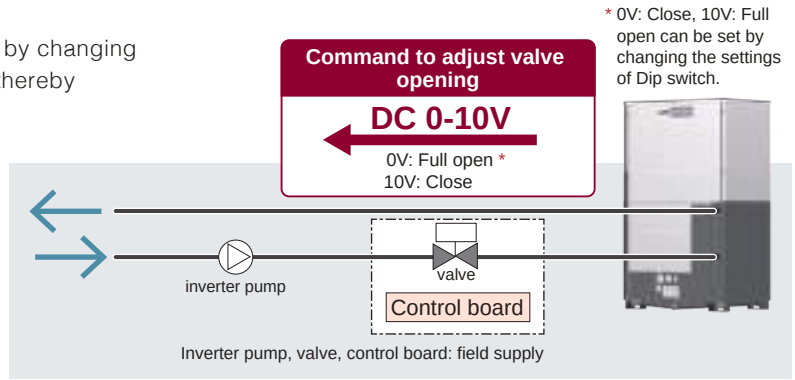


Water flow rate control

System energy consumption can be improved by changing the water flow volume during partial load and thereby reducing water pump consumption.

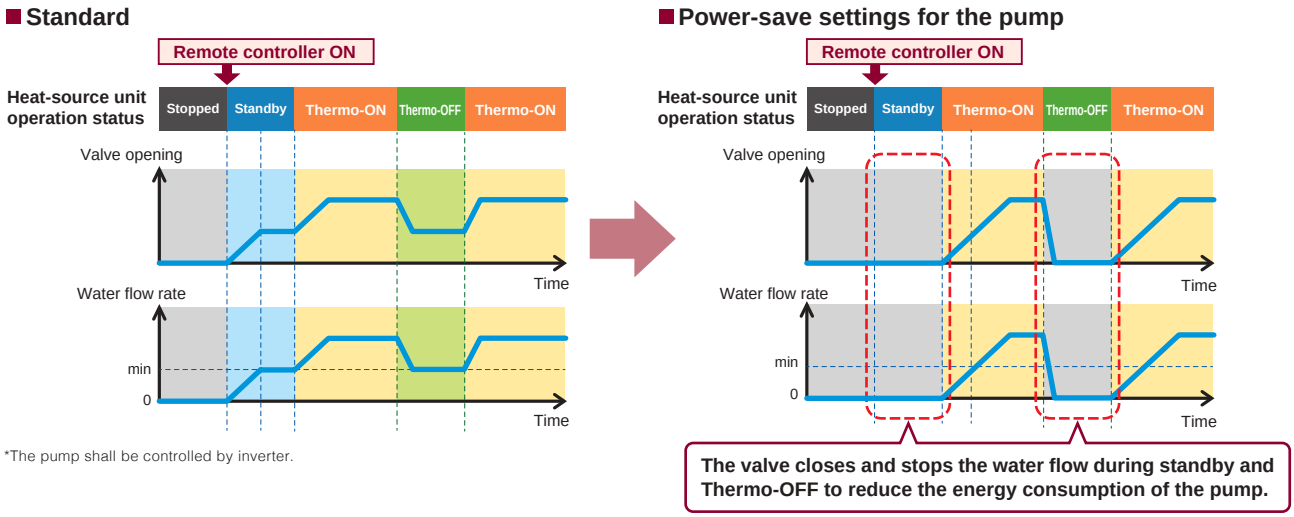
- Control of water flow rate
  Control output voltage (0-10V) to adjust valve opening [0V: Full open,10V: close]
  Voltage at 0 volt: Even when power is down, water will continue to circulate.

* When using "water flow rate control", the pump needs to be controlled by inverter.
* Pump interlock is required.



Power saving setting for the pump

On the A1 type models, the water control valve is closed during standby and Thermo-OFF to reduce the circulating water flow rate achieving the reduction in power consumption of the pump.



*The pump shall be controlled by inverter.

Self-cooling device

Because the heat source unit includes a self-cooling device, there is no need to secure space for installing a separate cooling device such as a fan.

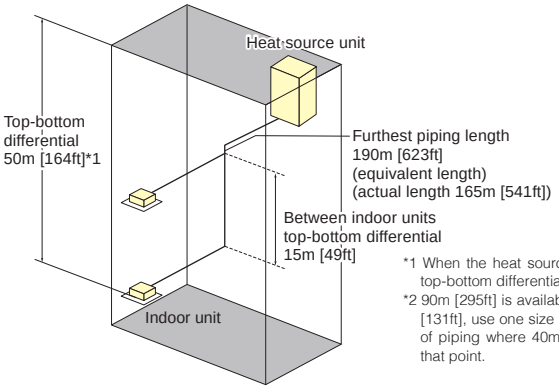


System Pipe Lengths

[P200-P900 (WY-Series)]

Refrigerant Piping Lengths	Maximum meters [Feet]
Total length	300-500 [984-1640]
Maximum allowable length	165 (190 equivalent) [541(623)]
Farthest indoor from first branch	40 [131]*2

Vertical differentials between units	Maximum meters [Feet]
Indoor/heat source (heat source higher)	50 [164]
Indoor/heat source (heat source lower)	40 [131]
Indoor/indoor	15 [49]



*1 When the heat source unit is installed below the indoor unit, top-bottom differential is 40m [131ft].
*2 90m [295ft] is available. When the piping length exceeds 40m [131ft], use one size larger liquid pipe starting with the section of piping where 40m [131ft] is exceeded and all piping after that point.

HEAT SOURCE UNIT

WY-series (Heat pump)

PQHY-P YLM-A1



Specifications

Model			PQHY-P200YLM-A1	PQHY-P250YLM-A1	PQHY-P300YLM-A1
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	22.4	28.0	33.5
	*1	BTU / h	76,400	95,500	114,300
	Power input	kW	3.71	4.90	6.04
	Current input	A	6.2-5.9-5.7	8.2-7.8-7.5	10.1-9.6-9.3
	EER	kW / kW	6.03	5.71	5.54
Temp. range of cooling	Indoor	W.B.	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Heating capacity (Nominal)	*2	kW	25.0	31.5	37.5
	*2	BTU / h	85,300	107,500	128,000
	Power input	kW	3.97	5.08	6.25
	Current input	A	6.7-6.3-6.1	8.5-8.1-7.8	10.5-10.0-9.6
	COP	kW / kW	6.29	6.20	6.00
Temp. range of heating	Indoor	D.B.	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Indoor unit connectable	Total capacity		50~130% of heat source unit capacity	50~130% of heat source unit capacity	50~130% of heat source unit capacity
	Model / Quantity		P15~P250/1~17	P15~P250/1~21	P15~P300/1~26
Sound pressure level (measured in anechoic room)		dB <A>	46	48	54
Refrigerant piping diameter	Liquid pipe	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed (12.7 (1/2) Brazed, farthest length >= 90 m)	9.52 (3/8) Brazed (12.7 (1/2) Brazed, farthest length >= 40 m)
	Gas pipe	mm (in.)	19.05 (3/4) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed
Circulating water	Water flow rate	m^3 / h	5.76	5.76	5.76
		L/min	96	96	96
		cfm	3.4	3.4	3.4
	Pressure drop	kPa	24	24	24
	Operating volume range	m^3 / h	3.0 ~ 7.2	3.0 ~ 7.2	3.0 ~ 7.2
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter
	Motor output	kW	4.8	6.2	7.7
	Case heater	kW	–	–	–
External finish			Galvanized steel sheets	Galvanized steel sheets	Galvanized steel sheets
External dimension HxWxD		mm	1,100 x 880 x 550	1,100 x 880 x 550	1,100 x 880 x 550
		in.	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP.)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
	Compressor		Over-heat protection	Over-heat protection	Over-heat protection
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	170 (375)
Heat exchanger			plate type	plate type	plate type
	Water volume in plate	L	5.0	5.0	5.0
	Water pressure Max.	MPa	2.0	2.0	2.0
Optional parts			Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104, 108, 1010-G	Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104, 108, 1010-G	Joint: CMY-Y102SS/LS-G2 Header: CMY-Y104, 108, 1010-G

Notes:

*1,*2 Nominal conditions

	Indoor	Inlet water temperature	Pipe length	Level difference
Cooling	27ºCD.B./19ºCW.B. (81ºFD.B./66ºFW.B.)	30ºC (86ºF)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºCD.B. (68ºFD.B.)	20ºC (68ºF)		

*The ambient temperature of the heat source unit needs to be kept below 40ºCD.B.
*The ambient relative humidity of the heat source unit needs to be kept below 80%.
*The heat source unit should not be installed at outdoor.
*Be sure to mount a strainer (more than 50 meshes) at the water inlet piping of the unit.
*Be sure to provide interlocking for the unit operation and water circuit.
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specification may be subject to change without notice.

HEAT SOURCE UNIT

WY-series (Heat pump)

PQHY-P YLM-A1



Specifications

Model			PQHY-P350YLM-A1	PQHY-P400YLM-A1	PQHY-P450YLM-A1
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	40.0	45.0	50.0
	*1	BTU / h	136,500	153,500	170,600
	Power input	kW	7.14	8.03	9.29
	Current input	A	12.0-11.4-11.0	13.5-12.8-12.4	15.6-14.8-14.3
	EER	kW / kW	5.60	5.60	5.38
Temp. range of cooling	Indoor	W.B.	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Heating capacity (Nominal)	*2	kW	45.0	50.0	56.0
	*2	BTU / h	153,500	170,600	191,100
	Power input	kW	7.53	8.37	9.79
	Current input	A	12.7-12.0-11.6	14.1-13.4-12.9	16.5-15.7-15.1
	COP	kW / kW	5.97	5.97	5.72
Temp. range of heating	Indoor	D.B.	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Indoor unit connectable	Total capacity		50~130% of heat source unit capacity	50~130% of heat source unit capacity	50~130% of heat source unit capacity
	Model / Quantity		P15~P300/1~30	P15~P400/1~34	P15~P400/1~39
Sound pressure level (measured in anechoic room)		dB <A>	52	52	54
Refrigerant piping diameter	Liquid pipe	mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Circulating water	Water flow rate	m^3 / h	7.20	7.20	7.20
		L/min	120	120	120
		cfm	4.2	4.2	4.2
	Pressure drop	kPa	44	44	44
	Operating volume range	m^3 / h	4.5 ~ 11.6	4.5 ~ 11.6	4.5 ~ 11.6
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter
	Motor output	kW	9.5	10.7	11.6
	Case heater	kW	–	–	–
External finish			Galvanized steel sheets	Galvanized steel sheets	Galvanized steel sheets
External dimension HxWxD		mm	1,450 x 880 x 550	1,450 x 880 x 550	1,450 x 880 x 550
		in.	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP.)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
	Compressor		Over-heat protection	Over-heat protection	Over-heat protection
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	214 (472)	214 (472)	214 (472)
Heat exchanger			plate type	plate type	plate type
	Water volume in plate	L	5.0	5.0	5.0
	Water pressure Max.	MPa	2.0	2.0	2.0
Optional parts			Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G

Notes:

*1,*2 Nominal conditions

	Indoor	Inlet water temperature	Pipe length	Level difference
Cooling	27ºCD.B./19ºCW.B. (81ºFD.B./66ºFW.B.)	30ºC (86ºF)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºCD.B. (68ºFD.B.)	20ºC (68ºF)		

*The ambient temperature of the heat source unit needs to be kept below 40ºCD.B.
*The ambient relative humidity of the heat source unit needs to be kept below 80%.
*The heat source unit should not be installed at outdoor.
*Be sure to mount a strainer (more than 50 meshes) at the water inlet piping of the unit.
*Be sure to provide interlocking for the unit operation and water circuit.
*When a PFFY-P400/500YM indoor unit is used, the capacity of the indoor unit must not exceed the capacity of the heat source unit. Each indoor unit must be connected to a heat source unit.
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specification may be subject to change without notice.

HEAT SOURCE UNIT

WY-series (Heat pump)

PQHY-P YLM-A1



Specifications

Model			PQHY-P500YLM-A1	PQHY-P550YLM-A1	PQHY-P600YLM-A1
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	56.0	63.0	69.0
	*1	BTU / h	191,100	215,000	235,400
	Power input	kW	11.17	12.54	14.49
	Current input	A	18.8-17.9-17.2	21.1-20.1-19.3	24.4-23.2-22.3
	EER	kW / kW	5.01	5.02	4.76
Temp. range of cooling	Indoor	W.B.	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Heating capacity (Nominal)	*2	kW	63.0	69.0	76.5
	*2	BTU / h	215,000	235,400	261,000
	Power input	kW	11.43	12.27	14.51
	Current input	A	19.2-18.3-17.6	20.7-19.6-18.9	24.4-23.2-22.4
	COP	kW / kW	5.51	5.62	5.27
Temp. range of heating	Indoor	D.B.	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Indoor unit connectable	Total capacity		50~130% of heat source unit capacity	50~130% of heat source unit capacity	50~130% of heat source unit capacity
	Model / Quantity		P15~P500/1~43	P15~P500/1~47	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	54	56.5	56.5
Refrigerant piping diameter	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Circulating water	Water flow rate	m^3 / h	7.20	11.52	11.52
		L/min	120	192	192
		cfm	4.2	6.8	6.8
	Pressure drop	kPa	44	45	45
	Operating volume range	m^3 / h	4.5 ~ 11.6	6.0 ~ 14.4	6.0 ~ 14.4
Compressor	Type		Inverter scroll hermetic compressor	Inverter scroll hermetic compressor	Inverter scroll hermetic compressor
	Starting method		Inverter	Inverter	Inverter
	Motor output	kW	13.0	15.0	16.1
	Case heater	kW	–	0.045 (240 V)	0.045 (240 V)
External finish			Galvanized steel sheets	Galvanized steel sheets	Galvanized steel sheets
External dimension HxWxD		mm	1,450 x 880 x 550	1,450 x 880 x 550	1,450 x 880 x 550
		in.	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	High pressure sensor, High pressure switch at 4.15 MPa (601 psi)
	Inverter circuit (COMP.)		Over-heat protection, Over-current protection	Over-heat protection, Over-current protection	Over-heat protection, Over-current protection
	Compressor		Over-heat protection	Over-heat protection	Over-heat protection
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 11.7 kg (26 lbs)	R410A x 11.7 kg (26 lbs)
Net weight		kg (lbs)	214 (472)	243 (536)	243 (536)
Heat exchanger			plate type	plate type	plate type
	Water volume in plate	L	5.0	10.0	10.0
	Water pressure Max.	MPa	2.0	2.0	2.0
Optional parts			Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G	Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G

Notes:

*1,*2 Nominal conditions

	Indoor	Inlet water temperature	Pipe length	Level difference
Cooling	27ºCD.B./19ºCW.B. (81ºFD.B./66ºFW.B.)	30ºC (86ºF)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºCD.B. (68ºFD.B.)	20ºC (68ºF)		

*The ambient temperature of the heat source unit needs to be kept below 40ºCD.B.
*The ambient relative humidity of the heat source unit needs to be kept below 80%.
*The heat source unit should not be installed at outdoor.
*Be sure to mount a strainer (more than 50 meshes) at the water inlet piping of the unit.
*Be sure to provide interlocking for the unit operation and water circuit.
*When a PFFY-P400/500YM indoor unit is used, the capacity of the indoor unit must not exceed the capacity of the heat source unit. Each indoor unit must be connected to a heat source unit.
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specification may be subject to change without notice.

HEAT SOURCE UNIT

WY-series (Heat pump)

PQHY-P YSLM-A1



Specifications

Model			PQHY-P400YSLM-A1	PQHY-P450YSLM-A1	PQHY-P500YSLM-A1
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	45.0	50.0	56.0
	*1	BTU / h	153,500	170,600	191,100
	Power input	kW	7.70	8.78	10.12
	Current input	A	12.9-12.3-11.9	14.8-14.0-13.5	17.0-16.2-15.6
	EER	kW / kW	5.84	5.69	5.53
Temp. range of cooling	Indoor	W.B.	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Heating capacity (Nominal)	*2	kW	50.0	56.0	63.0
	*2	BTU / h	170,600	191,100	215,000
	Power input	kW	7.94	8.97	10.16
	Current input	A	13.4-12.7-12.2	15.1-14.3-13.8	17.1-16.2-15.7
	COP	kW / kW	6.29	6.24	6.20
Temp. range of heating	Indoor	D.B.	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Indoor unit connectable	Total capacity		50~130% of heat source unit capacity	50~130% of heat source unit capacity	50~130% of heat source unit capacity
	Model / Quantity		P15~P400/1~34	P15~P400/1~39	P15~P500/1~43
Sound pressure level (measured in anechoic room)		dB <A>	49	50	51
Refrigerant piping diameter	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed

Set Model

Model			PQHY-P200YLM-A1	PQHY-P200YLM-A1	PQHY-P250YLM-A1	PQHY-P200YLM-A1	PQHY-P250YLM-A1	PQHY-P250YLM-A1
Circulating water	Water flow rate	m^3 / h	5.76 + 5.76		5.76 + 5.76		5.76 + 5.76	
		L/min	96 + 96		96 + 96		96 + 96	
		cfm	3.4 + 3.4		3.4 + 3.4		3.4 + 3.4	
	Pressure drop	kPa	24	24	24	24	24	24
	Operating volume range	m^3 / h	3.0 + 3.0 ~ 7.2 + 7.2		3.0 + 3.0 ~ 7.2 + 7.2		3.0 + 3.0 ~ 7.2 + 7.2	
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	4.8	4.8	6.2	4.8	6.2	6.2
	Case heater	kW	–	–	–	–	–	–
External finish			Galvanized steel sheets		Galvanized steel sheets		Galvanized steel sheets	
External dimension HxWxD		mm	1,100 x 880 x 550	1,100 x 880 x 550	1,100 x 880 x 550	1,100 x 880 x 550	1,100 x 880 x 550	1,100 x 880 x 550
		in.	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP.)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
	Compressor		Over-heat protection	Over-heat protection	Over-heat protection	Over-heat protection	Over-heat protection	Over-heat protection
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	170 (375)	170 (375)	170 (375)	170 (375)
Heat exchanger			plate type	plate type	plate type	plate type	plate type	plate type
	Water volume in plate	L	5.0	5.0	5.0	5.0	5.0	5.0
	Water pressure Max.	MPa	2.0	2.0	2.0	2.0	2.0	2.0
Optional parts			Heat Source Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G		Heat Source Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G		Heat Source Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Inlet water temperature	Pipe length	Level difference
Cooling	27ºCD.B./19ºCW.B. (81ºFD.B./66ºFW.B.)	30ºC (86ºF)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºCD.B. (68ºFD.B.)	20ºC (68ºF)		

*The ambient temperature of the heat source unit needs to be kept below 40ºCD.B.
*The ambient relative humidity of the heat source unit needs to be kept below 80%.
*The heat source unit should not be installed at outdoor.
*Be sure to mount a strainer (more than 50 meshes) at the water inlet piping of the unit.
*Be sure to provide interlocking for the unit operation and water circuit.
*When a PFFY-P400/500YM indoor unit is used, the capacity of the indoor unit must not exceed the capacity of the heat source unit. Each indoor unit must be connected to a heat source unit.
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specification may be subject to change without notice.

HEAT SOURCE UNIT

WY-series (Heat pump)

PQHY-P YSLM-A1





Specifications

Model			PQHY-P550YSLM-A1	PQHY-P600YSLM-A1	PQHY-P700YSLM-A1
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	63.0	69.0	80.0
	*1	BTU / h	215,000	235,400	273,000
	Power input	kW	11.55	12.84	14.73
	Current input	A	19.4-18.5-17.8	21.6-20.5-19.8	24.8-23.6-22.7
	EER	kW / kW	5.45	5.37	5.43
Temp. range of cooling	Indoor	W.B.	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Heating capacity (Nominal)	*2	kW	69.0	76.5	88.0
	*2	BTU / h	235,400	261,000	300,300
	Power input	kW	11.31	12.75	14.73
	Current input	A	19.0-18.1-17.4	21.5-20.4-19.7	24.8-23.6-22.7
	COP	kW / kW	6.10	6.00	5.97
Temp. range of heating	Indoor	D.B.	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Indoor unit connectable	Total capacity		50~130% of heat source unit capacity	50~130% of heat source unit capacity	50~130% of heat source unit capacity
	Model / Quantity		P15~P500/1~47	P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	55	57	55
Refrigerant piping diameter	Liquid pipe	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed	34.93 (1-3/8) Brazed

Set Model

Model			PQHY-P300YLM-A1	PQHY-P250YLM-A1	PQHY-P300YLM-A1	PQHY-P300YLM-A1	PQHY-P350YLM-A1	PQHY-P350YLM-A1
Circulating water	Water flow rate	m^3 / h	5.76 + 5.76		5.76 + 5.76		7.20 + 7.20	
		L/min	96 + 96		96 + 96		120 + 120	
		cfm	3.4 + 3.4		3.4 + 3.4		4.2 + 4.2	
	Pressure drop	kPa	24	24	24	24	44	44
	Operating volume range	m^3 / h	3.0 + 3.0 ~ 7.2 + 7.2		3.0 + 3.0 ~ 7.2 + 7.2		4.5 + 4.5 ~ 11.6 + 11.6	
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter	Inverter	Inverter
	Motor output	kW	7.7	6.2	7.7	7.7	9.5	9.5
	Case heater	kW	–	–	–	–	–	–
External finish			Galvanized steel sheets		Galvanized steel sheets		Galvanized steel sheets	
External dimension HxWxD		mm	1,100 x 880 x 550	1,100 x 880 x 550	1,100 x 880 x 550	1,100 x 880 x 550	1,450 x 880 x 550	1,450 x 880 x 550
		in.	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16	43-5/16 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP.)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
	Compressor		Over-heat protection	Over-heat protection	Over-heat protection	Over-heat protection	Over-heat protection	Over-heat protection
Refrigerant	Type x original charge		R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 5.0 kg (12 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	170 (375)	170 (375)	170 (375)	170 (375)	214 (472)	214 (472)
Heat exchanger			plate type	plate type	plate type	plate type	plate type	plate type
	Water volume in plate	L	5.0	5.0	5.0	5.0	5.0	5.0
	Water pressure Max.	MPa	2.0	2.0	2.0	2.0	2.0	2.0
Optional parts			Heat Source Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G		Heat Source Twinning kit: CMY-Y100VBK3 Joint: CMY-Y102SS/LS-G2, CMY-Y202S-G2 Header: CMY-Y104, 108, 1010-G		Heat Source Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202, 302S-G2 Header: CMY-Y104, 108, 1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Inlet water temperature	Pipe length	Level difference
Cooling	27ºCD.B./19ºCW.B. (81ºFD.B./66ºFW.B.)	30ºC (86ºF)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºCD.B. (68ºFD.B.)	20ºC (68ºF)		

*The ambient temperature of the heat source unit needs to be kept below 40ºCD.B.
*The ambient relative humidity of the heat source unit needs to be kept below 80%.
*The heat source unit should not be installed at outdoor.
*Be sure to mount a strainer (more than 50 meshes) at the water inlet piping of the unit.
*Be sure to provide interlocking for the unit operation and water circuit.
*When a PFFY-P400/500YM indoor unit is used, the capacity of the indoor unit must not exceed the capacity of the heat source unit. Each indoor unit must be connected to a heat source unit.
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specification may be subject to change without notice.

HEAT SOURCE UNIT

WY-series (Heat pump)

PQHY-P YSLM-A1



Specifications

Model			PQHY-P750YSLM-A1	PQHY-P800YSLM-A1
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	85.0	90.0
	*1	BTU / h	290,000	307,100
	Power input	kW	15.64	16.57
	Current input	A	26.4-25.0-24.1	27.9-26.5-25.6
	EER	kW / kW	5.43	5.43
Temp. range of cooling	Indoor	W.B.	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Heating capacity (Nominal)	*2	kW	95.0	100.0
	*2	BTU / h	324,100	341,200
	Power input	kW	15.90	16.75
	Current input	A	26.8-25.4-24.5	28.2-26.8-25.8
	COP	kW / kW	5.97	5.97
Temp. range of heating	Indoor	D.B.	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Indoor unit connectable	Total capacity		50~130% of heat source unit capacity	50~130% of heat source unit capacity
	Model / Quantity		P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	55	55
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	34.93 (1-3/8) Brazed	34.93 (1-3/8) Brazed

Set Model

Model			PQHY-P400YLM-A1	PQHY-P350YLM-A1	PQHY-P400YLM-A1	PQHY-P400YLM-A1
Circulating water	Water flow rate	m^3 / h	7.20 + 7.20		7.20 + 7.20	
		L/min	120 + 120		120 + 120	
		cfm	4.2 + 4.2		4.2 + 4.2	
	Pressure drop	kPa	44	44	44	44
	Operating volume range	m^3 / h	4.5 + 4.5 ~ 11.6 + 11.6		4.5 + 4.5 ~ 11.6 + 11.6	
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter
	Motor output	kW	10.7	9.5	10.7	10.7
	Case heater	kW	–	–	–	–
External finish			Galvanized steel sheets	Galvanized steel sheets	Galvanized steel sheets	Galvanized steel sheets
External dimension HxWxD		mm	1,450 x 880 x 550	1,450 x 880 x 550	1,450 x 880 x 550	1,450 x 880 x 550
		in.	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP.)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
	Compressor		Over-heat protection	Over-heat protection	Over-heat protection	Over-heat protection
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	214 (472)	214 (472)	214 (472)	214 (472)
Heat exchanger			plate type	plate type	plate type	plate type
	Water volume in plate	L	5.0	5.0	5.0	5.0
	Water pressure Max.	MPa	2.0	2.0	2.0	2.0
Optional parts			Heat Source Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202, 302S-G2 Header: CMY-Y104, 108, 1010-G		Heat Source Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202, 302S-G2 Header: CMY-Y104, 108, 1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Inlet water temperature	Pipe length	Level difference
Cooling	27ºCD.B./19ºCW.B. (81ºFD.B./66ºFW.B.)	30ºC (86ºF)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºCD.B. (68ºFD.B.)	20ºC (68ºF)		

*The ambient temperature of the heat source unit needs to be kept below 40ºCD.B.
*The ambient relative humidity of the heat source unit needs to be kept below 80%.
*The heat source unit should not be installed at outdoor.
*Be sure to mount a strainer (more than 50 meshes) at the water inlet piping of the unit.
*Be sure to provide interlocking for the unit operation and water circuit.
*When a PFFY-P400/500YM indoor unit is used, the capacity of the indoor unit must not exceed the capacity of the heat source unit. Each indoor unit must be connected to a heat source unit.
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specification may be subject to change without notice.

HEAT SOURCE UNIT

WY-series (Heat pump)

PQHY-P YSLM-A1



Specifications

Model			PQHY-P850YSLM-A1	PQHY-P900YSLM-A1
Power source			3-phase 4-wire 380-400-415 V 50/60 Hz	3-phase 4-wire 380-400-415 V 50/60 Hz
Cooling capacity (Nominal)	*1	kW	96.0	101.0
	*1	BTU / h	327,600	344,600
	Power input	kW	18.03	19.38
	Current input	A	30.4-28.9-27.8	32.7-31.0-29.9
	EER	kW / kW	5.32	5.21
Temp. range of cooling	Indoor	W.B.	15.0~24.0°C (59~75°F)	15.0~24.0°C (59~75°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Heating capacity (Nominal)	*2	kW	108.0	113.0
	*2	BTU / h	368,500	385,600
	Power input	kW	18.49	19.74
	Current input	A	31.2-29.6-28.5	33.3-31.6-30.5
	COP	kW / kW	5.84	5.72
Temp. range of heating	Indoor	D.B.	15.0~27.0°C (59~81°F)	15.0~27.0°C (59~81°F)
	Inlet water	°C	10.0~45.0°C (50~113°F)	10.0~45.0°C (50~113°F)
Indoor unit connectable	Total capacity		50~130% of heat source unit capacity	50~130% of heat source unit capacity
	Model / Quantity		P15~P600/1~50	P15~P600/1~50
Sound pressure level (measured in anechoic room)		dB <A>	56	57
Refrigerant piping diameter	Liquid pipe	mm (in.)	19.05 (3/4) Brazed	19.05 (3/4) Brazed
	Gas pipe	mm (in.)	41.28 (1-5/8) Brazed	41.28 (1-5/8) Brazed

Set Model

Model			PQHY-P450YLM-A1	PQHY-P400YLM-A1	PQHY-P450YLM-A1	PQHY-P450YLM-A1
Circulating water	Water flow rate	m^3 / h	7.20 + 7.20		7.20 + 7.20	
		L/min	120 + 120		120 + 120	
		cfm	4.2 + 4.2		4.2 + 4.2	
	Pressure drop	kPa	44	44	44	44
	Operating volume range	m^3 / h	4.5 + 4.5 ~ 11.6 + 11.6		4.5 + 4.5 ~ 11.6 + 11.6	
Compressor	Type		Inverter scroll hermetic compressor		Inverter scroll hermetic compressor	
	Starting method		Inverter	Inverter	Inverter	Inverter
	Motor output	kW	11.6	10.7	11.6	11.6
	Case heater	kW	–	–	–	–
External finish			Galvanized steel sheets	Galvanized steel sheets	Galvanized steel sheets	Galvanized steel sheets
External dimension HxWxD		mm	1,450 x 880 x 550	1,450 x 880 x 550	1,450 x 880 x 550	1,450 x 880 x 550
		in.	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16	57-1/8 x 34-11/16 x 21-11/16
Protection devices	High pressure protection		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)		High pressure sensor, High pressure switch at 4.15 MPa (601 psi)	
	Inverter circuit (COMP.)		Over-heat protection, Over-current protection		Over-heat protection, Over-current protection	
	Compressor		Over-heat protection	Over-heat protection	Over-heat protection	Over-heat protection
Refrigerant	Type x original charge		R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)	R410A x 6.0 kg (14 lbs)
Net weight		kg (lbs)	214 (472)	214 (472)	214 (472)	214 (472)
Heat exchanger			plate type	plate type	plate type	plate type
	Water volume in plate	L	5.0	5.0	5.0	5.0
	Water pressure Max.	MPa	2.0	2.0	2.0	2.0
Optional parts			Heat Source Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202, 302S-G2 Header: CMY-Y104, 108, 1010-G		Heat Source Twinning kit: CMY-Y200VBK2 Joint: CMY-Y102SS/LS-G2, CMY-Y202, 302S-G2 Header: CMY-Y104, 108, 1010-G	

Notes:

*1,*2 Nominal conditions

	Indoor	Inlet water temperature	Pipe length	Level difference
Cooling	27ºCD.B./19ºCW.B. (81ºFD.B./66ºFW.B.)	30ºC (86ºF)	7.5m (24-9/16ft.)	0m (0ft.)
Heating	20ºCD.B. (68ºFD.B.)	20ºC (68ºF)		

*The ambient temperature of the heat source unit needs to be kept below 40ºCD.B.
*The ambient relative humidity of the heat source unit needs to be kept below 80%.
*The heat source unit should not be installed at outdoor.
*Be sure to mount a strainer (more than 50 meshes) at the water inlet piping of the unit.
*Be sure to provide interlocking for the unit operation and water circuit.
*When a PFFY-P400/500YM indoor unit is used, the capacity of the indoor unit must not exceed the capacity of the heat source unit. Each indoor unit must be connected to a heat source unit.
*Nominal condition *1,*2 are subject to JIS B8615-2.
*Due to continuing improvement, above specification may be subject to change without notice.

Optional Parts for Heat souce unit

Description	Model	Remarks
Branch pipe (Joint)	CMY-Y102SS-G2	200 or below (Total capacity of indoor unit)
	CMY-Y102LS-G2	201~400 (Total capacity of indoor unit)
	CMY-Y202S-G2	401~650 (Total capacity of indoor unit)
		The first branch of P450-P650
	CMY-Y302S-G2	651 or above (Total capacity of indoor unit)
Branch pipe (Header)	CMY-Y104C-G	For 4 branches
	CMY-Y108C-G	For 8 branches
	CMY-Y1010C-G	For 10 branches
Twinning kit	CMY-Y100VBK3	For PQHY-P400~P600YSLM-A1
	CMY-Y200VBK2	For PQHY-P700~P900YSLM-A1

Indoor unit

A suitable unit can be selected from among a wide lineup of 17 types of units according to a building's needs. The lineup includes the cassette type, ensuring improved comfort and a pleasant appearance, the ceiling concealed type, excelling in quietness and ensuring flexible placement of air outlets, and the ceiling suspended and wall-mounted types.



Various installation patterns for indoor situations

Ceiling Cassette





Ceiling Concealed





Other Types





Ceiling Cassette Type

4-way airflow type

PLFY-P VHM-PA
PLFY-EP VEM-E



Office Hospital School Restaurant

Capacity zone

PLFY-P (kW)	3.6	4.5	5.6	7.1	9.0	11.2	14.0	16.0
PLFY-EP (kW)	3.6		5.6	7.1				

NEW

››› P117-P120

4-way airflow type

PLFY-P VFM-E1



Office Hospital School Restaurant

Capacity zone

kW	1.7	2.2	2.8	3.6	4.5	5.6

››› P121-P124

2-way airflow type

PLFY-P VMMD-E



Office Hospital School Residence

Capacity zone

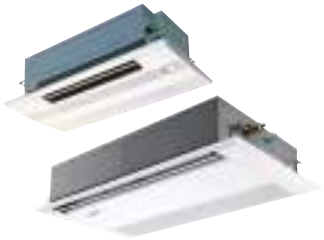
kW	2.2	2.8	3.6	4.5	5.6	7.1	9.0	11.2	14.0

NEW

››› P125-P126

1-way airflow type

PMFY-P VBM-E
PMFY-P VFM-PA



Office School Restaurant Residence

Capacity zone

VBM-E (kW)	2.2	2.8	3.6	4.5
VFM-PA (kW)	5.6	7.1	8.0	9.0

››› P127-P128

Ceiling Concealed Type

Low static pressure type

PEFY-P VMS1(L)-E



Office Residence Restaurant Hotel

Capacity zone

kW	1.7	2.2	2.8	3.6	4.5	5.6	7.1

››› P131-P132

Medium static pressure type

PEFY-P VMA(L)-E4
PEFY-P VMA3/4-E



Office School Residence Hotel

Capacity zone

VMA(L) (kW)	2.2	2.8	3.6	4.5	5.6	7.1	8.0	9.0	11.2	14.0	16.0
VMA3/4 (kW)	2.2	2.8	3.6	4.5	5.6	7.1	8.0				

››› P133-P136

High static pressure type

PEFY-P VMH(S)-E







Office Hospital School Restaurant

Capacity zone

kW	4.5	5.6	7.1	8.0	9.0	11.2	14.0	16.0	22.4	28.0

››› P137-P138

Fresh air intake type

PEFY-P VMHS-E-F





Office Hospital School Restaurant

Capacity zone

kW	14.0	22.4	28.0

››› P139-P140

Fresh air intake type

PEFY-P VMH-E-F





Office Hospital School Restaurant

Capacity zone

kW	9.0	16.0	22.4	28.0

››› P141-P142

Low noise type

PEFY-P VMR-E-L/R



Residence Hotel

Capacity zone

kW	2.2	2.8	3.6

››› P143-P144

Other Type

Ceiling suspended type

PCFY-P VKM-E



Office School Restaurant

Capacity zone

kW	4.5	7.1	11.2	14.0

››› P145-P146

Wall-mounted type

PKFY-P VLM-E
PKFY-P VKM-PA



P15-P32VLM



P40/P50VLM



P63/P100VKM

Office Restaurant

Capacity zone

VLM (kW)	1.7	2.2	2.8	3.6	4.5	5.6
VKM (kW)	7.1	11.2				

››› P147-P148

Floor standing type

PFFY-P VKM-E2



Office Residence

Capacity zone

kW	2.2	2.8	3.6	4.5

››› P149-P150

Floor standing type (for perimeter zone)

PFFY-P VEM-E



Office School

Capacity zone

kW	2.2	2.8	3.6	4.5	5.6	7.1

››› P151-P152

Floor standing type (for perimeter zone)

PFFY-P VCM-E



Office Hotel

Capacity zone

kW	2.2	2.8	3.6	4.5	5.6	7.1

››› P153-P154

Floor standing type

PFFY-P YM-E
PFFY-P YMH-E



Restaurant Airport hall

Capacity zone

YM (kW)	22.4	28.0	45.0	56.0
YMH (kW)	22.4	28.0		

››› P155-P156

Floor standing type (freshair intake type)

PFFY-P YM-E-F



Factory hall Airport

Capacity zone

kW	33.5	67.0

››› P157-P158

Ceiling Cassette







Ceiling Cassette Type

4-way airflow type

PLFY-P VHM-PA NEW
PLFY-EP VEM-E



- With new feature such as Silver Antibacterial Agent and Dual Barrier Material improve cleanliness
- To improve constructability and maintainability, new features are incorporated
- New panel with thinner and smarter design
- The airflow pattern can be selected from 4, 3, or 2 directions
- With the 3D i-see Sensor, “felt temperature* control” is available, contributing to improve comfort/energy efficiency

*i.e., the temperature felt by people in the room

3D i-see Sensor	Decoration Panel	Drain Pump	Air Flow Rate 4 types	Fresh air intake usable

4-way airflow type

PLFY-P VFM-E1



- 625 mm [24 in.] compact design. Fits perfectly with 2-inch by 2-inch ceiling systems
- With 3D i-see Sensor, smart control based on the number of people in the room is available, contributing to improve comfort/energy efficiency

3D i-see Sensor	Decoration Panel	Drain Pump	Air Flow Rate 3 types	Fresh air intake usable

2-way airflow type

PLFY-P VMMD-E NEW

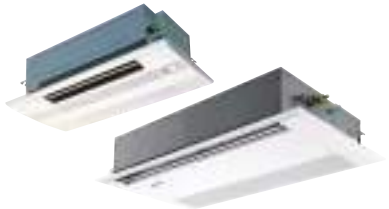


- A new design features a pure white panel sporting the Mitsubishi Electric logo.
- The maximum lifting height of the drain pump has been extended to 850mm from the ceiling surface.
- Power consumption has been reduced by changing the AC fan motors to DC.

3D i-see Sensor	Decoration Panel	Drain Pump	Air Flow Rate 3 types	Fresh air intake usable

1-way airflow type

PMFY-P VBM-E
PMFY-P VFM-PA



- Line up expanded up to P80
- The 1-way air flow type that is recommended to install on the edges of a room
- Thin design with a height of 230 mm [9-1/16 in.]

Decoration Panel	Drain Pump	Air Flow Rate 4 types	Fresh air intake usable

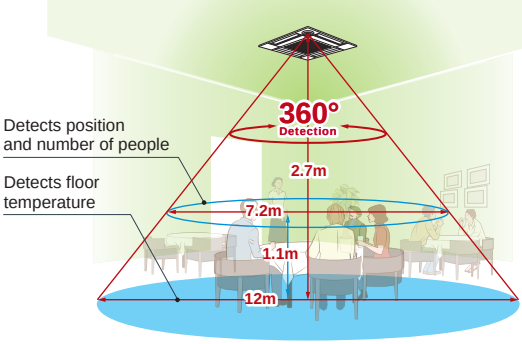
3D i-see Sensor



The “3D i-see Sensor” built into the optional corner panel eliminates uneven temperature distribution and reduces electricity consumption.

Highly accurate motion detection

A total of eight sensors rotate a full 360° in 3-minute intervals. In addition to detecting body temperature, our original algorithm also detects the number of occupants in the room and their positions.



*In case of a 2.7m ceiling

PLFY-P VHM-PA
PLFY-EP VEM-E









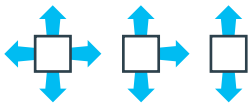
Optimum Airflow

2-, 3-, 4-way Airflow Pattern Selection

Three outlet options to choose from-bidirectional, 3-way, and 4-way to suit different types of installation. Select, for example, 4-directional for installation in the center of the room and 3-directional for installation in the corner.

2-, 3-, 4-way airflow pattern selection

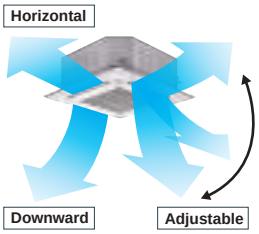
* Optional shuffle placement is required for 2- and 3-way patterns.



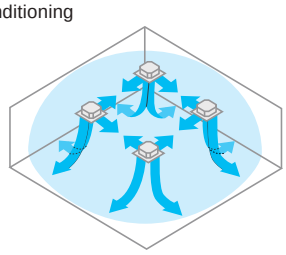
Individual Vane Angle Settings

Vane directions can be changed or fixed from the remote controller to direct the supply air at or away from the objects or the occupants in the room.

Airflow direction at each vane can be set using the wired remote controller or the wireless remote controller (PAR-SL101A-E).



Multi-directional air-conditioning



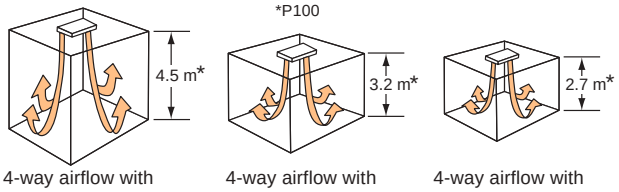
2-, 3-, 4-way Airflow Pattern Selection

Individual Vane Angle Settings

The combination of individual vane setting enables the optimal outlet setting for each room layout to ensure even temperature distribution throughout each room. The result is uniformly comfortable air conditioning.

Equipped with High- and Low-ceiling Modes

Units are equipped with high- and low-ceiling operation modes that make it possible to switch the airflow volume to match a room's height. The ability to choose the optimum airflow volume makes it possible to optimize the breezy sensation felt throughout the room.



4-way airflow with high-ceiling setting

4-way airflow with standard setting

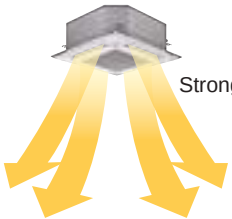
4-way airflow with low-ceiling setting

Airflow Range

Model / Airflow pattern	P32–P80			P100/P125/P140		
	High-ceiling setting	Standard setting	**Low-ceiling setting**	**High-ceiling setting**	Standard setting	**Low-ceiling setting**
4-way	**3.5 m**	2.7 m	**2.5 m**	**4.5 m**	3.2 m	**2.7 m**
3-way	**3.5 m**	3.0 m	**2.7 m**	**4.5 m**	3.6 m	**3.0 m**
2-way	**3.5 m**	3.3 m	**3.0 m**	**4.5 m**	4.0 m	**3.3 m**

Automatic Air-speed Adjustment

An automatic air-speed mode that adjusts airflow speed automatically is adopted to maintain comfortable room conditions at all times. This setting automatically adjusts the air-speed to conditions that match the room environment.



At the start of the heating / cooling operation, the airflow is set to high-speed to quickly heat / cool the room.



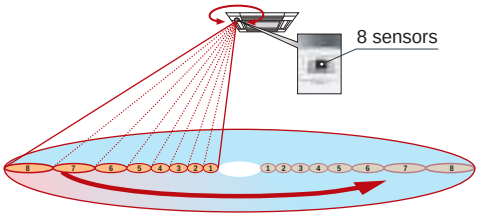
When the room temperature reaches the desired setting, the airflow speed is decreased automatically for stable and comfortable heating/cooling operation.

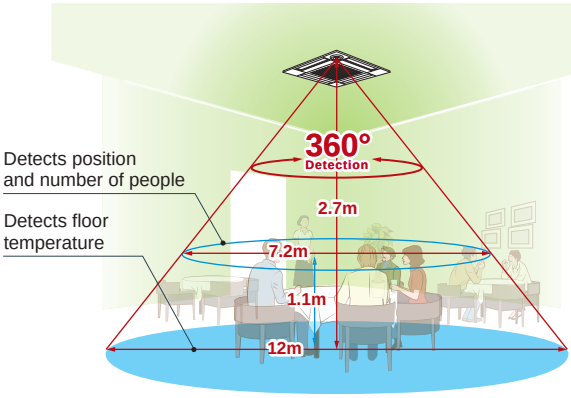
3D i-see Sensor



• Highly accurate people detection

A total of eight sensors rotate a full 360° in 3-minute intervals. In addition to detecting human body temperature, our original algorithm also detects people's positions and the number of people.





Floor surface

*In case of a 2.7m ceiling

• Detects number of people

Room occupancy energy-saving mode

The 3D i-see Sensor detects the number of people in the room. It then calculates the occupancy rate based on the maximum number of people in the room up to that point in time in order to save air-conditioning power. Air-conditioning power equivalent to 1°C is saved during both cooling and heating operation at an occupancy rate of approximately 30%. The temperature is controlled according to the number of people.

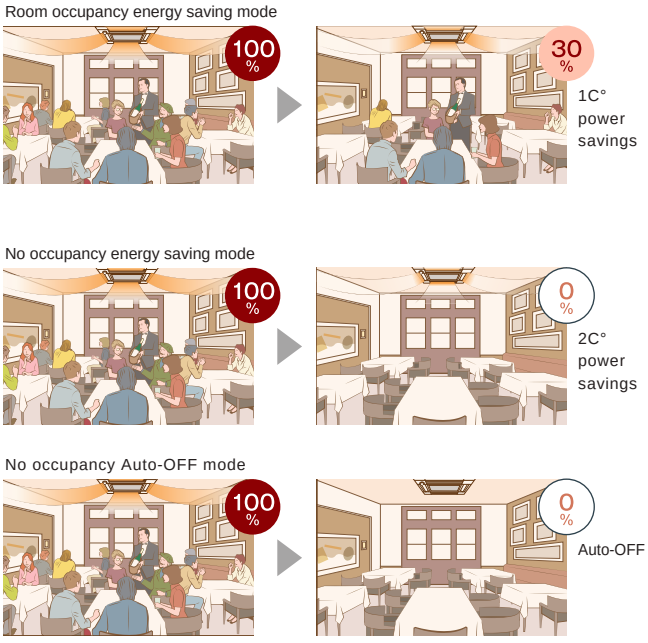
No occupancy energy-saving mode

When 3D i-see Sensor detects that no one is in the room, the system is switched to a preset power-saving mode. If the room remains unoccupied for more than 60min, air-conditioning power equivalent to 2°C is saved during both cooling and heating operation. This contributes to preventing waste in terms of heating and cooling.

No occupancy Auto-OFF mode

When the room remains unoccupied for a preset period of time, the air conditioner turns off automatically, thereby providing even greater power savings. The time until operation is stopped can be set in intervals of 10min, ranging from 60 to 180 min.

*No occupancy Auto-OFF mode is not available when multiple indoor units are operated by one MA remote controller.

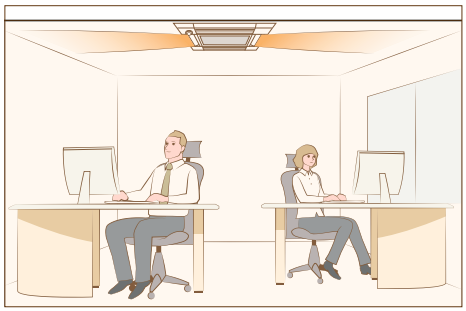


*PAR-41MAAM is required for each setting.

• Detects people's position

Direct/Indirect settings*

Some people do not like the feeling of wind, while others want to be warm from head to toe. People's likes and dislikes vary. With the 3D i-see Sensor, it is possible to choose to block or not block to the wind for each vane.

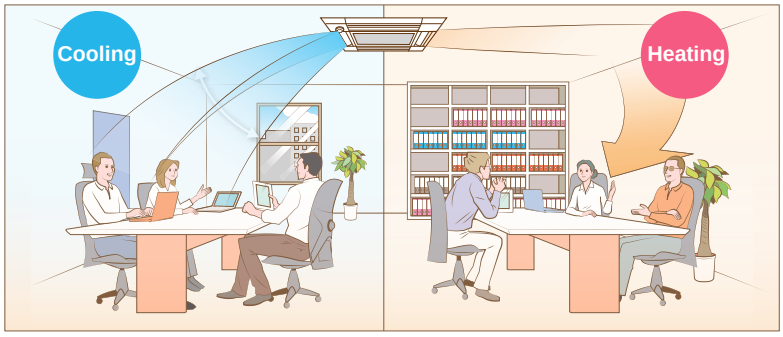


*PAR-41MAAM or PAR-SL101A-E is required for each setting.

Seasonal airflow*

<When cooling>
Saves energy while keeping a comfortable effective temperature by automatically switching between ventilation and cooling. When a pre-set temperature is reached, the air conditioning unit switches to swing fan operation to maintain the effective temperature. This clever function contributes to keeping a comfortable coolness.

<When heating>
The air conditioning unit automatically switches between circulator and heating. Wasted heat that accumulates near the ceiling is reused via circulation. When a pre-set temperature is reached the air conditioner switches from heating to circulator and blows air in the horizontal direction. It pushes down the warm air that has gathered near the ceiling to people's height, thereby providing smart heating.



*PAR-41MAAM is required for each setting.

Easy Installation

Temporary hanging hook

The structure of the panel has been redesigned and is now equipped with a temporary hanging hook.
This has improved work efficiency during panel installation.




No need to remove screws

Installation is possible without removing the screws for the corner panel and the control box, simply loosen them. This lowers the risk of losing screws.

• Corner panel

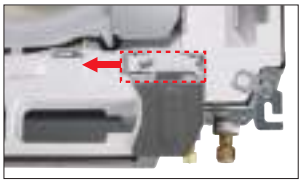


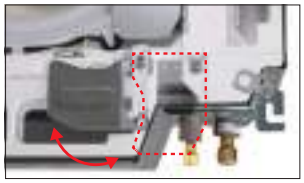
• Control box cover



Screwless wiring NEW

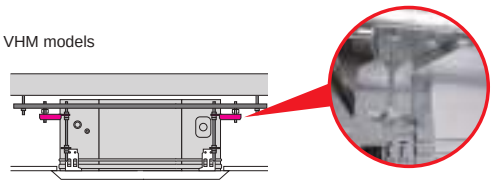
For easier installation, electrical wiring service panel can be removed without any screws, just simply slide the panel and rotates.
This lowers the risk of losing screws.
*Only for PLFY-P VHM models


Slide this new part.


Rotate the part to let cables through.

Side Bracket (Optional Parts) NEW

Side bracket allow installers to lower the position of channel steels. It is good option for installation site with narrow ceiling space.
*Only for PLFY-P VHM models



Easy Maintenance

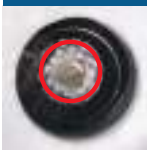
Checking window for drain pan NEW

For easier maintenance, small window will be equipped with unit. It make it easier to check if drain pan needs to be cleaned or not.
*Only for PLFY-P VHM models

• Location of Checking window for drain pan

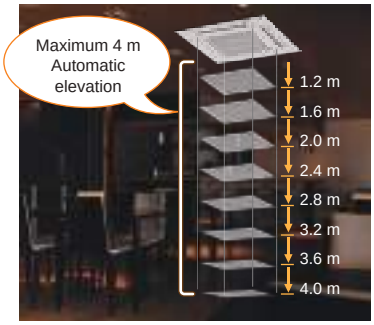


• How to check the status

No need to clean	Recommend to clean
	
Reflector is visible when shining the light on the checking window.	Reflector is invisible when shining the light on the checking window.

Automatic elevation panel (Optional parts)

With automatic elevation panel, cleaning the filter is easy, even with high ceilings.



Cleanliness

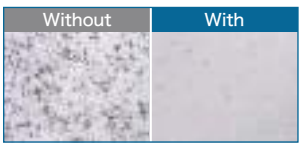
Silver Antibacterial Agent NEW

This Silver Antibacterial Agent is available as a standard. If drain water seeps into the case, the agent dissolves into the water from the case and prevents growth of bacteria or mold.
*Only for PLFY-P VHM models



Dual Barrier Material NEW

Improve cleanliness of the intake grille and air outlet vane by adopting Dual Barrier Material.
*Not available for black panel.
*Only for PLFY-P VHM models



Connectable to

Plasma Quad Connect*

The optional Plasma Quad Connect (PAC-SL36FT-E / PAC-SK51FT-E) can be installed on the indoor units.

* Plasma Quad Connect cannot be used with Auto elevation panel (PLP-6HAJ / PLP-6EAJ), Multi functional casement (PAC-SK76TM-E / PAC-SJ41TM-E), and High-efficiency filter element (PAC-SK71KF-E / PAC-SH59KF-E).



Specifications

Model				PLFY-P32VHM-PA	PLFY-P40VHM-PA	PLFY-P50VHM-PA	PLFY-P63VHM-PA	PLFY-P80VHM-PA
Power source				1-phase 220-240V 50Hz/1-phase 220-230V 60Hz				
Cooling capacity	*1		kW	3.6	4.5	5.6	7.1	9.0
	*1		BTU/h	12,300	15,400	19,100	24,200	30,700
		Power input	kW	0.03	0.03	0.03	0.05	0.06
		Current input	A	0.32	0.32	0.34	0.45	0.60
Heating capacity	*2		kW	4.0	5.0	6.3	8.0	10.0
	*2		BTU/h	13,600	17,100	21,500	27,300	34,100
		Power input	kW	0.03	0.03	0.03	0.05	0.06
		Current input	A	0.25	0.25	0.27	0.38	0.53
External finish (Munsell No.)		Unit		Galvanized steel sheet				
		Panel		MUNSELL (1.0Y 9.2/0.2)				
External dimension H x W x D		Unit	mm	258 x 840 x 840				
		Panel	mm	35 x 950 x 950				
Net weight		Unit	kg	19			21	
		Panel	kg	5				
Heat exchanger				Micro slit fin (Aluminumfin and copper tube)				
Fan	Type x Quantity			Turbo fan x 1				
	Airflow rate (Low-Mid2-Mid1-High)		m^3/min	14 - 15 - 16 - 17	14 - 15 - 16 - 18	14 - 15 - 17 - 19	14 - 16 - 19 - 22	14 - 17 - 21 - 25
			L/s	233 - 250 - 267 - 283	233 - 250 - 267 - 300	233 - 250 - 283 - 317	233 - 267 - 317 - 367	233 - 283 - 350 - 417
			cfm	494 - 530 - 565 - 600	494 - 530 - 565 - 636	494 - 530 - 600 - 671	494 - 565 - 671 - 777	494 - 600 - 742 - 883
	External static pressure		Pa	0				
Motor	Type			DC motor				
	Output		kW	0.050				
Air filter				PP honeycomb				
Sound pressure level (Low-Mid2-Mid1-High)			dB (A)	24 - 26 - 28 - 29	24 - 26 - 28 - 30	24 - 27 - 29 - 31	26 - 29 - 32 - 35	26 - 30 - 34 - 38
Refrigerant control device				LEV				
Diameter of refrigerant pipe		Liquid	mm (in.)	ø6.35 (ø1/4) Flare			ø9.52 (ø3/8) Flare	
		Gas	mm (in.)	ø12.7 (ø1/2) Flare			ø15.88 (ø5/8) Flare	
Field drain pipe size			mm (in.)	O.D 32 (1-1/4)				

Model				PLFY-P100VHM-PA	PLFY-P125VHM-PA	PLFY-P140VHM-PA	PLFY-EP32VEM-E	PLFY-EP50VEM-E	PLFY-EP63VEM-E
Power source				1-phase 220-240V 50Hz/1-phase 220-230V 60Hz			1-phase 220-240V 50Hz, 1-phase 220V 60Hz		
Cooling capacity	*1		kW	11.2	14.0	16.0	3.6	5.6	7.1
	*1		BTU/h	38,200	47,800	54,600	12,300	19,100	24,200
		Power input	kW	0.10	0.12	0.13	0.11	0.11	0.11
		Current input	A	1.00	1.11	1.25	0.98	0.98	0.98
Heating capacity	*2		kW	12.5	16.0	18.0	4.0	6.3	8.0
	*2		BTU/h	42,700	54,600	61,400	13,600	21,500	27,300
		Power input	kW	0.10	0.12	0.13	0.11	0.11	0.11
		Current input	A	0.93	1.04	1.18	0.93	0.93	0.93
External finish (Munsell No.)		Unit		Galvanized steel sheet					
		Panel		MUNSELL (1.0Y 9.2/0.2)					
External dimension H x W x D		Unit	mm	298 x 840 x 840					
		Panel	mm	35 x 950 x 950			40 x 950 x 950		
Net weight		Unit	kg	24		26	27		
		Panel	kg	5					
Heat exchanger				Micro slit fin (Aluminumfin and copper tube)			Micro slit fin (Aluminum fin and copper tube)		
Fan	Type x Quantity			Turbo fan x 1					
	Airflow rate (Low-Mid2-Mid1-High)		m^3/min	19 - 23 - 28 - 34	21 - 25 - 30 - 35	22 - 26 - 31 - 36	22 - 26 - 30 - 34	22 - 26 - 30 - 34	22 - 26 - 30 - 34
			L/s	317 - 383 - 467 - 567	350 - 417 - 500 - 583	367 - 433 - 517 - 600	367 - 433 - 500 - 567	367 - 433 - 500 - 567	367 - 433 - 500 - 567
			cfm	671 - 812 - 989 - 1201	742 - 883 - 1059 - 1236	777 - 918 - 1095 - 1271	777 - 918 - 1059 - 1201	777 - 918 - 1059 - 1201	777 - 918 - 1059 - 1201
	External static pressure		Pa	0					
Motor	Type			DC motor					
	Output		kW	0.120					
Air filter				PP honeycomb					
Sound pressure level (Low-Mid2-Mid1-High)			dB (A)	32 - 36 - 40 - 44	33 - 37 - 41 - 44	35 - 39 - 43 - 46	34 - 38 - 42 - 45	34 - 38 - 42 - 45	34 - 38 - 42 - 45
Refrigerant control device				LEV					
Diameter of refrigerant pipe		Liquid	mm (in.)	ø9.52 (ø3/8) Flare			ø6.35 (ø1/4) Flare		ø9.52 (ø3/8) Flare
		Gas	mm (in.)	ø15.88 (ø5/8) Flare			ø12.7 (ø1/2) Flare		ø15.88 (ø5/8) Flare
Field drain pipe size			mm (in.)	O.D 32 (1-1/4)			O.D. ø32 (1-1/4) (VP-25)		

Notes:

*1. Nominal cooling conditions
Indoor: 27°CD.B./19°CW.B. (81°FD.B./66°FW.B.), Outdoor: 35°CD.B. (95°FD.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

*2. Nominal heating conditions
Indoor: 20°CD.B. (68°FD.B.), Outdoor: 7°CD.B./6°CW.B. (45°FD.B./43°FW.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

* PLFY-EP63VEM-E cannot be connected to PUMY-CP250/300YBM2.

Optional Parts

Description	For PLFY-P VHM	For PLFY-EP VEM
Anti-allergy enzyme filter	PAC-SK70KF-E	PAC-SK44KF-E
Plasma Quad Connect	PAC-SL36FT-E	PAC-SK51FT-E
Multi-functional Casement	PAC-SK76TM-E	PAC-S41TM-E
Duct flange for fresh air intake	PAC-SH65OF-E	PAC-SH65OF-E
Side-suspend parts	PAC-SK79LK-E	-
Air outlet shutter plate	PAC-SK67SP-E	PAC-SJ37SP-E
High effciency filter element	PAC-SK71KF-E	PAC-SH59KF-E
Space Panel	PAC-SK64AS-E	PAC-SJ65AS-E
3D Total Flow unit	PLP-U160HLR-E	-

Panel Option

Description	For PLFY-P VHM	For PLFY-EP VEM
Standard Panel	PLP-6HA	PLP-6EA
Panel with SL100/101 R/C	PLP-6HALM	PLP-6EALM2
Panel with 21MA R/C	PLP-6HAMD	PLP-6EAMD
Automatic filter elevation and signal receiver	PLP-6HAJ	PLP-6EAJ
Black panel (standard)	PLP-6HAB	-
Black panel (with signal receiver)	PLP-6HALMB	-
3D i-see Sensor Corner Panel	PAC-SL35ME-E	PAC-SE1ME-E
Signal receiver Corner Panel	PAR-SR5LA-E	PAR-SE9FA-E

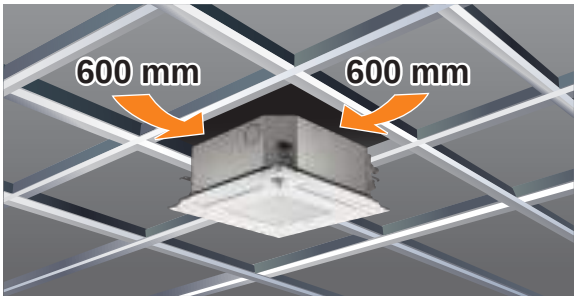
PLFY-P VFM-E1





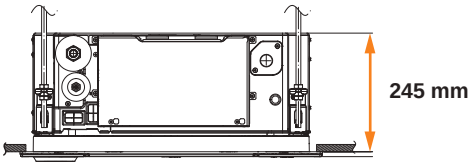
Beautiful square design

The straight square design matches 2 × 2 (600 mm × 600 mm) ceiling construction specifications.
Direct line-based square design enables designs of system ceiling to match the design of direct line type illuminations, thereby creating a beautiful space.



The height above ceiling 245 mm

The height above ceiling of 245 mm is top class in the industry*, and enables fitting into narrow ceiling space.



* As of Aug 2015. Among compact 4-way cassettes for system ceiling. (An incompany investigation.)

Compact & light-weight design

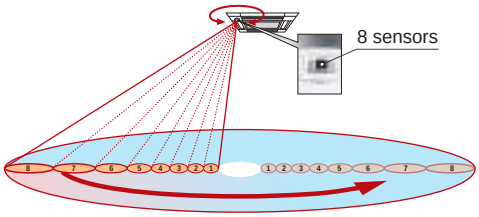
The panel weighs 3 kg, and the unit's body weighs 14 kg (P15, P20 and P25 models) or 15 kg (P32, P40 and P50 models). Their weight is 5 kg lighter than the PLFY-VEM-E model, allowing them to be easily suspended.

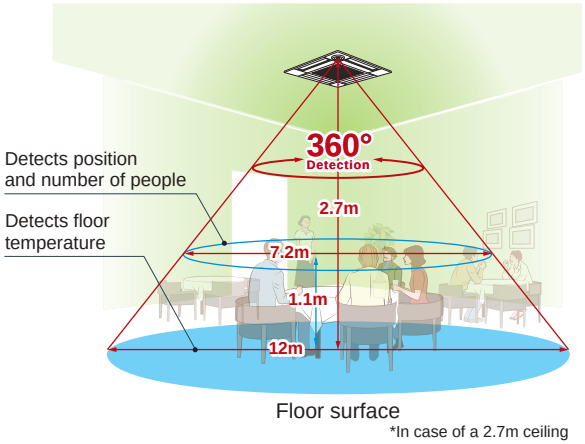
3D i-see Sensor



• Highly accurate people detection

A total of eight sensors rotate a full 360° in 3-minute intervals. In addition to detecting human body temperature, our original algorithm also detects people's positions and the number of people.





*In case of a 2.7m ceiling

• Detects number of people

Room occupancy energy-saving mode

The 3D i-see Sensor detects the number of people in the room. It then calculates the occupancy rate based on the maximum number of people in the room up to that point in time in order to save air-conditioning power. Air-conditioning power equivalent to 1°C is saved during both cooling and heating operation at an occupancy rate of approximately 30%. The temperature is controlled according to the number of people.

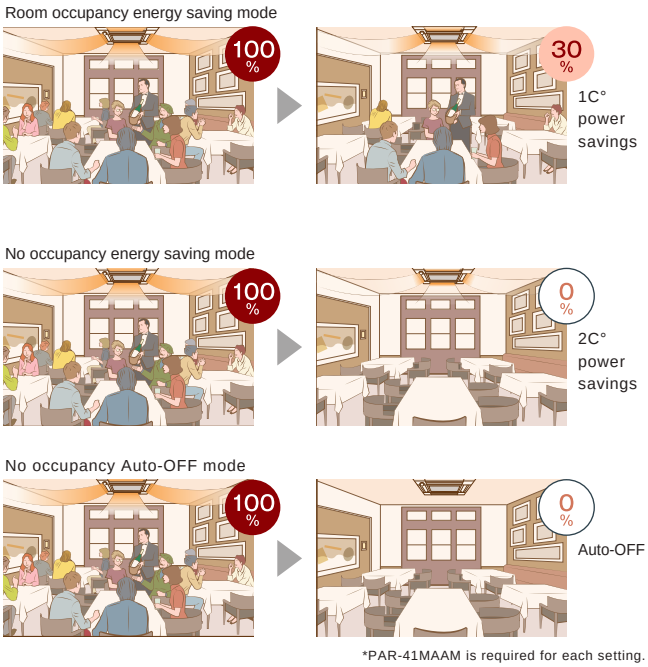
No occupancy energy-saving mode

When 3D i-see Sensor detects that no one is in the room, the system is switched to a preset power-saving mode. If the room remains unoccupied for more than 60min, air-conditioning power equivalent to 2°C is saved during both cooling and heating operation. This contributes to preventing waste in terms of heating and cooling.

No occupancy Auto-OFF mode

When the room remains unoccupied for a preset period of time, the air conditioner turns off automatically, thereby providing even greater power savings. The time until operation is stopped can be set in intervals of 10min, ranging from 60 to 180 min.

*No occupancy Auto-OFF mode is not available when multiple indoor units are operated by one MA remote controller.

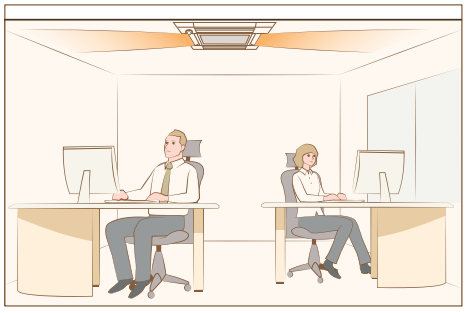


*PAR-41MAAM is required for each setting.

• Detects people's position

Direct/Indirect settings*

Some people do not like the feeling of wind, while others want to be warm from head to toe. People's likes and dislikes vary. With the 3D i-see Sensor, it is possible to choose to block or not block to the wind for each vane.

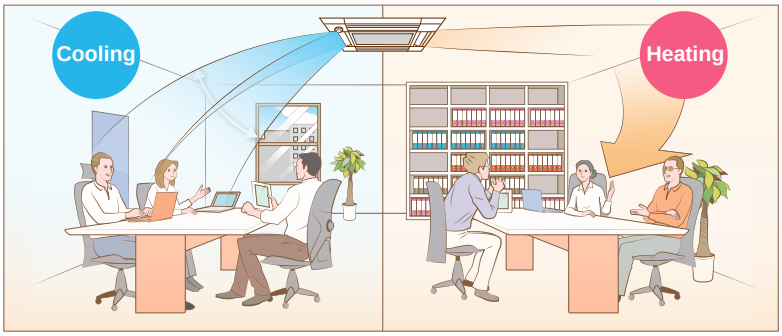


*PAR-41MAAM or PAR-SL101A-E is required for each setting.

Seasonal airflow*

<When cooling>
Saves energy while keeping a comfortable effective temperature by automatically switching between ventilation and cooling. When a pre-set temperature is reached, the air conditioning unit switches to swing fan operation to maintain the effective temperature. This clever function contributes to keeping a comfortable coolness.

<When heating>
The air conditioning unit automatically switches between circulator and heating. Wasted heat that accumulates near the ceiling is reused via circulation. When a pre-set temperature is reached the air conditioner switches from heating to circulator and blows air in the horizontal direction. It pushes down the warm air that has gathered near the ceiling to people's height, thereby providing smart heating.



*PAR-41MAAM is required for each setting.

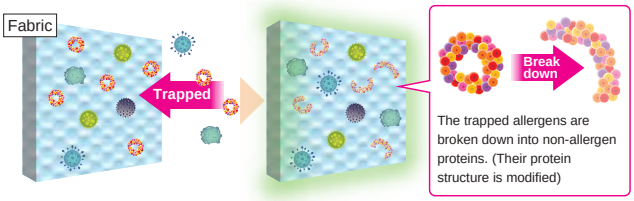
Anti-Allergy Enzyme Filter

Anti-bacterial | Removes viruses | Anti-allergen | Removes odors

The optional anti-allergy enzyme filter PAC-SK46KF-E contains artificial enzymes to filter out or reduce the level of bacteria*1, viruses*2, and allergens (pollen)*3.

It can be easily added to units that have already been installed*4.

* This is effective against bacteria that are attached to the filter surface for 18 hours and viruses that are attached to the filter surface for 24 hours. However, it does not actively remove them from the room itself.



1. The filter fabric traps bacteria, viruses, and allergens.
2. The enzymes inside the filter break down the bacteria, viruses, and allergens to reduce their.

(Image provided for illustrative purposes only.)

*1: According to tests performed by the Boken Quality Evaluation Institute. Testing procedure: JIS L 1902, Quantitative Test (bacterial solution absorption method). Test number: 006109-1, 2. Target: Two types of bacteria attached to the filter. Test result: At least a 99% reduction after 18 hours compared to untreated fabric. *2: According to tests performed by the Japan Textile Products Quality and Technology Center. Testing procedure: JIS L 1922, Determination of Antiviral Activity of Textile Products. Test number: 19KB060923-1. Target: One type of virus attached to the filter. Test result: At least a 99% reduction after 24 hours compared to untreated fabric. *3: According to tests performed by the Japan Food Research Laboratories. Testing procedure: ELISA method. Test number: No. 10014572002-01. Target: One type of pollen attached to the filter. Test result: At least a 99% reduction. *4: For a list of models that are compatible with this product, please referto the feature page of each indoor unit.

Optional Parts

Description	Model	Applicable models
i-see Sensor corner panel	PAC-SF1ME-E	P15, P20, P25, P32, P40, P50
Wireless signal receiver	PAR-SF9FA-E	P15, P20, P25, P32, P40, P50
Anti-allergy enzyme filter	PAC-SK46KF-E	P15, P20, P25, P32, P40, P50

Panel & Corner panel

		With signal Receiver	With 3D i-see Sensor	With New Wireless
Panel	SLP-2FA			
	SLP-2FAL	●		
	SLP-2FAE		●	
	SLP-2FALE	●	●	
	SLP-2FALM	●		●
	SLP-2FALME	●	●	●
Corner panel	PAR-SF9FA-E	●		
	PAC-SF1ME-E		●	

Specifications

Model				PLFY-P15VFM-E1	PLFY-P20VFM-E1	PLFY-P25VFM-E1	PLFY-P32VFM-E1	PLFY-P40VFM-E1	PLFY-P50VFM-E1
Power source				1-phase 220-240V 50Hz/220V 60Hz					
Cooling capacity		*1	kW	1.7	2.2	2.8	3.6	4.5	5.6
		*1	BTU/h	5,800	7,500	9,600	12,300	15,400	19,100
Heating capacity		*1	kW	1.9	2.5	3.2	4.0	5.0	6.3
		*1	BTU/h	6,500	8,500	10,900	13,600	17,100	21,500
Power consumption	Cooling		kW	0.02	0.02	0.02	0.02	0.03	0.04
	Heating		kW	0.02	0.02	0.02	0.02	0.03	0.04
Current	Cooling		A	0.19	0.21	0.22	0.23	0.28	0.40
	Heating		A	0.14	0.16	0.17	0.18	0.23	0.35
External finish (Munsell No.)	Unit			Galvanized steel sheet					
	Panel			MUNSELL (1.0Y 9.2/0.2)					
Dimension H x W x D	Unit		mm (in.)	208 x 570 x 570 (8-1/4 x 22-1/2 x 22-1/2)					
	Panel		mm (in.)	10 x 625 x 625 (3/8 x 24-5/8 x 24-5/8)					
Net weight	Unit		kg (lbs.)	14 (31)			15 (33)		
	Panel		kg (lbs.)	3 (7)					
Heat exchanger				Cross fin (Aluminum fin and copper tube)					
Fan	Type x Quantity			Turbo fan x 1					
	Airflow rate (Lo-Mid-Hi)		m^3/min	6.5-7.5-8.0	6.5-7.5-8.5	6.5-8.0-9.0	7.0-8.0-9.5	7.5-9.0-11.0	9.0-11.0-13.0
			L/s	108-125-133	108-125-142	108-133-150	117-133-158	125-150-183	150-183-217
			cfm	230-265-282	230-265-300	230-282-318	247-282-335	265-318-388	318-388-459
	External static pressure		Pa	0					
Motor	Type			DC motor					
	Output		kW	0.05					
Air filter				PP Honeycomb fabric (long life type)					
Refrigerant pipe diameter	Gas (Flare)		mm (in.)	ø12.7 (ø1/2)					
	Liquid (Flare)		mm (in.)	ø6.35 (ø1/4)					
Field drain pipe diameter			mm (in.)	O.D. 32 (1-1/4) (PVC pipe VP-25 connectable)					
Sound pressure level (Lo-Mid-Hi)		*2	dB (A)	26-28-30	26-29-31	26-30-33	26-30-34	28-33-39	33-39-43

Notes:

*1 Cooling/Heating capacity indicates the maximum value at operation under the following condition.
Cooling : Indoor 27°C(81°F)DB/19°C(66°F)WB,Outdoor 35°C(95°F)DB
Heating : Indoor 20°C(68°F)DB, Outdoor 7°C(45°F)DB/6°C(43°F)WB

*2 It is measured in anechoic room at power source 230V.

PLFY-P VMMD-E NEW





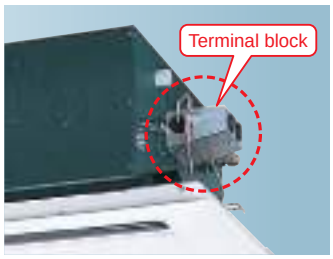
Slimline body

The height of the main unit is merely 290mm (11-7/16 in.) for the P20-P100 models.

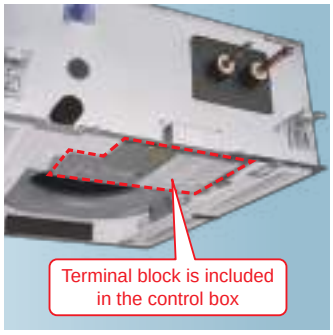
Built-in control box

The terminal block, which was previously mounted on the outside of the unit, is now built into the control box. This structural change has improved connectivity and wiring workability.

Conventional unit



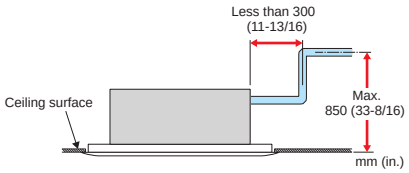
New unit



The control box is accessible from the bottom of the unit.

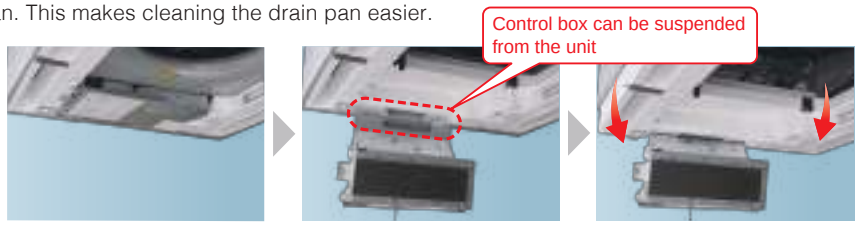
Extended lift of drain pump

The maximum lift of the drain pump has been extended to 850mm (33-8/16 in.) from the ceiling surface, allowing for greater flexibility in piping layout.



Easy detachment of drain pan

New attachments for control box reduce the workload of attaching and detaching the drain pan. This makes cleaning the drain pan easier.



Reduced power consumption and weight

New structures and components improve energy efficiency and installability. The drain pan has been modified to provide smoother airflow, and the fan motor has been changed from AC to DC. These improvements have reduced power consumption of the new model by up to 78% compared to the conventional models (P20). Additionally, the net weight of the new models is lighter than the conventional models, making installation easier.

Versatile airflow settings and vane control deliver comfort throughout the room

Four levels of airflow setting available

The conventional models (P20-P100) had three levels of airflow setting, but the new models offer four levels to accommodate various installation conditions.

Airflow rate setting

	P20-P100	P125
Conventional models (VLMD)	Low-Mid-High	Low-Mid2-Mid1-High
New models (VMMD)	**Low-Mid2-Mid1-High**	Low-Mid2-Mid1-High

Silver-Ionized Antibacterial Agent for Drain Pan

PAC-KE02AB-E (Optional parts)

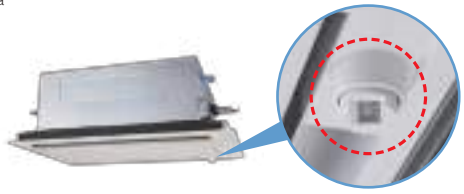
The optional Antibacterial Agent can be installed on drain pan to suppress bacterial growth*, reducing the occurrence of slime. It can reduce the maintenance frequency of drain pan.



* According to tests performed by the Boken Quality Evaluation Institute.
Testing procedure: Antibacterial test of drain water based on the SIAA shake method.
Test number: 11233843-1 Test result: Effective against bacteria (Antibacterial Activity Value 4.3)

New "3D i-see Sensor" panel

The "3D i-see Sensor" built into the optional corner panel reduces uneven temperature distribution and electricity consumption.



Specifications

Model				PLFY-P20VMMD-E	PLFY-P25VMMD-E	PLFY-P32VMMD-E	PLFY-P40VMMD-E
Power source				1-phase 220-230-240V 50/60Hz			
Cooling capacity (Nominal)		*1	kW	2.2	2.8	3.6	4.5
		*1	BTU/h	7,500	9,600	12,300	13,400
	Power input		kW	0.016	0.023	0.024	0.031
	Current input		A	0.21 - 0.20 - 0.18	0.29 - 0.27 - 0.24	0.30 - 0.28 - 0.27	0.37 - 0.35 - 0.34
Heating capacity (Nominal)		*2	kW	2.5	3.2	4.0	5.0
		*2	BTU/h	8,500	10,900	13,600	17,100
	Power input		kW	0.013	0.020	0.021	0.029
	Current input		A	0.17 - 0.16 - 0.15	0.25 - 0.23 - 0.20	0.26 - 0.24 - 0.23	0.33 - 0.31 - 0.30
External finish				Galvanized steel plate			
External dimension H x W x D			mm	290 x 770 x 650			
			in.	11-7/16 x 30-3/8 x 25-5/8			
Net weight			kg (lbs.)	20 (45)		21 (47)	
Decoration panel	Model			CMP-40LWH-E			
	External finish			MUNSELL (1.0Y 9.2/0.2)			
	Dimension H x W x D		mm	20 x 1,080 x 710			
			in.	13/16 x 42-9/16 x 28			
	Net weight		kg (lbs)	7 (16)			
Heat exchanger				Cross fin (Aluminum fin and copper tube)			
FAN	Type x Quantity			Turbo fan x 1			
	External static pressure		Pa	0			
			mmH_2O	0.0			
	Motor Type			DC motor			
	Motor output		kW	0.050			
	Airflow rate			(Low-Mid2-Mid1-High)			
			m^3/min	4.8 - 6.5 - 7.8 - 8.6	4.8 - 6.7 - 8.6 - 10.0	4.9 - 7.4 - 8.3 - 10.0	7.4 - 8.9 - 10.0 - 11.0
			L/s	80 - 108 - 130 - 143	80 - 112 - 143 - 167	82 - 123 - 138 - 167	123 - 148 - 167 - 183
			cfm	169 - 230 - 275 - 304	169 - 237 - 304 - 353	173 - 261 - 293 - 353	261 - 314 - 353 - 388
Sound pressure level (measured in anechoic room)				(Low-Mid2-Mid1-High)			
			dB (A)	21.5 - 25.0 - 28.0 - 30.0	21.5 - 25.5 - 30.0 - 35.0	23.5 - 28.5 - 31.5 - 36.0	28.5 - 33.0 - 36.0 - 39.5
Air filter				PP honeycomb fabric (long life filter).			
Connectable outdoor unit			*3	R410A CITY MULTI			
Refrigerant piping diameter	Liquid (R410A)		mm (in.)	6.35 (1/4) Brazed			
	Gas (R410A)		mm (in.)	12.7 (1/2) Brazed			
Field drain pipe size			mm (in.)	O.D.32 (1-1/4)			

Model				PLFY-P50VMMD-E	PLFY-P63VMMD-E	PLFY-P80VMMD-E	PLFY-P100VMMD-E	PLFY-P125VMMD-E
Power source				1-phase 220-230-240V 50/60Hz				
Cooling capacity (Nominal)		*1	kW	5.6	7.1	9.0	11.2	14.0
		*1	BTU/h	19,100	24,200	30,700	38,200	47,800
	Power input		kW	0.032	0.056	0.064	0.096	0.196
	Current input		A	0.32 - 0.31 - 0.29	0.49 - 0.48 - 0.47	0.52 - 0.50 - 0.49	0.73 - 0.70 - 0.69	1.37 - 1.33 - 1.28
Heating capacity (Nominal)		*2	kW	6.3	8.0	10.0	12.5	16.0
		*2	BTU/h	21,500	27,300	34,100	42,700	54,600
	Power input		kW	0.029	0.053	0.061	0.093	0.195
	Current input		A	0.28 - 0.27 - 0.26	0.45 - 0.44 - 0.43	0.48 - 0.46 - 0.45	0.69 - 0.67 - 0.65	1.33 - 1.28 - 1.24
External finish				Galvanized steel plate				
External dimension H x W x D			mm	290 x 940 x 650		290 x 1,440 x 650		331 x 1,440 x 650
			in.	11-7/16 x 37-1/16 x 25-5/8		11-7/16 x 56-3/4 x 25-5/8		13-1/16 x 56-3/4 x 25-5/8
Net weight			kg (lbs.)	24 (53)	26 (58)	39 (86)	42 (93)	47 (104)
Decoration panel	Model			CMP-63LWH-E		CMP-125LWH-E		
	External finish			MUNSELL (1.0Y 9.2/0.2)		MUNSELL (1.0Y 9.2/0.2)		
	Dimension H x W x D		mm	20 x 1,250 x 710		20 x 1,750 x 710		
			in.	13/16 x 49-1/4 x 28		13/16 x 68-15/16 x 28		
	Net weight		kg (lbs)	8 (18)		11.5 (27)		
Heat exchanger				Cross fin (Aluminum fin and copper tube)				
FAN	Type x Quantity			Turbo fan x 1		Turbo fan x 2		
	External static pressure		Pa	0				
			mmH_2O	0.0				
	Motor Type			DC motor				
	Motor output		kW	0.050		0.050 x 2		0.120 x 2
	Airflow rate			(Low-Mid2-Mid1-High)				
			m^3/min	9.0 - 10.0 - 11.5 - 13.0	9.0 - 11.0 - 13.0 - 15.5	14.7 - 17.5 - 20.4 - 22.2	16.0 - 19.0 - 21.0 - 24.5	22.8 - 25.3 - 28.2 - 31.5
			L/s	150 - 167 - 192 - 217	150 - 183 - 217 - 258	245 - 292 - 340 - 370	267 - 317 - 350 - 408	380 - 422 - 470 - 525
			cfm	318 - 353 - 406 - 459	318 - 388 - 459 - 547	519 - 618 - 720 - 784	565 - 671 - 742 - 865	805 - 893 - 996 - 1,112
Sound pressure level (measured in anechoic room)				(Low-Mid2-Mid1-High)				
			dB (A)	31.0 - 33.5 - 37.0 - 39.5	31.0 - 35.5 - 40.0 - 44.5	32.0 - 36.5 - 40.5 - 43.0	36.0 - 39.5 - 43.0 - 46.5	45.5 - 48.5 - 51.5 - 55.0
Air filter				PP honeycomb fabric (long life filter).				
Connectable outdoor unit			*3	R410A CITY MULTI				
Refrigerant piping diameter	Liquid (R410A)		mm (in.)	6.35 (1/4) Brazed	9.52 (3/8) Brazed			
	Gas (R410A)		mm (in.)	12.7 (1/2) Brazed	15.88 (5/8) Brazed			
Field drain pipe size			mm (in.)	O.D.32 (1-1/4)				

Notes:

*1. Nominal cooling conditions
Indoor: 27°CD.B./19°CW.B. (81°FD.B./66°FW.B.), Outdoor: 35°CD.B. (95°FD.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

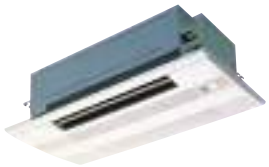
*2. Nominal heating conditions
Indoor: 20°CD.B. (68°FD.B.), Outdoor: 7°CD.B./6°CW.B. (45°FD.B./43°FW.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

*3. To prevent noise issue, PLFY-P80/100/125VMMD model cannot be connected with PUMY-P/SP/CP series.

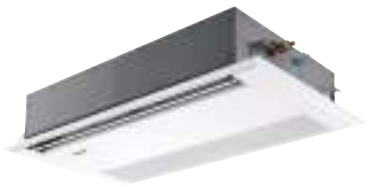
Optional Parts

Description	Model	Aplicable capacity
Decoration panel	CMP-40LWH-E	P20, P25, P32, P40
	CMP-63LWH-E	P50, P63
	CMP-125LWH-E	P80, P100, P125
3D i-see Sensor panel	CMP-40LWE-E	P20, P25, P32, P40
	CMP-63LWE-E	P50, P63
	CMP-125LWE-E	P80, P100, P125
OA duct flange	PAC-KG11OF	P20, P25, P32, P40, P50, P63, P80, P100, P125
Silver-Ionized Antibacterial Agent for Drain Pan	PAC-KE02AB-E	P20, P25, P32, P40, P50, P63, P80, P100, P125

PMFY-P VBM-E
PMFY-P VFM-PA



PMFY-P VBM-E (P20-P40)



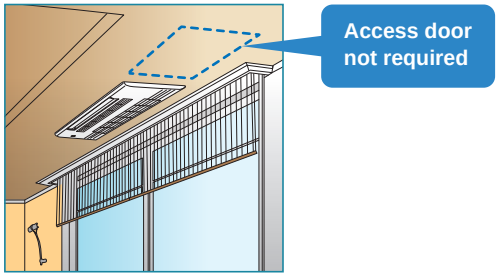
PMFY-P VFM-PA (P50-P80)





Ceiling Mounted

Installing a the 1-way airflow type unit in a room creates a more spacious feel that enhances room comfort. This overhead format is also an excellent solution when lighting equipment is installed at the center of the room and fixtures such as book shelves are mounted on wall surfaces.



Expanded line-up

Newly introducing bigger capacity P50-P80 models to suit larger room sizes.

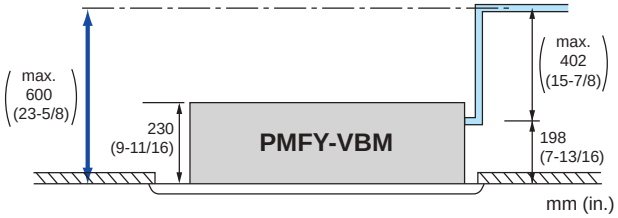
Capacity	P20	P25	P32	P40	P50	P63	P71	P80
Model	PMFY-P VBM				PMFY-P VFM			

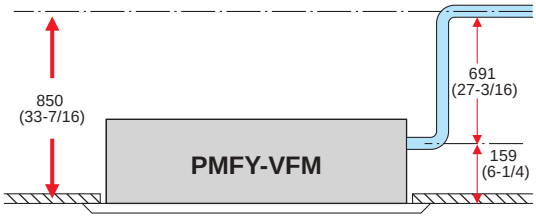
Compact size for smooth installation and maintenance(PMFY-P VBM-E)

Unit body size has been standardized for all models at 812 mm for easier installation. Body weight is only 14 kg for the main unit and 3 kg for the panel, making this unit one of the lightest in the industry.

Drain pump is equipped as stanadard feature

The drain can be positioned anywhere up to 600 mm (23-5/8 in.) for P20-40VBM models and 850 mm (33-7/16 in.) for P50-80VFM models from the ceiling's surface.



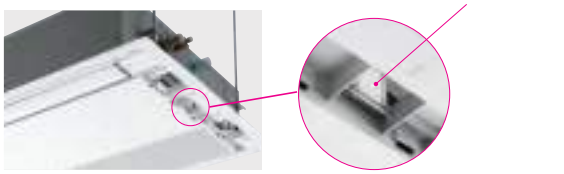


mm (in.)

Easy installation (PMFY-P VFM-PA)

Temporary hanging hook

The panel is equipped with a temporary hanging hook. This structure makes work efficiency easier during panel installation.



Easy access to suspension bolt

The structure of the panel makes access to suspension bolt easier for height adjustment during installation and maintenance.



Optional Parts

Description	Model	Applicable capacity
Decoration panel	PMP-40BMW	P20, P25, P32, P40
	PMP-63FMW	P50, P63, P71, P80
Anti-allergy enzyme filter	PAC-SK47KF-E	P50, P63, P71, P80
Left/right airflow direction louver	PAC-SJ15LR-E	P50, P63, P71, P80
External LEV box	PAC-SG95LE-E	P50, P63

Specifications

Model				PMFY-P20VBM-E	PMFY-P25VBM-E	PMFY-P32VBM-E	PMFY-P40VBM-E
Power source				1-phase 220-240V 50Hz/1-phase 220V 60Hz			
Cooling capacity		*1	kW	2.2	2.8	3.6	4.5
		*1	BTU/h	7,500	9,600	12,300	15,400
Heating capacity		*1	kW	2.5	3.2	4.0	5.0
		*1	BTU/h	8,500	10,900	13,600	17,100
Power consumption	Cooling		kW	0.042	0.044		0.054
	Heating		kW	0.042	0.044		0.054
Current	Cooling		A	0.20	0.21		0.26
	Heating		A	0.20	0.21		0.26
External finish (Munsell No.)				White (6.4Y 8.9/0.4)			
Dimension H x W x D	Unit		mm (in.)	230 x 812 x 395 (9-1/16 x 32 x 15-9/16)			
	Panel		mm (in.)	30 x 1000 x 470 (1-3/16 x 39-3/8 x 18-9/16)			
Net weight	Unit		kg (lbs.)	14 (31)			
	Panel		kg (lbs.)	3 (7)			
Heat exchanger				Cross fin (Aluminum plate fin and copper tube)			
Fan	Type x Quantity			Line flow fan x 1			
	Airflow rate (Lo-Mid2-Mid1-Hi)	*2	m^3/min	6.5-7.2-8.0-8.7	7.3-8.0-8.6-9.3		7.7-8.7-9.7-10.7
			L/s	108-120-133-145	122-133-143-155		128-145-162-178
			cfm	230-254-283-307	258-283-304-328		272-307-343-378
	External static pressure		Pa	0			
Motor	Type			1-phase induction motor			
	Output		kW	0.028			
Air filter				PP Honeycomb fabric			
Refrigerant pipe diameter	Gas (Flare)		mm (in.)	ø12.7 (ø1/2)			
	Liquid (Flare)		mm (in.)	ø6.35 (ø1/4)			
Field drain pipe diameter			mm (in.)	O.D. 26 (1)			
Sound pressure level (Lo-Mid2-Mid1-Hi)		*2 *3	dB (A)	27-30-33-35	32-34-36-37		33-35-37-39

Model				PMFY-P50VFM-PA	PMFY-P63VFM-PA	PMFY-P71VFM-PA	PMFY-P80VFM-PA
Power source				1-phase 220-240V 50Hz/1-phase 220-230V 60Hz			
Cooling capacity		*1	kW	5.6	7.1	8.0	9.0
		*1	BTU/h	19,100	24,200	27,300	30,700
Heating capacity		*1	kW	6.3	8.0	9.0	10.0
		*1	BTU/h	21,500	27,300	30,700	34,100
Power consumption	Cooling		kW	0.060	0.075	0.090	0.13
	Heating		kW	0.045	0.060	0.075	0.12
Current	Cooling		A	0.47	0.63	0.74	1.01
	Heating		A	0.42	0.55	0.62	0.96
External finish (Munsell No.)				White (6.4Y 8.9/0.4)			
Dimension H x W x D	Unit		mm (in.)	225 x 1112 x 724 (8-7/8 x 43-3/4 x 24-1/2)			
	Panel		mm (in.)	20 x 1340 x 800 (13/16 x 52-3/4 x 31-1/2)			
Net weight	Unit		kg (lbs.)	26 (57)	28 (62)		29 (64)
	Panel		kg (lbs.)	6.5 (14)			
Heat exchanger				Cross fin (Aluminum plate fin and copper tube)			
Fan	Type x Quantity			Sirocco fan x 2	Sirocco fan x 3		
	Airflow rate (Lo-Mid2-Mid1-Hi)	*2	m^3/min	11-12-14-16	14-16-17-19	14-16-18-20	12-16-20-24
			L/s	183-200-233-267	233-267-283-317	233-267-300-333	200-270-330-400
			cfm	388-424-494-565	494-565-600-671	494-565-636-706	420-570-710-850
	External static pressure		Pa	0			
Motor	Type			DC motor			
	Output		kW	0.09	0.095		
Air filter				PP honeycomb fabric			
Refrigerant pipe diameter	Gas (Flare)		mm (in.)	ø12.7 (ø1/2)	ø15.88 (ø5/8)		
	Liquid (Flare)		mm (in.)	ø6.35 (ø1/4)	ø9.52 (ø3/8)		
Field drain pipe diameter			mm (in.)	O.D.32 (1-1/4)			
Sound pressure level (Lo-Mid2-Mid1-Hi)		*2 *3	dB (A)	29-32-35-38	32-35-37-39	32-35-38-41	36-41-46-50

Notes:

*1 Cooling/Heating capacity indicates the maximum value at operation under the following condition.
Cooling : Indoor 27°C(81°F)DB/19°C(66°F)WB, Outdoor 35°C(95°F)DB
Heating : Indoor 20°C(68°F)DB, Outdoor 7°C(45°F)DB/6°C(43°F)WB
*2 Airflow rate/Sound pressure level are in (low-middle2-middle1-high).
*3 It is measured in anechoic room.

Ceiling Concealed







Ceiling Concealed Type

Low static pressure type

PEFY-P VMS1(L)-E



- The thin design with a body height of only 200 mm [7-7/8 in.] (all horsepower models) enables installation in a narrow space in the ceiling
- Low-noise operation
- Compact body with an external static pressure of up to 50 Pa

Static pressure up to 50 Pa	Low noise	Height 200 mm	Drain pump (standard) up to 550 mm [21-11/16 in.]	Air flow rate 3 stages

VMS1 model only

Medium static pressure type

PEFY-P VMA(L)-E4
PEFY-P VMA3/4-E



- Thin design of a body height of 250 mm [9-7/8 in.] (all horsepower models)
- The rear or bottom air inlet can be selected
- The drain pump is optionally selectable

Static pressure up to 150 Pa	Height 250 mm	Rear or bottom inlet	Drain pump (standard) up to 700 mm [27-9/16 in.]	Air flow rate 3 stages

* The maximum value varies depending on the model.

VMA model only

High static pressure type

PEFY-P VMH(S)-E



- External static pressure of up to 250 Pa*1, ensuring flexible duct design
- Applicable to drain pumps (option) from 550 mm [21-11/16 in.] to up to 700 mm [27-9/16 in.]

Static pressure up to 250 Pa	Drain pump option up to 700 mm [27-9/16 in.]	Air flow rate 3 stages*2

*1 The maximum value varies depending on the model.
*2 Except VMH Models.

Fresh air intake type

PEFY-P VMHS-E-F



- Controllable outlet air temperature
- Fresh air intake type indoor unit
- Usable with external static pressures of up to 250 Pa, and available with three different types of air flow

Controllable outlet air temperature	Static pressure up to 250 Pa	Drain pump option up to 700 mm [27-9/16 in.]	Fresh air intake type	Air flow rate 3 stage

Fresh air intake type

PEFY-P VMH-E-F



- Fresh air intake type indoor unit
- External static pressure of up to 240 Pa* expands duct design possibilities

* P140 model 240 V

Static pressure up to 240 Pa	Drain pump option up to 550 mm [21-11/16 in.]	Fresh air intake type	Air flow rate 1 stage

* The maximum value varies depending on the model.

Low noise type

PEFY-P VMR-E-L/R



- Low noise operation. Suitable for spaces where low noise is required such as hotels
- The rear or bottom air inlet can be selected
- The piping connection position can be selected according to the room layout

Static pressure 5 Pa	Low noise	Rear or bottom inlet	Right/Left Piping connection	Air flow rate 3 stages

PEFY-P VMS1(L)-E





Compact design with a height of only 200 mm [7-7/8 in.] (all models) and a width of 790 mm [31-1/8 in.] (P15 to P32), 990 mm [39 in.] (P40 and P50), or 1190 mm [46-7/8 in.] (P63)

Thin body design with a height of only 200 mm [7-7/8 in.] (all models) enables installation in a narrow space in the ceiling.

PEFY-P VMS1(L)-E		P15	P20	P25	P32	P40	P50	P63
Height	mm [in.]	200 [7-7/8]						
Width	mm [in.]	790 [31-1/8]				990 [39]		1190 [46-7/8]



Low-noise design

The centrifugal fan and coil are designed to reduce noise, making these models suitable for spaces where quietness is required.

Sound pressure level table (Standard static pressure) at 15 Pa dB(A)

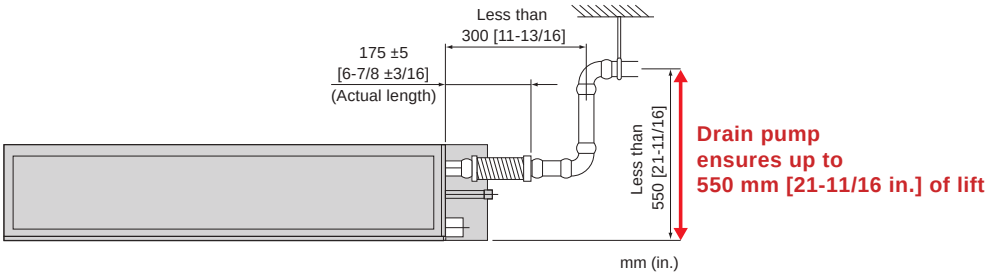
Sound Pressure Level	Capacity		P15	P20	P25	P32	P40	P50	P63
	Fan Speed	High	28	29	30	32	33	35	36
		Mid	24	25	26	27	30	32	33
		Low	22	23	24	24	28	30	30

Selectable external static pressure

The unit may have a compact body, but its external static pressure can be up to 50 Pa.
The external static pressure can be selected from 5, 15, 35 and 50 Pa.
(The factory default is 15 Pa.)

Models with and without drain pump are available

PEFY-P VMS1 is provided with a drain pump as standard and does not require a drain trap. PEFY-P VMS1L which is model without drain pump is recommended for places where low-noise operation is required (i.e. hotels)



Connectable to Plasma Quad Connect

The optional Plasma Quad Connect MAC-100FT-E can be installed on the indoor unit's air inlet side. For installation, PQ attachment is required.

Optional Parts

Description	Model	Applicable capacity
Drain pump*1	PAC-KE07DM-E	P15, 20, 25, 32, 40, 50, 63
Control box replace kit	PAC-KE70HS-E	P15, 20, 25, 32, 40, 50, 63
Plasma quad connect*2	MAC-100FT-E	P15, 20, 25, 32, 40, 50, 63
PQ attachment*2	PAC-HA11PAR	P15, 20, 25, 32, 40, 50, 63

*1 For PEFY-VMS1L only
*2 Plasma quad connect (MAC-100FT-E) should be used together with PQ attachment.

Specifications

Model				PEFY-P15VMS1(L)-E	PEFY-P20VMS1(L)-E	PEFY-P25VMS1(L)-E	PEFY-P32VMS1(L)-E	PEFY-P40VMS1(L)-E	PEFY-P50VMS1(L)-E	PEFY-P63VMS1(L)-E
Power source				1-phase 220-240V 50Hz/1-phase 220-240V 60Hz						
Cooling capacity	*1		kW	1.7	2.2	2.8	3.6	4.5	5.6	7.1
	*1		BTU/h	5,800	7,500	9,600	12,300	15,400	19,100	24,200
Heating capacity	*1		kW	1.9	2.5	3.2	4.0	5.0	6.3	8.0
	*1		BTU/h	6,500	8,500	10,900	13,600	17,100	21,500	27,300
Power consumption	*3	Cooling	kW	0.05 [0.03]	0.05 [0.03]	0.06 [0.04]	0.07 [0.05]	0.07 [0.05]	0.09 [0.07]	0.09 [0.07]
		Heating	kW	0.03 [0.03]	0.03 [0.03]	0.04 [0.04]	0.05 [0.05]	0.05 [0.05]	0.07 [0.07]	0.07 [0.07]
Current	*3	Cooling	A	0.42 [0.31]	0.47 [0.36]	0.50 [0.39]	0.50 [0.39]	0.56 [0.45]	0.67 [0.56]	0.72 [0.61]
		Heating	A	0.31 [0.31]	0.36 [0.36]	0.39 [0.39]	0.39 [0.39]	0.45 [0.45]	0.56 [0.56]	0.61 [0.61]
External finish				Galvanized						
Dimension H x W x D			mm	200 x 790 x 700				200 x 990 x 700		200 x 1,190 x 700
			in.	7-7/8 x 31-1/8 x 27-9/16				7-7/8 x 39 x 27-9/16		7-7/8 x 46-7/8 x 27-9/16
Net weight	*3		kg (lbs.)	19 (42) [18 (40)]			20 (45) [19 (42)]	24 (53) [23 (51)]		28 (62) [27 (60)]
Heat exchanger				Cross fin (Aluminium fin and copper tube)						
Fan	Type x Quantity			Sirocco fan x 2				Sirocco fan x 3		Sirocco fan x 4
	Airflow rate (Lo-Mid-Hi)		m^3/min	5-6-7	5.5-6.5-8	5.5-7-9	6-8-10	8-9.5-11	9.5-11-13	12-14-16.5
			L/s	83-100-117	91-108-133	91-117-150	100-133-167	133-158-183	158-183-217	200-233-275
			cfm	176-212-247	194-229-282	194-247-317	212-282-353	282-335-388	335-388-459	424-494-583
	External static pressure		Pa	5-15-35-50						
Motor	Type			DC motor						
	Output		kW	0.096						
Air filter				PP Honeycomb fabric (washable)						
Refrigerant pipe diameter		Gas	mm (in.)	ø12.7 (ø1/2) Brazed						ø15.88 (ø5/8) Brazed
		Liquid	mm (in.)	ø6.35 (ø1/4) Brazed						ø9.52 (ø3/8) Brazed
Field drain pipe diameter			mm (in.)	O.D. 32 (1-1/4)						
Sound pressure level (Lo-Mid-Hi) (measured in anechoic room)			dB (A)	22-24-28	23-25-29	24-26-30	24-27-32	28-30-33	30-32-35	30-33-36

Notes:

*1 Cooling/Heating capacity indicates the maximum value at operation under the following condition.
Cooling : Indoor : 27°CD.B./19°CW.B.(81°FD.B./66°FW.B.) Outdoor : 35°CD.B.(95°FD.B.)
Heating : Indoor : 20°CD.B.(68°FD.B.) Outdoor : 7°CD.B./6°CW.B.(45°FD.B./43°FW.B.)
Pipe length : 7.5m(24-9/16ft) Height difference : 0m(0ft)
*2 The external static pressure is set to 15 Pa at factory shipment.
*3 [ ] is in case of PEFY-P15-63VMS1L-E

PEFY-P VMA(L)-E4
PEFY-P VMA3/4-E



PEFY-P VMA(L)-E4

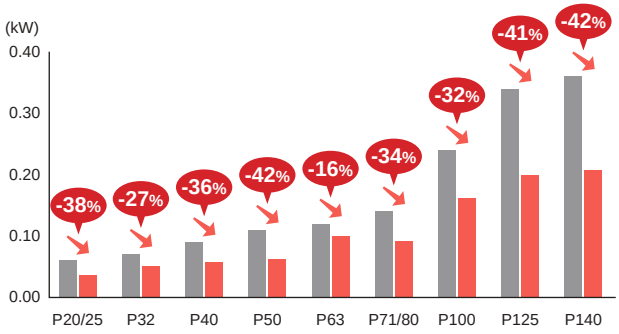


Office School Residence Hotel

Less power consumption

The shape of fan wing and casing is improved to provide more smooth airflow. Besides, the drain pump motor is changed from AC motor to high-efficient DC motor. Operation efficiency is increased by the air flow and motor, which realizes up to 42% reduction in energy consumption (P50/140).

Comparison of energy consumption in cooling operation



* The values are measured at high fan speed setting and external static pressure of 50 Pa.

External static pressure is settable up to 150 Pa (VMA(L)-E4/VMA4-E)

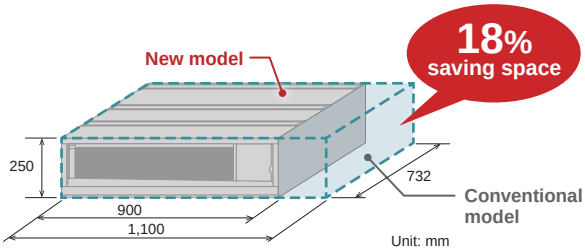
Five-stage external static pressure settings provide flexibility for duct extension, branching, and air outlet configuration and are adjustable to meet different application conditions. Setting ranges to maximum of 150 Pa.

External static pressure settings

Series	20	25	32	40	50	63	71	80	100	125	140
PEFY-P VMA(L)-E4	35/50/70/100/150 Pa						40/50/70/100/150 Pa				

Compact unit requires less installation space (applicable to the PEFY-P63VMA-E4 model only)

The use of new fan with improved air pathway helps to reduce the size of the P63 model unit. The P63 model unit is 200 mm less in width and fits into tighter ceiling space.

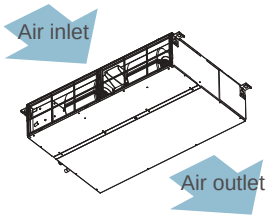


Air inlet direction can be easily changed

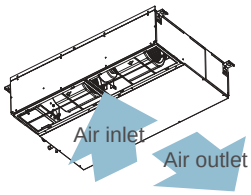
By simply switching the closing board and air filter, the inlet layout can be changed from the rear inlet to the bottom inlet. (At factory shipment: Rear inlet)

Two air inlet options can be chosen, rear or bottom:

1. Rear inlet



2. Bottom inlet



* Unit with a bottom inlet make more noise than those with a rear inlet. It is recommended that the rear inlet be selected when installing the units in rooms that should be quiet, such as bedrooms.

Drain pump is optionally selectable

The lineup consists of two types: models with or without a built-in drain pump, thus allowing more freedom in piping layout design.

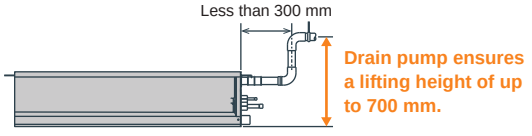


PEFY-P VMA-E4 Built-in drain pump



PEFY-P VMAL-E4 No drain pump

Built-in drain pump	PEFY-P VMA-E4, PEFY-P-VMA3/4-E
No drain pump	PEFY-P VMAL-E4



Large air volume model is available (VMA3/VMA4)

The VMA3/4 lineup offers a selection of models with a larger air volume.

High power fan speed mode [VMA(L)-E4/VMA4-E]

This start-up mode is run with the increased fan speed for a maximum of 15 minutes to rapidly cool or heat the space (after the first Thermo-ON operation).

*1. Power consumption and sound pressure level will increase in this mode.
*2. High power fan speed mode is not available when the external static pressure is set to 150 Pa.
*3. PAR-41MAA, PAR-U02MEDA, PAR-CT01MAA-S or PAC-YT52CRA is required for this setting. See the instructions and installation manuals for details.

● **PAR-41MAAM**



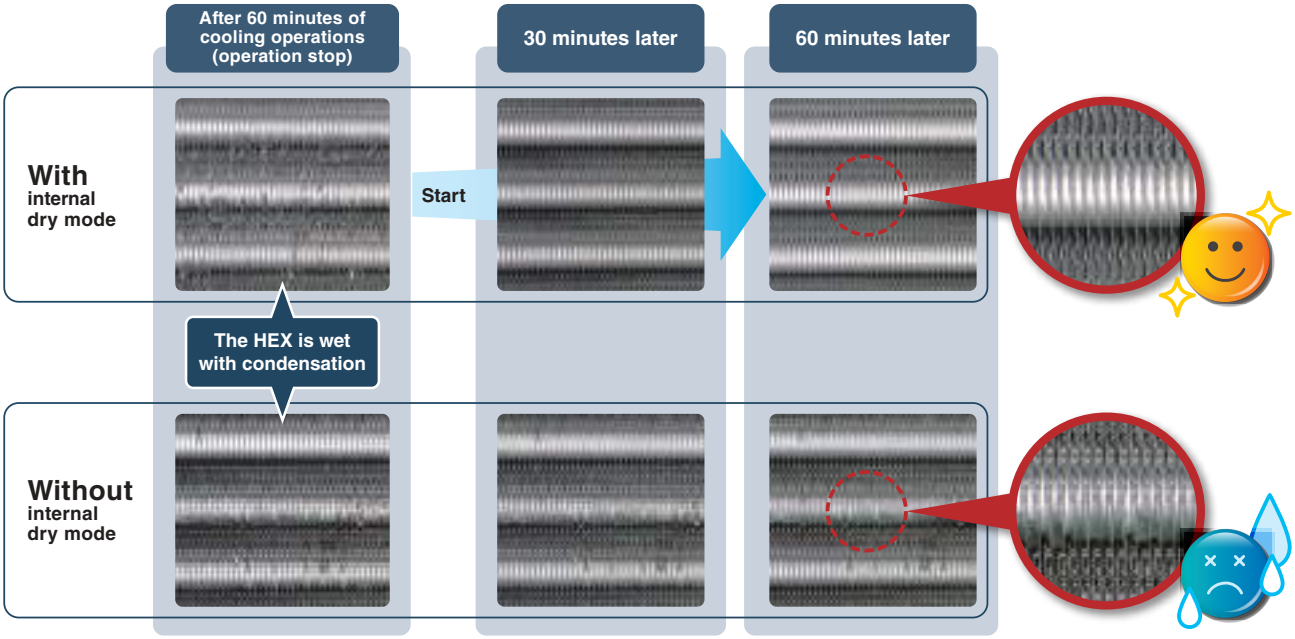
*High power fan speed mode can be displayed only with PAR-41MAA and PAR-CT01MAA-S.

Internal dry mode [VMA(L)-E4/VMA4-E]

To dry the heat exchanger (HEX), the unit will operate in the fan mode at high speed after cooling or drying operation has stopped. The drying time is selectable from 30 or 60 minutes.

*1. PAR-41MAA, PAR-U02MEDA, PAR-CT01MAA-S or PAC-YT52CRA is required for this setting. See the instructions and installation manuals for details.
*2. Air blowing noise is heard during the internal dry operation.
*3. To cancel the internal dry operation, start and stop the unit operation within 3 minutes.
*4. When using AE-C400E-X's apportioned electricity billing function to apportion electricity consumption of indoor units, do not use the internal dry operation function of indoor units.

■Operating Sample



* Under norminal cooling conditions (Indoor) (27˚CD.B./19˚CW.B.)
* Results will vary depending on indoor temperature and humidity conditions.

Connectable to Plasma Quad Connect [PEFY-P VMA(L)-E4]

The optional Plasma Quad Connect MAC-100FT-E can be installed on the indoor unit's air inlet side. For installation, PQ attachment or PQ box is required.

Optional Parts

Description	Model	Applicable capacity		
		VMA (L)	VMA4	VMA3
Filter box	PAC-KE91TB-E	P20, P25, P32	–	–
	PAC-KE92TB-E	P40, P50, P63	P20	P20
	PAC-KE93TB-E	P71, P80	P25, P32, P40	–
	PAC-KE94TB-E	P100, P125	–	–
	PAC-KE95TB-E	P140	P50, P63, P71	–
Plasma Quad Connect*	MAC-100FT-E	P20, P25, P32, P40, P50, P63, P71, P80, P100, P125	–	–
PQ attachment (Rear inlet)*	PAC-HA31PAR	P20, P25, P32, P40, P50, P63, P71, P80, P100, P125	–	–
PQ attachment (Bottom inlet)*	PAC-HA31PAU	P20, P25, P32, P40, P50, P63, P71, P80, P100, P125	–	–
PQ box*	PAC-KE91PTB-E	P20, P25, P32	–	–
	PAC-KE92PTB-E	P40, P50, P63	–	–
	PAC-KE93PTB-E	P71, P80	–	–
	PAC-KE94PTB-E	P100, P125	–	–
	PAC-KE95PTB-E	P140	–	–

*Plasma Quad Connect (MAC-100FT-E) should be used together with PQ attachment or PQ box.

Specifications

* [ ] is in case of PEFY-P VMAL-E4.

Model			PEFY-P20VMA(L)-E4	PEFY-P25VMA(L)-E4	PEFY-P32VMA(L)-E4	PEFY-P40VMA(L)-E4	PEFY-P50VMA(L)-E4	PEFY-P63VMA(L)-E4
Power source			1-phase 220-230-240 V 50/60 Hz					
Cooling capacity *1		kW	2.2	2.8	3.6	4.5	5.6	7.1
(Nominal) *1		BTU/h	7,500	9,600	12,300	15,400	19,100	24,200
	Power input *2	kW	0.032 [0.030]	0.032 [0.030]	0.044 [0.042]	0.047 [0.045]	0.066 [0.064]	0.087 [0.085]
	Current input *2 (220-230-240 V)	A	0.26 - 0.25 - 0.24	0.26 - 0.25 - 0.24	0.36 - 0.34 - 0.33	0.39 - 0.37 - 0.36	0.53 - 0.51 - 0.49	0.69 - 0.66 - 0.63
Heating capacity *3		kW	2.5	3.2	4.0	5.0	6.3	8.0
(Nominal) *3		BTU/h	8,500	10,900	13,600	17,100	21,500	27,300
	Power input *2	kW	0.030	0.030	0.042	0.045	0.064	0.085
	Current input *2 (220-230-240 V)	A	0.26 - 0.25 - 0.24	0.26 - 0.25 - 0.24	0.36 - 0.34 - 0.33	0.39 - 0.37 - 0.36	0.53 - 0.51 - 0.49	0.69 - 0.66 - 0.63
External finish			Galvanized steel plate					
External dimension		mm	250 x 700 x 732	250 x 700 x 732	250 x 700 x 732	250 x 900 x 732	250 x 900 x 732	250 x 900 x 732
H x W x D		in.	9-7/8 x 27-9/16 x 28-7/8	9-7/8 x 27-9/16 x 28-7/8	9-7/8 x 27-9/16 x 28-7/8	9-7/8 x 35-7/16 x 28-7/8	9-7/8 x 35-7/16 x 28-7/8	9-7/8 x 35-7/16 x 28-7/8
Net weight		kg (lbs)	21.5 (49) [21 (47)]	21.5 (49) [21 (47)]	21.5 (49) [21 (47)]	26 (58) [25.5 (58)]	26 (58) [25.5 (58)]	27 (60) [26.5 (60)]
Heat exchanger			Cross fin (Aluminum fin and copper tube)					
FAN	Type x Quantity		Sirocco fan x 1	Sirocco fan x 1	Sirocco fan x 1	Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 2
	External static press. *4	Pa	35 - <50> - <70> - <100> - <150>	35 - <50> - <70> - <100> - <150>	35 - <50> - <70> - <100> - <150>	35 - <50> - <70> - <100> - <150>	35 - <50> - <70> - <100> - <150>	35 - <50> - <70> - <100> - <150>
	Motor Type		DC motor					
	Motor output	kW	0.085	0.085	0.085	0.121	0.121	0.121
	Air flow rate (Lo-Mid-Hi)	m^3/min	6.0 - 7.5 - 8.5	6.0 - 7.5 - 8.5	7.5 - 9.0 - 10.5	10.0 - 12.0 - 14.0	12.0 - 14.5 - 17.0	13.5 - 16.0 - 19.0
		L/s	100 - 125 - 142	100 - 125 - 142	125 - 150 - 175	167 - 200 - 233	200 - 242 - 283	225 - 267 - 317
		cfm	212 - 265 - 300	212 - 265 - 300	265 - 318 - 371	353 - 424 - 494	424 - 512 - 600	477 - 565 - 671
Sound pressure level (measured in anechoic room) (Lo-Mid-Hi) *2 *5		dB <A>	22.0 - 26.0 - 28.0	22.0 - 26.0 - 28.0	24.0 - 28.0 - 31.0	24.0 - 29.0 - 32.0	25.0 - 32.0 - 35.0	28.0 - 32.0 - 36.0
Air filter			PP honeycomb fabric.					
Refrigerant piping diameter	Liquid (R410A)	mm (in.)	6.35 (1/4) Brazed	6.35 (1/4) Brazed	6.35 (1/4) Brazed	6.35 (1/4) Brazed	6.35 (1/4) Brazed	9.52 (3/8) Brazed
	Gas (R410A)	mm (in.)	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed
Field drain pipe size		mm (in.)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)

Model			PEFY-P71VMA(L)-E4	PEFY-P80VMA(L)-E4	PEFY-P100VMA(L)-E4	PEFY-P125VMA(L)-E4	PEFY-P140VMA(L)-E4
Power source			1-phase 220-230-240 V 50/60 Hz				
Cooling capacity *1		kW	8.0	9.0	11.2	14.0	16.0
(Nominal) *1		BTU/h	27,300	30,700	38,200	47,800	54,600
	Power input *2	kW	0.080 [0.078]	0.080 [0.078]	0.142 [0.140]	0.199 [0.197]	0.208 [0.206]
	Current input *2 (220-230-240 V)	A	0.60 - 0.57 - 0.55	0.60 - 0.57 - 0.55	1.01 - 0.97 - 0.93	1.29 - 1.23 - 1.18	1.40 - 1.34 - 1.28
Heating capacity *3		kW	9.0	10.0	12.5	16.0	18.0
(Nominal) *3		BTU/h	30,700	34,100	42,700	54,600	61,400
	Power input *2	kW	0.078	0.078	0.140	0.197	0.206
	Current input *2 (220-230-240 V)	A	0.60 - 0.57 - 0.55	0.60 - 0.57 - 0.55	1.01 - 0.97 - 0.93	1.29 - 1.23 - 1.18	1.40 - 1.34 - 1.28
External finish			Galvanized steel plate				
External dimension		mm	250 x 1,100 x 732	250 x 1,100 x 732	250 x 1,400 x 732	250 x 1,400 x 732	250 x 1,600 x 732
H x W x D		in.	9-7/8 x 43-5/16 x 28-7/8	9-7/8 x 43-5/16 x 28-7/8	9-7/8 x 55-1/8 x 28-7/8	9-7/8 x 55-1/8 x 28-7/8	9-7/8 x 63 x 28-7/8
Net weight		kg (lbs)	30 (67) [29.5 (67)]	30 (67) [29.5 (67)]	37.5 (84) [37 (82)]	38.5 (86) [38 (84)]	41.5 (93) [41 (91)]
Heat exchanger			Cross fin (Aluminum fin and copper tube)				
FAN	Type x Quantity		Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 3	Sirocco fan x 3	Sirocco fan x 3
	External static press. *4	Pa	40 - <50> - <70> - <100> - <150>	40 - <50> - <70> - <100> - <150>	40 - <50> - <70> - <100> - <150>	<40> - 50 - <70> - <100> - <150>	<40> - 50 - <70> - <100> - <150>
	Motor Type		DC motor				
	Motor output	kW	0.121	0.121	0.300	0.300	0.300
	Air flow rate (Lo-Mid-Hi)	m^3/min	14.5 - 18.0 - 21.0	14.5 - 18.0 - 21.0	23.0 - 28.0 - 32.0	28.0 - 34.0 - 37.0	29.5 - 35.5 - 40.0
		L/s	242 - 300 - 350	242 - 300 - 350	383 - 467 - 533	467 - 567 - 617	492 - 592 - 667
		cfm	512 - 636 - 742	512 - 636 - 742	812 - 989 - 1,130	989 - 1,201 - 1,306	1,042 - 1,254 - 1,412
Sound pressure level (measured in anechoic room) (Lo-Mid-Hi) *2 *5		dB <A>	26.0 - 32.0 - 35.0	26.0 - 32.0 - 35.0	31.0 - 36.0 - 39.0	35.0 - 39.0 - 41.0	34.0 - 38.0 - 41.0
Air filter			PP honeycomb fabric.				
Refrigerant piping diameter	Liquid (R410A)	mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed
	Gas (R410A)	mm (in.)	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed	15.88 (5/8) Brazed
Field drain pipe size		mm (in.)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)

Notes:

*1 Nominal cooling conditions
Indoor: 27°CDB/19°CWB (81°FDB/66°FWB), Outdoor: 35°CDB (95°FDB)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

*2 The values are measured at the factory setting of external static pressure.

*3 Nominal heating conditions
Indoor: 20°CDB (68°FDB), Outdoor: 7°CDB/6°CWB (45°FDB/43°FWB)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

*4 The factory setting of airflow mode and external static pressure mode is shown without < >.
Refer to "Fan characteristics curves", according to the external static pressure, in DATA BOOK for the usable range of air flow rate.

*5 Measured in anechoic room with a 1 m air inlet duct and 2 m air outlet duct attached to the unit and 1.5 m below the unit.

Specifications (Larger air volume)

Model				PEFY-P20VMA3/4-E	PEFY-P25VMA4-E	PEFY-P32VMA4-E
Power source				1-phase 220-230-240 V 50/60 Hz		
Cooling capacity		*1	kW	2.2	2.8	3.6
		*1	BTU/h	7,500	9,600	12,300
	*2 Power input		kW	0.087 [0.110] *6	0.080	0.080
	*2 Current input (220-230-240 V)		A	0.69-0.66-0.63 [0.90] *6	0.60-0.57-0.55	0.60-0.57-0.55
Heating capacity		*3	kW	2.5	3.2	4.0
		*3	BTU/h	8,500	10,900	13,600
	*2 Power input		kW	0.085 [0.090] *6	0.078	0.078
	*2 Current input (220-230-240 V)		A	0.69-0.66-0.63 [0.79] *6	0.60-0.57-0.55	0.60-0.57-0.55
External finish				Galvanized steel plate		
External dimension H x W x D			mm	250 x 900 x 732	250 x 1,100 x 732	250 x 1,100 x 732
			in.	9-7/8 x 35-7/16 x 28-7/8	9-7/8 x 43-5/16 x 28-7/8	9-7/8 x 43-5/16 x 28-7/8
Net weight			kg (lbs.)	27 (60)	30 (67)	30 (67)
Heat exchanger				Cross fin (Aluminum fin and copper tube)		
Fan	Type x Quantity			Sirocco fan x 2 [x 1] *6	Sirocco fan x 2	Sirocco fan x 2
	*4 External static press.		Pa	35-<50>-<70>-<100>-<150> [<35>-50-<70>-<100>-<125>] *6	40-<50>-<70>-<100>-<150>	40-<50>-<70>-<100>-<150>
			mmH_2O	3.6-<5.1>-<7.1>-<10.2>-<15.3> [<3.6>-5.1-<7.1>-<10.2>-<12.7>] *6	4.1-<5.1>-<7.1>-<10.2>-<15.3>	4.1-<5.1>-<7.1>-<10.2>-<15.3>
	Motor Type			DC motor		
	Motor output		kW	0.121 [0.085] *6	0.121	0.121
	Air flow rate			(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)
			m^3/min	13.5 - 16.0 - 19.0 [12.0 - 14.5 - 17.0] *6	14.5 - 18.0 - 21.0	14.5 - 18.0 - 21.0
			L/s	225 - 267 - 317 [200 - 242 - 283] *6	242 - 300 - 350	242 - 300 - 350
			cfm	477 - 565 - 671 [424 - 512 - 600] *6	512 - 636 - 742	512 - 636 - 742
Sound pressure level (measured in anechoic room)				(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)
		*2	dB <A>	28.0-32.0-36.0 [30.0-35.0-39.0] *6	26.0-32.0-35.0	26.0-32.0-35.0
Air filter				PP honeycomb fabric.		
Refrigerant piping diameter	Gas (R410A)		mm (in.)	12.7 (1/2)Brazed	12.7 (1/2)Brazed	12.7 (1/2)Brazed
	Liquid (R410A)		mm (in.)	6.35 (1/4)Brazed	6.35 (1/4)Brazed	6.35 (1/4)Brazed
Field drain pipe diameter			mm (in.)	O.D.32 (1-1/4")	O.D.32 (1-1/4")	O.D.32 (1-1/4")

Model				PEFY-P40VMA4-E	PEFY-P50VMA4-E	PEFY-P63VMA4-E	PEFY-P71VMA4-E
Power source				1-phase 220-230-240 V 50/60 Hz			
Cooling capacity		*1	kW	4.5	5.6	7.1	8.0
		*1	BTU/h	15,400	19,100	24,200	27,300
	*2 Power input		kW	0.080	0.208	0.208	0.208
	*2 Current input (220-230-240 V)		A	0.60-0.57-0.55	1.40-1.34-1.28	1.40-1.34-1.28	1.40-1.34-1.28
Heating capacity		*3	kW	5.0	6.3	8.0	9.0
		*3	BTU/h	17,100	21,500	27,300	30,700
	*2 Power input		kW	0.078	0.206	0.206	0.206
	*2 Current input (220-230-240 V)		A	0.60-0.57-0.55	1.40-1.34-1.28	1.40-1.34-1.28	1.40-1.34-1.28
External finish				Galvanized steel plate			
External dimension H x W x D			mm	250 x 1,100 x 732	250 x 1,600 x 732	250 x 1,600 x 732	250 x 1,600 x 732
			in.	9-7/8 x 43-5/16 x 28-7/8	9-7/8 x 63 x 28-7/8	9-7/8 x 63 x 28-7/8	9-7/8 x 63 x 28-7/8
Net weight			kg (lbs.)	30 (67)	41.5 (93)	41.5 (93)	41.5 (93)
Heat exchanger				Cross fin (Aluminum fin and copper tube)			
Fan	Type x Quantity			Sirocco fan x 2	Sirocco fan x 3	Sirocco fan x 3	Sirocco fan x 3
	*4 External static press.		Pa	40-<50>-<70>-<100>-<150>	<40>-50-<70>-<100>-<150>	<40>-50-<70>-<100>-<150>	<40>-50-<70>-<100>-<150>
			mmH_2O	4.1-<5.1>-<7.1>-<10.2>-<15.3>	<4.1>-5.1-<7.1>-<10.2>-<15.3>	<4.1>-5.1-<7.1>-<10.2>-<15.3>	<4.1>-5.1-<7.1>-<10.2>-<15.3>
	Motor Type			DC motor			
	Motor output		kW	0.121	0.300	0.300	0.300
	Air flow rate			(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)
			m^3/min	14.5 - 18.0 - 21.0	29.5 - 35.5 - 40.0	29.5 - 35.5 - 40.0	29.5 - 35.5 - 40.0
			L/s	242 - 300 - 350	492 - 592 - 667	492 - 592 - 667	492 - 592 - 667
			cfm	512 - 636 - 742	1,042 - 1,254 - 1,412	1,042 - 1,254 - 1,412	1,042 - 1,254 - 1,412
Sound pressure level (measured in anechoic room)				(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)
		*2	dB <A>	26.0-32.0-35.0	34.0-38.0-41.0	34.0-38.0-41.0	34.0-38.0-41.0
Air filter				PP honeycomb fabric.			
Refrigerant piping diameter	Gas (R410A)		mm (in.)	12.7 (1/2)Brazed	12.7 (1/2)Brazed	15.88 (5/8)Brazed	15.88 (5/8)Brazed
	Liquid (R410A)		mm (in.)	6.35 (1/4)Brazed	6.35 (1/4)Brazed	9.52 (3/8)Brazed	9.52 (3/8)Brazed
Field drain pipe diameter			mm (in.)	O.D.32 (1-1/4")	O.D.32 (1-1/4")	O.D.32 (1-1/4")	O.D.32 (1-1/4")

Notes:

*1 Nominal cooling conditions
Indoor: 27°C(81°F)DB/19°C(66°F)WB, Outdoor: 35°C(95°F)DB
Pipe length: 7.5m(24-9/16ft.), Level difference: 0m(0ft.)
*2 The values are measured at the factory setting of external static pressure.
*3 Nominal heating conditions
Indoor: 20°C(68°F)DB, Outdoor: 7°C(45°F)DB/6°C(43°F)WB
Pipe length: 7.5m(24-9/16ft.), Level difference: 0m(0ft.)
*4 The factory setting of external static pressure is shown without < >.
Refer to "Fan characteristics curves", according to the external static pressure, in DATA BOOK for the usable range of air flow rate.
*5 Measured in anechoic room with a 1m air inlet duct and 2m air outlet duct attached to the unit and 1.5m below the unit.
*6 The figures in [ ] show the specification values of PEFY-P20VMA3-E.

PEFY-P VMH(S)-E



PEFY-P VMH-E



PEFY-P VMHS-E (P40-P140)



PEFY-P VMHS-E (P200/P250)





Sufficient external static pressure ensuring flexible duct design

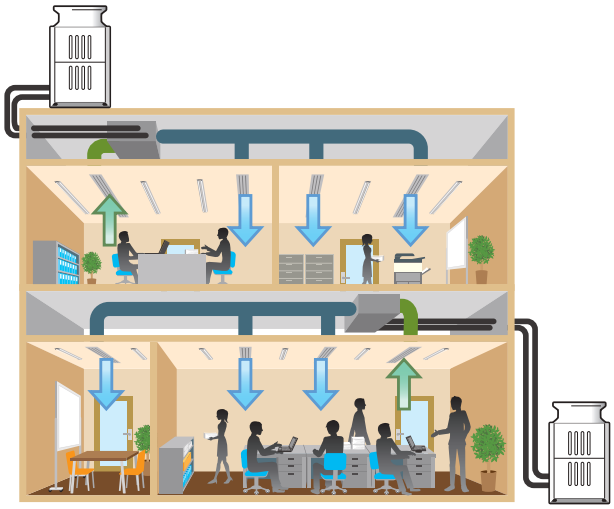
Sufficient external static pressure enables designs with long ducts and greatly expands design possibilities. Ducted air-conditioning that maches an interior design can be realized.

PEFY-P VMHS	P40	P50	P63	P71	P80	P100	P125	P140
External static pressure (Pa)	50 – <100> – <150> – <200>							

PEFY-P VMHS-E	P200	P250
External static pressure (Pa)	<50> – <100> – 150 – <200> – <250>*	

* The rated external static pressure is shown without < >.
The factory setting is the rated value.

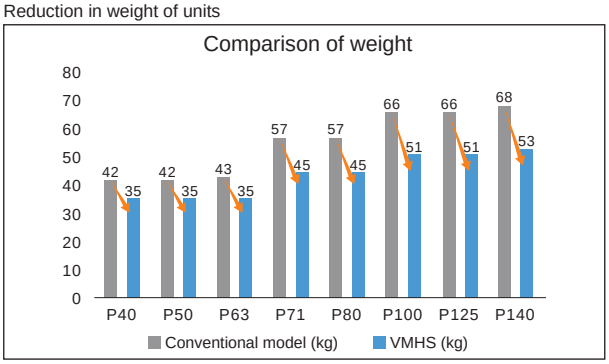
PEFY-P VMH-E		P200	P250
External static pressure (Pa)	380 V	<110> – 220	
	400/415 V	<130> – 260	



Low Power Consumption and Weight by DC motor(VMHS)

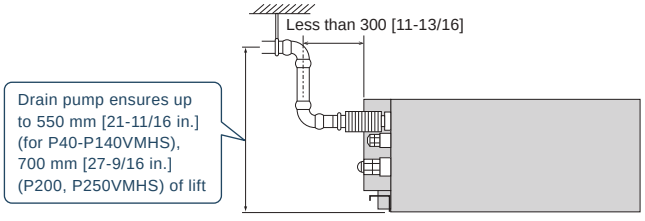
P40 to P140VMHS Models use DC motors. This reduces the power consumption and weight of the units.

Reduction in weight of units



Drain pump (option) ensures up to 550 mm [21-11/16 in.] for P40-P140VMHS, P200/P250VMH model / 700 mm [27-9/16 in.] for P200/P250VMHS models

The introduction of an upper drain pump allows the drain connection to be raised as high as 550 mm [21-11/16 in.] for P40-P140VMHS, P200/P250VMH models/700 mm [27-9/16 in.] for P200, 500VMHS models, allowing more freedom in piping layout design and reducing horizontal piping requirements.



mm (in.)

Optional Parts

Description	Model	Applicable capacity		Remarks
		VMH-E	VMHS-E	
Drain pump	PAC-KE04DM-F	P200, P250	-	
	PAC-KE05DM-F	-	P200, P250	
	PAC-DRP10DP-E2	-	P40-P140	
Long life filter	PAC-KE86LAF	-	P40, P50, P63	
	PAC-KE88LAF	-	P71, P80	
	PAC-KE89LAF	-	P100, P125, P140	
	PAC-KE85LAF	P200, P250	P200, P250	
Filter box	PAC-KE63TB-F	-	P40, P50, P63	Required when long life filter is used
	PAC-KE99TB-F	-	P71, P80	
	PAC-KE140TB-F	-	P100, P125, P140	
	PAC-KE250TB-F	P200, P250	P200, P250	

Specifications

Model				PEFY-P40VMHS-E	PEFY-P50VMHS-E	PEFY-P63VMHS-E	PEFY-P71VMHS-E	PEFY-P80VMHS-E	PEFY-P100VMHS-E	PEFY-P125VMHS-E	PEFY-P140VMHS-E
Power source				1-phase 220-230-240 V 50/60 Hz							
Cooling capacity	*1		kW	4.5	5.6	7.1	8.0	9.0	11.2	14.0	16.0
	*1		BTU/h	15,400	19,100	24,200	27,300	30,700	38,200	47,800	54,600
	*2	Power input	kW	0.055		0.090	0.075	0.090	0.160		0.190
	*2	Current input (220-230-240 V)	A	0.41-0.39-0.38		0.64-0.62-0.59	0.54-0.52-0.50	0.63-0.61-0.58	1.05-1.01-0.96		1.24-1.19-1.14
Heating capacity	*3		kW	5.0	6.3	8.0	9.0	10.0	12.5	16.0	18.0
	*3		BTU/h	17,100	21,500	27,300	30,700	34,100	42,700	54,600	61,400
	*2	Power input	kW	0.055		0.090	0.075	0.090	0.160		0.190
	*2	Current input (220-230-240 V)	A	0.41-0.39-0.38		0.64-0.62-0.59	0.54-0.52-0.50	0.63-0.61-0.58	1.05-1.01-0.96		1.24-1.19-1.14
External finish				Galvanized steel plate							
External dimension H x W x D			mm	380 x 745 x 900			380 x 1,030 x 900		380 x 1,195 x 900		
			in.	15 x 29-3/8 x 35-7/16			15 x 40-9/16 x 35-7/16		15 x 47-1/16 x 35-7/16		
Net weight			kg (lbs.)	35 (78)			45 (100)		51 (113)		53 (117)
Heat exchanger				Cross fin (Aluminum fin and copper tube)							
Fan		Type x Quantity		Sirocco fan x 1			Sirocco fan x 2				
	*4	External static press.	Pa	50-<100>-<150>-<200>							
			mmH_2O	5.1-<10.2>-<15.3>-<20.4>							
		Motor Type		DC motor							
		Motor output	kW	0.121			0.244		0.375		
		Air flow rate		(Low-Mid-High)							
			m^3/min	10.0-12.0-14.0		13.5-16.0-19.0	15.5-18.0-22.0	18.0-21.5-25.0	26.5-32.0-38.0		28.0-34.0-40.0
			L/s	167-200-233		225-267-317	258-300-367	300-358-417	442-533-633		467-567-667
			cfm	353-424-494		477-565-671	547-636-777	636-759-883	936-1,130-1,342		989-1,201-1,412
Sound pressure level (measured in anechoic room)				(Low-Mid-High)							
	*2		dB <A>	20-23-27		24-27-32	24-26-30	25-27-30	27-31-34		27-32-36
Air filter				Option:Synthetic fiber unwoven cloth filter (long life filter) and filter box are recommended.							
Refrigerant piping diameter		Gas (R410A)	mm (in.)	12.7 (1/2) Brazed		15.88 (5/8) Brazed					
		Liquid (R410A)	mm (in.)	6.35 (1/4) Brazed		9.52 (3/8) Brazed					
Field drain pipe diameter			mm (in.)	O.D.32 (1-1/4)							

Model				PEFY-P200VMH-E	PEFY-P250VMH-E	PEFY-P200VMHS-E	PEFY-P250VMHS-E
Power source				3-phase 380-415V 50Hz/3N ~ 380-415V 60Hz		1-phase 220-240V 50Hz/1-phase 220-240V 60Hz	
Cooling capacity	*5		kW	22.4	28.0	22.4	28.0
	*5		BTU/h	76,400	95,500	76,400	95,500
Heating capacity	*5		kW	25.0	31.5	25.0	31.5
	*5		BTU/h	85,300	107,500	85,300	107,500
Power consumption		Cooling	kW	0.99/1.14	1.23/1.41	0.63 *2	0.82 *2
		Heating	kW	0.99/1.14	1.23/1.41	0.63 *2	0.82 *2
Current	Cooling	380-415V	A	1.62/1.86	2.00/2.30	–	
		220-230-240V	A	–		3.47-3.32-3.18 *2	4.72-4.43-4.14 *2
	Heating	380-415V	A	1.62/1.86	2.00/2.30	–	
		220-230-240V	A	–		3.47-3.32-3.18 *2	4.72-4.43-4.14 *2
External finish				Galvanized		Galvanized steel plate	
Dimension H x W x D			mm	470 x 1,250 x 1,120			
			in.	18-9/16 x 49-1/4 x 44-1/8			
Net weight			kg (lbs.)	100 (221)		97 (214)	100 (221)
Heat exchanger				Cross fin (Aluminum plate fin and copper tube)			
Fan	Type x Quantity			Sirocco fan x 2			
	Airflow rate		m^3/min	58.0	72.0	–	
			L/s	967	1200	–	
			cfm	2048	2543	–	
		Lo-Mid-Hi	m^3/min	–		50.0-61.0-72.0	58.0-71.0-84.0
			L/s	–		833-1017-1200	967-1183-1400
			cfm	–		1766-2154-2542	2048-2507-2966
	External static pressure	380V	Pa	110 · 220 *6		–	
		400, 415V	Pa	130 · 260 *6		–	
			Pa	–		<50>-<100>-150-<200>-<250> *9	
			mmH_2O	–		<5.1>-<10.2>-15.3-<20.4>-<25.5> *9	
Motor	Type			3-phase induction motor		DC motor	
	Output		kW	0.76 *7	1.08 *7	0.87	
Air filter (option)				Synthethic fiber unwoven cloth filter (long life)		Synthethic fiber unwoven cloth filter (long life filter) and filter box are recommended.	
Refrigerant piping diameter		Gas (Brazing)	mm (in.)	ø19.05 (ø3/4)	ø22.2 (ø7/8)	ø19.05 (ø3/4)	ø22.2 (ø7/8)
		Liquid (Brazing)	mm (in.)	ø9.52 (ø3/8)			
Field drain pipe diameter			mm (in.)	O.D. 32 (1-1/4)			
Sound pressure level		380V	dB (A)	42 (110Pa)/45 (220Pa) *8	50 (110Pa)/52 (220Pa) *8	–	
		400, 415V	dB (A)	44 (130Pa)/47 (260Pa) *8	52 (130Pa)/54 (260Pa) *8	–	
		Lo-Mid-Hi	dB (A)	–		36-39-43 *10	39-42-46 *10

Notes:

*1 Nominal cooling conditions
Indoor: 27˚CD.B./19˚CW.B. (81˚FD.B./66˚FW.B.), Outdoor: 35˚CD.B. (95˚FD.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

*2 The values are measured at the factory setting of external static pressure.

*3 Nominal heating conditions
Indoor: 20˚CD.B. (68˚FD.B.), Outdoor: 7˚CD.B./6˚CW.B. (45˚FD.B./43˚FW.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

*4 The factory setting of external static pressure is shown without < >.
Refer to "Fan characteristics curves", according to the external static pressure, in DATA BOOK for the usable range of air flow rate.

*5 Cooling/heating capacity indicates the maximum value at operation under the following condition.
Cooling Indoor : 27°C(81°F)DB/19°C(66°F)WB, Outdoor : 35°C(95°F)DB
Heating Indoor : 20°C(68°F)DB, Outdoor : 7°C(45°F)DB/6°C(43°F)WB

*6 The external static pressure is set to 220Pa (at 380V) /260Pa (at 400, 415V) at factory shipment.

*7 The value are that at 415V.

*8 It is measured in anechoic room.

*9 The rated external static pressure is shown without < >.
The factory setting is the rated value.

*10 It is measured at the rated external static pressure in anechoic room.

Fresh air intake type

PEFY-P VMHS-E-F



PEFY-P VMHS-E-F (P125)



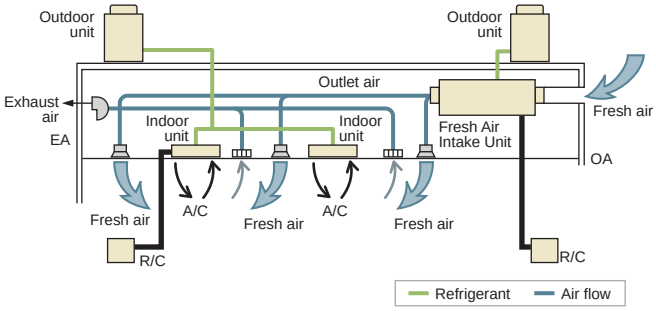
PEFY-P VMHS-E-F (P200/P250)



Enables Intake of Outside Air

Fresh air can be taken in with temperature control. Fresh air intake is available for each air-conditioning zone.

* Fresh air intake type indoor unit is designed to supply pretreated outside air into the room. Do not use to handle internal thermal load.



Flexible Air-Flow Setting

Four levels of external static pressure levels to choose from compared to the three levels on the existing models

Model	P125	P200	P250
External static pressure (Pa)	<100> – <150> – 200 – <250>		

*The factory setting of external static pressure is shown without chevrons "< >".

Two types of air-flow modes are available, each of which has three air-flow rates to choose from.

Mode	Normal-airflow rate	High-airflow rate
Air-flow rate	Low-Medium-High	Low-Medium-High

*Air-flow rates are accessible from the remote controller.

Controllable Outlet Air Temperature

Pre-treating the intake air before being supplied to the room contributes to the stability of room temperature, ensuring optimized comfort of the occupants.

* Outlet air temperature may fluctuate, depending on the outside air temperature and the operating status of indoor and outdoor units.

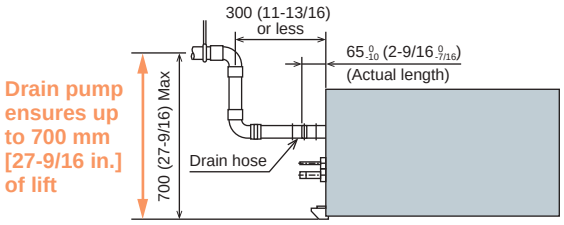
Equipped with DC Fan Motor

Fan motor has been changed to higher efficiency DC motor. Power source has been changed from three-phase power supply to single-phase power supply, which allows for easier installation.

* Comparison with PEFY-P140, 200, 250VMH-E-F

Drain Pump (Optional)

Greater design flexibility made possible by the increased head height (Max. 700 mm)*



mm (in.)

* Comparison with PEFY-P140, 200, 250VMH-E-F

Optional Parts

Description	Model	Applicable capacity
Drain pump kit	PAC-DRP10DP-E2	P125
	PAC-KE06DM-F	P200, 250
Long life filter	PAC-KE89LAF	P125
	PAC-KE85LAF	P200, 250
Filter box	PAC-KE140TB-F	P125
	PAC-KE250TB-F	P200, 250

Specifications

Model			PEFY-P125VMHS-E-F		PEFY-P200VMHS-E-F		PEFY-P250VMHS-E-F *6	
Power source			1-phase 220-230-240 V 50/60 Hz		1-phase 220-230-240 V 50/60 Hz		1-phase 220-230-240 V 50/60 Hz	
Cooling capacity (Nominal)	*1	kW	14.0		22.4		28.0	
	*1	BTU/h	47,800		76,400		95,500	
	*2 Power input	kW	0.220		0.260		0.350	
	*2 Current input (220 V)	A	1.43		1.66		2.16	
Temp. range of cooling			17°CD.B./15.5°CW.B. ~ 43°CD.B./35°CW.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is lower than 17°CD.B.		17°CD.B./15.5°CW.B. ~ 43°CD.B./35°CW.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is lower than 17°CD.B.		17°CD.B./15.5°CW.B. ~ 43°CD.B./35°CW.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is lower than 17°CD.B.	
Heating capacity (Nominal)	*3	kW	8.9		13.9		17.4	
	*3	BTU/h	30,400		47,400		59,400	
	*2 Power input	kW	0.230		0.270		0.360	
	*2 Current input (220 V)	A	1.52		1.85		2.38	
Temp. range of heating			-10°CD.B. ~ 20°CD.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is higher than 20°CD.B.		-10°CD.B. ~ 20°CD.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is higher than 20°CD.B.		-10°CD.B. ~ 20°CD.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is higher than 20°CD.B.	
External finish			Galvanized		Galvanized		Galvanized	
External dimension HxWxD		mm	380 x 1,195 x 900		470 x 1,250 x 1,120		470 x 1,250 x 1,120	
		in.	15 x 47-1/16 x 35-7/16		18-9/16 x 49-1/4 x 44-1/8		18-9/16 x 49-1/4 x 44-1/8	
Net weight		kg (lbs.)	49 (109)		78 (172)		81 (179)	
Heat exchanger			Cross fin (Aluminum fin and copper tube)		Cross fin (Aluminum fin and copper tube)		Cross fin (Aluminum fin and copper tube)	
FAN	Type x Quantity		Sirocco fan x 1		Sirocco fan x 2		Sirocco fan x 2	
*4, 5	External static press.	Pa	<100> - <150> - 200 - <250>		<100> - <150> - 200 - <250>		<100> - <150> - 200 - <250>	
		mmH_2O	<10.2> - <15.3> - 20.4 - <25.5>		<10.2> - <15.3> - 20.4 - <25.5>		<10.2> - <15.3> - 20.4 - <25.5>	
	Motor Type		DC motor		DC motor		DC motor	
	Motor output	kW	0.244		0.375		0.375	
	Driving mechanism		Direct-driven by motor		Direct-driven by motor		Direct-driven by motor	
*4, 5	Air flow rate		Normal-airflow rate mode	<High-airflow rate mode>	Normal-airflow rate mode	<High-airflow rate mode>	Normal-airflow rate mode	<High-airflow rate mode>
	(Low-Mid-High)	m^3/min	14.0 - 15.5 - 18.0	15.5 - 18.0 - 20.0	22.5 - 25.0 - 28.0	25.0 - 28.0 - 32.0	28.0 - 31.0 - 35.0	31.0 - 35.0 - 40.0
		L/s	233 - 258 - 300	258 - 300 - 333	375 - 417 - 467	417 - 467 - 533	467 - 517 - 583	517 - 583 - 667
		cfm	494 - 547 - 636	547 - 636 - 706	794 - 883 - 989	883 - 989 - 1,130	989 - 1,095 - 1,236	1,095 - 1,236 - 1,412
Sound pressure level (measured in anechoic room)			Normal-airflow rate mode	<High-airflow rate mode>	Normal-airflow rate mode	<High-airflow rate mode>	Normal-airflow rate mode	<High-airflow rate mode>
(Low-Mid-High)	*2	dB <A>	34-37-41	36-40-42	35-38-41	36-39-42	38-40-44	38-41-45
Air filter			Option: Synthetic fiber unwoven cloth filter (long life filter).		Option: Synthetic fiber unwoven cloth filter (long life filter).		Option: Synthetic fiber unwoven cloth filter (long life filter).	
Refrigerant piping diameter	Liquid (R410A)	mm (in.)	9.52 (3/8) Brazed		9.52 (3/8) Brazed		9.52 (3/8) Brazed	
	Gas (R410A)	mm (in.)	15.88 (5/8) Brazed		19.05 (3/4) Brazed		22.22 (7/8) Brazed	
Field drain pipe size		mm (in.)	O.D.32 (1-1/4)		O.D.32 (1-1/4)		O.D.32 (1-1/4)	
Optional parts	Drain pump kit		PAC-DRP10DP-E2		PAC-KE06DM-F		PAC-KE06DM-F	
	Long life filter		PAC-KE89LAF		PAC-KE85LAF		PAC-KE85LAF	
	Filter box		PAC-KE140TB-F		PAC-KE250TB-F		PAC-KE250TB-F	

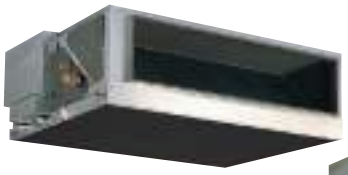
Notes:

*1 Cooling capacity indicates the maximum value at operation under the following condition. Cooling: Indoor 33°CDB/28°CWB, Outdoor 33°CDB. The set temperature of the remote controller is 18°C.
*2 The value are measured at the factory setting of airflow mode and external static pressure.
*3 Heating capacity indicates the maximum value at operation under the following condition. Heating: Indoor 0°CDB/-2.9°CWB, Outdoor 0°CDB/-2.9°CWB. The set temperature of the remote controller is 25°C.
*4 The factory setting of airflow mode and external static pressure mode is shown without < >. Refer to "Fan characteristics curves", according to the external static pressure, in DATA BOOK for the usable range of air flow rate.
*5 If the airflow rate is over the usable range, dew drop can be caused from the air outlet and the air flow rate is changed automatically because of the output down by the fan motor control. If the air flow rate is less than the usable range, condensation from the unit surface can be caused.
*6 Regarding P250VMHS-E-F, the middle notch air flow rate is different from the spec value when the external static pressure setting is set to 100Pa. See "Fan characterics curves" in DATA BOOK for the details.

- The combination of fresh air intake type indoor units with other types of indoor units to handle internal thermal load which may cause the conflict of operation mode. It is not recommended when fresh air intake type indoor unit is connected to the Y or WY series.
- Depending on the air conditioning load, outside temperature, and due to the activation of protection functions, the desired preset temperature may not always be achieved and the discharge temperature may swing. Note that untreated outside air may be delivered directly into the room upon the activation of protection functions.
- Fresh air intake type indoor units cannot be connected to PUMY series, except for PUMY-SP125/140V(Y)KM2, PUMY-CP125/140VKM2, PUMY-CP125/140/200/225YKM2, PUMY-P200/225YKM3, PUMY-(C)P250/300YBM2. Fresh air intake type indoor unit and PUMY have to be one to one connection. Fresh air intake type unit cannot be connected to an outdoor unit together with PWFY series.
- The maximum connectable indoor units to 1 outdoor unit are 110% (100% in case of heating below -5°C).
- When fresh air intake type indoor units connect to an outdoor unit together with other types of indoor unit, the total capacity of fresh air intake type indoor units needs to be 30% or less of the connected outdoor unit capacity.
- The AUTO mode on the local remote controller is available only when fresh air intake type indoor unit is connected to the R2 or WR2 series of outdoor unit.
- The system changeover function is available only when all the connected indoor units are fresh air intake type indoor units.
- The fan temporary stops during defrost.
- The cooling and heating capacities are the maximum capacities that were obtained by operating in the above air conditions and with a refrigerant pipe of about 7.5 m and a level difference of 0 m.
- The actual capacity characteristics vary with the combination of indoor and outdoor units. See the technical information in DATA BOOK for the details.
- Thermo off (Fan) operation automatically starts either when temperature is lower than 17°CDB in cooling mode or when the temperature exceeds 20°CDB in heating mode.
- Dry mode is not available.
- When this unit is used as sole A/C system, be careful about the dew in air outlet grilles in cooling mode.
- Un-conditioned outdoor air such as humid air or cold air blows to the indoor during thermo off operation. Please be careful when positioning indoor unit air outlet grilles, ie take the necessary precautions for cold air, and also insulate rooms for dew condensation prevention as required.
- Air filter must be installed in the air intake side. The filter should be attached where easy maintenance is possible in case of usage of field supply filters.

Fresh air intake type

PEFY-P VMH-E-F

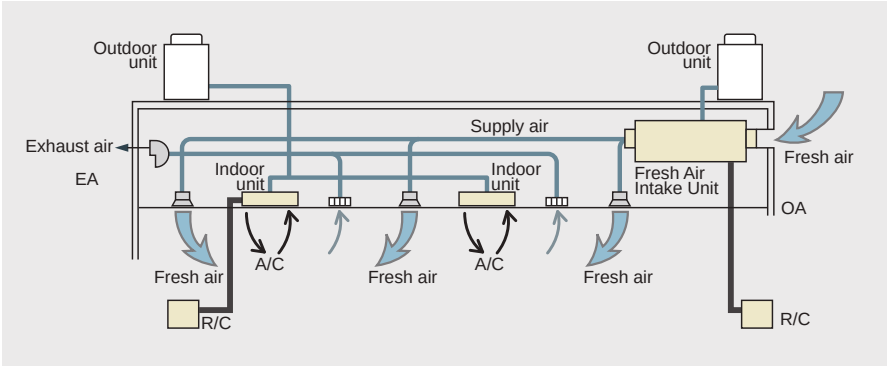






Example design for an outside air treatment unit system

The Fresh Air intake indoor unit can take fresh outdoor air into any building.



* Fresh air intake type indoor unit is designed to supply pretreated outside air into the room. Do not use to handle internal thermal load.
* Discharge temperature control is not possible.
PEFY-P VMH-E-F models turn the thermo ON or OFF depending on the room temperature.
Either a remote controller (sold separately) or a remote sensor (sold separately) must be installed to monitor the room temperature.
During thermo-off (FAN-mode), outside air blows directly into the room.

Applications across a wide range of design

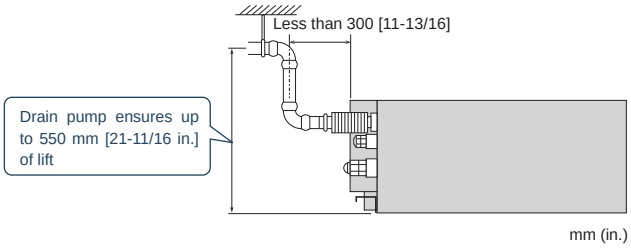
Sufficient external static pressure (up to 240 Pa) enables designs with long ducts and expands design possibilities.

PEFY-P VMH-E-F		P80	P140	P200	P250
External static pressure (Pa)	208 V	<35> – 85 – <170>	<35> – 85 – <170>	<140> – 200	<110> – 190
	220 V	<40> – 115 – <190>	<50> – 115 – <190>	<150> – 210	<120> – 200
	230 V	<50> – 130 – <210>	<60> – 130 – <220>	<160> – 220	<130> – 210
	240 V	<80> – 170 – <220>	<100> – 170 – <240>	–	–

*The factory setting for external static pressure is shown without "< >".
Refer to "Fan characteristics curves", according to the external static pressure, in the DATA BOOK for the usable range of the air flow rate.

Drain pump (option) ensures up to 550 mm [21-11/16 in.] of lift

The introduction of an upper drain pump allows the drain connection to be raised as high as 550 mm [21-11/16 in.], allowing more freedom in piping layout design and reducing horizontal piping requirements.



mm (in.)

Optional Parts

Description	Model	Applicable capacity
Long life filter	PAC-KE88LAF	P80
	PAC-KE89LAF	P140
	PAC-KE85LAF	P200, P250
Filter box	PAC-KE80TB-F	P80
	PAC-KE140TB-F	P140
	PAC-KE250TB-F	P200/P250
Drain pump	PAC-KE04DM-F	P80, P140, P200, P250

Specifications

Model				PEFY-P80VMH-E-F	PEFY-P140VMH-E-F	PEFY-P200VMH-E-F	PEFY-P250VMH-E-F
Power source				1-phase 220-240V 50Hz / 1-phase 208-230V 60Hz		3-phase 380-415V 50Hz / 3N~ 380-415V 60Hz	
Cooling capacity		*1	kW	9.0	16.0	22.4	28.0
		*1	BTU/h	30,700	54,600	76,400	95,500
Temp. range of cooling				21°CD.B./15.5°CW.B. ~ 43°CD.B./35°CW.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is lower than 21°CD.B.			
Heating capacity		*1	kW	8.5	15.1	21.2	26.5
		*1	BTU/h	29,000	51,500	72,300	90,400
Temp. range of heating				-10°CD.B. ~ 20°CD.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is higher than 20°CD.B.			
Power consumption		*2	Cooling kW	0.16 / 0.21	0.29 / 0.33	0.34 / 0.42	0.39 / 0.50
		*2	Heating kW	0.16 / 0.21	0.29 / 0.33	0.34 / 0.42	0.39 / 0.50
Current		*2	Cooling A	0.67 / 0.91	1.24 / 1.48	0.58 / 0.74	0.68 / 0.86
		*2	Heating A	0.67 / 0.91	1.24 / 1.48	0.58 / 0.74	0.68 / 0.86
External finish				Galvanized			
Dimension H x W x D			mm (in.)	380 x 1,000 x 900 (15 x 39-3/8 x 35-7/16)	380 x 1,200 x 900 (15 x 47-1/4 x 35-7/16)	470 x 1,250 x 1120 (18-9/16 x 49-1/4 x 44-1/8)	
Net weight			kg (lbs)	50 (111)	67 (148)	100 (221)	
Heat exchanger				Cross fin (Aluminum plate fin and copper tube)			
Fan	Type x Quantity			Sirocco fan x 1	Sirocco fan x 2		
	Airflow rate		m^3/min	9.0	18.0	28	35
			L/s	150	300	467	583
			cfm	318	636	989	1,236
	External static pressure *3	208V	Pa	<35> - 85 - <170>	<35> - 85 - <170>	-	-
		220V	Pa	<40> - 115 - <190>	<50> - 115 - <190>	-	-
		230V	Pa	<50> - 130 - <210>	<60> - 130 - <220>	-	-
		240V	Pa	<80> - 170 - <220>	<100> - 170 - <240>	-	-
		380V	Pa	-	-	<140> / 200	<110> / 190
		400V	Pa	-	-	<150> / 210	<120> / 200
		415V	Pa	-	-	<160> / 220	<130> / 210
Motor	Type			1-phase induction motor		3-phase induction motor	
	Output		kW	0.09 (220V, 115Pa)	0.14 (220V, 115Pa)	0.20 (415V, 220Pa)	0.23 (415V, 210Pa)
Air filter (option)				Synthetic fiber unwoven cloth filter (long life)		Synthetic fiber unwoven cloth filter (long life type)	
Refrigerant pipe diameter		Gas	mm (in.)	ø15.88 (ø5/8) Flare		ø19.05 (ø3/4) Brazed	ø22.2 (ø7/8) Brazed
		Liquid	mm (in.)	ø9.52 (ø3/8) Flare		ø9.52 (ø3/8) Brazed	
Field drain pipe diameter			mm (in.)	O.D.32 (1-1/4)		O.D.32 (1-1/4)	
Sound pressure level (measured in anechoic room)*2 *4		208, 220V	dB<A>	38	38	-	-
		230, 240V	dB<A>	43	43	-	-
		380V	dB<A>	-	-	42	44
		400V	dB<A>	-	-	43	45
		415V	dB<A>	-	-	44	46

Notes:

*1 Cooling/Heating capacity indicates the maximum value at operation under the following condition.

	Indoor	Outdoor	Pipe length	Level difference
Cooling	33°CDB/28°CWB (91°FDB/82°FWB)	33°CDB (91°FDB)	7.5 m (24-9/16 ft)	0m (0ft.)
Heating	0°CDB/-2.9°CWB (32°FDB/27°FWB)	0°CDB/-2.9°CWB (32°FDB/27°FWB)	7.5 m (24-9/16 ft)	0m (0ft.)

*2 The values are measured at the factory setting of external static pressure.
The figure of Electrical characteristic indicates at 240V 50Hz/230V 60Hz (PEFY-P80, 140VMH-E-F type), at 50Hz/60Hz (PEFY-P200, 250VMH-E-F type).
*3 The factory setting of external static pressure is shown without < >.
Refer to "Fan characteristics curves", according to the external static pressure, in DATA BOOK for the usable range of air flow rate.
*4 Measured in anechoic room with a 1 m air inlet duct and 2 m air outlet duct attached to the unit and 1.5 m below the unit.

- Depending on the air conditioning load, outside temperature, and due to the activation of protection functions, the outlet air temperature may swing. Note that untreated outside air may be delivered directly into the room upon the activation of protection functions.
- The maximum connectable indoor units to 1 outdoor unit are 110% (100% in case of heating below -5°C).
- When fresh air intake type indoor units connect to an outdoor unit together with other types of indoor unit, the total capacity of fresh air intake type indoor units needs to be 30% or less of the connected outdoor unit capacity.
- Either a remote controller (sold separately) or a remote sensor (sold separately) must be installed to monitor the room temperature.
- The AUTO mode on the local remote controller is available only when fresh air intake type indoor unit is connected to the R2 or WR2 series of outdoor unit.
- The system changeover function is available only when all the connected indoor units are fresh air intake type indoor units.
- The fan temporary stops during defrost.
- Dry mode is not available.
- In any case, the air flow rate should be kept lower than 110% of the above chart. Please see "Fan characteristics curves" in DATA BOOK for the details.
- When this unit is used as sole A/C system, be careful about the dew in air outlet grilles in cooling mode.
- Un-conditioned outdoor air such as humid air or cold air blows to the indoor during thermo off operation.
  Please be careful when positioning indoor unit air outlet grilles, ie take the necessary precautions for cold air, and also insulate rooms for dew condensation prevention as required.
- Air filter must be installed in the air intake side. The filter should be attached where easy maintenance in possible in case of usage of field supply filters.
- Fresh air intake type indoor units cannot be connected to PUMY series, except for PUMY-SP125/140V(Y)KM2, PUMY-CP125/140VKM2, PUMY-CP125/140/200/225YKM2, PUMY-P200/225YKM3.
  Fresh air intake type indoor unit and PUMY have to be one to one connection. Fresh air intake type unit cannot be connected to an outdoor unit together with PWFY series.

PEFY-P VMR-E-L/R





* The picture represents -L type. For -R type, the control box comes to the right side when looked at from the front.

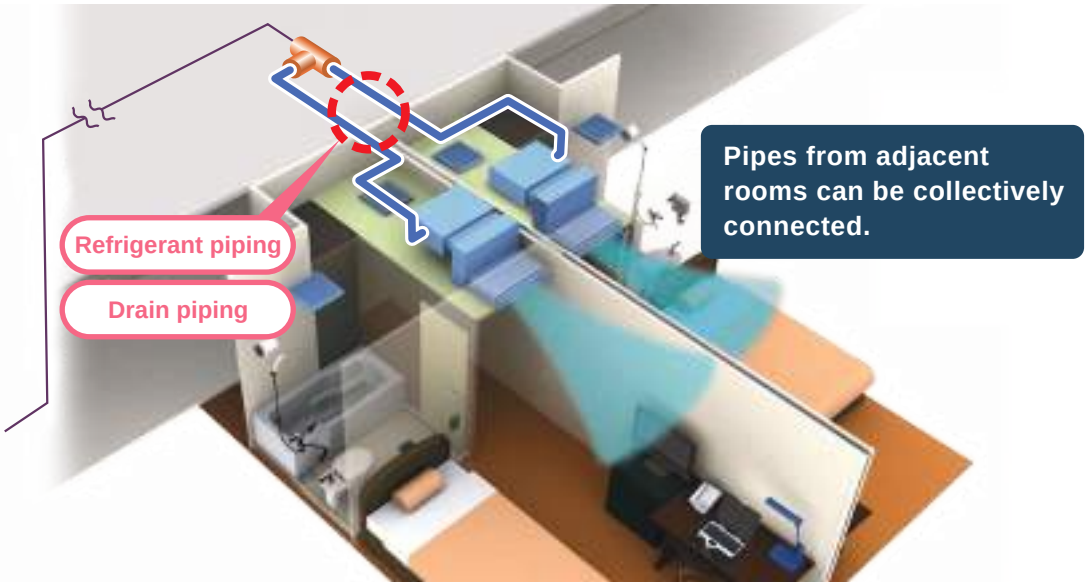
Low-noise operation for a quiet indoor environment

Low noise design: Minimum of 20 dB when air flow rate is low and maximum of 35 dB when air flow rate is high.

* Noise values measured on a rear-inlet model in an anechoic room. (The noise value is higher in cases where the bottom inlet is used.)

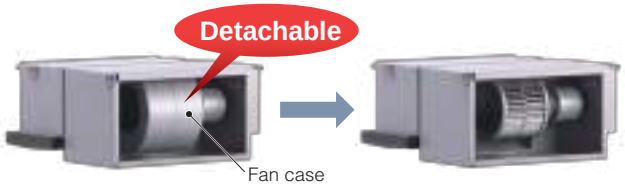
Flexibly application in symmetrically arranged rooms

Models are available with refrigerant/drain piping and control box on either the right or left sides. They can be flexibly applied to symmetrically arranged hotel rooms.



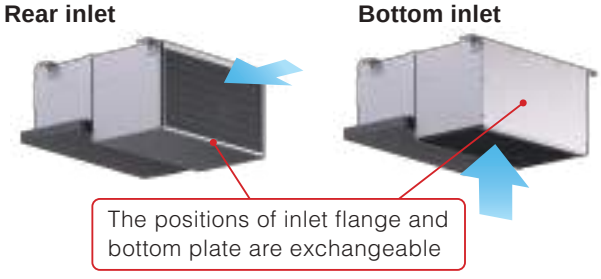
Easy Maintenance

The fan case has no screws and can be easily removed, meaning the fan is easy to maintain. The air filter can be removed from the side or rear of the body.



Air inlet direction can easily be changed

The rear or bottom air inlet can be selected according to the room's layout.



By exchanging the closing board and air filter, rear inlet and bottom inlet can be changed. (At factory shipment: Rear inlet)

* The units with bottom inlet make more noise than those with rear inlet. It is recommended to choose the type of "with rear inlet" for the rooms that should be quiet such as bedrooms.

Specifications

Model				PEFY-P20VMR-E-L	PEFY-P25VMR-E-L	PEFY-P32VMR-E-L
Power source				1-phase 220-230-240V 50Hz/1-phase 220-230V 60Hz		
Cooling capacity		*1	kW	2.2	2.8	3.6
		*1	BTU/h	7,500	9,600	12,300
Heating capacity		*1	kW	2.5	3.2	4.0
		*1	BTU/h	8,500	10,900	13,600
Power consumption	Cooling		kW	0.06/0.06	0.06/0.06	0.07/0.08
	Heating		kW	0.06/0.06	0.06/0.06	0.07/0.08
Current	Cooling		A	0.29/0.29	0.29/0.29	0.34/0.38
	Heating		A	0.29/0.29	0.29/0.29	0.34/0.38
External finish				Galvanized		
Dimension H x W x D	Rear inlet		mm (in.)	292 x 640 x 580 (11-1/2 x 25-1/4 x 22-7/8)		
	Bottom inlet		mm (in.)	300 x 640 x 570 (11-7/8 x 25-1/4 x 22-1/2)		
Net weight			kg (lbs.)	18 (40)		
Heat exchanger				Cross fin (Aluminum fin and copper tube)		
Fan	Type x Quantity			Sirocco fan x 1		
	Airflow rate (Lo-Mid-Hi)		m^3/min	4.8-5.8-7.9		4.8-5.8-9.3
			L/s	80-97-132		80-97-155
			cfm	170-205-279		170-205-328
	External static pressure	*2	Pa	5		
Motor	Type			1-phase induction motor		
	Output		kW	0.018		0.023
Air filter				PP Honeycomb fabric (washable)		
Refrigerant pipe diameter	Gas		mm (in.)	ø12.7 (ø1/2) Brazed		
	Liquid		mm (in.)	ø6.35 (ø1/4) Brazed		
Field drain pipe diameter			mm (in.)	O.D. 26 (1)		
Sound pressure level (Lo-Mid-Hi)	220V	*3	dB (A)	20-25-30		20-25-33
	230V		dB (A)	21-26-32		21-26-35
	240V		dB (A)	22-27-30		22-27-33

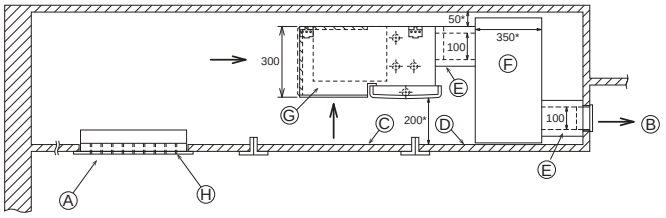
Model				PEFY-P20VMR-E-R	PEFY-P25VMR-E-R	PEFY-P32VMR-E-R
Power source				1-phase 220-230-240V 50Hz/1-phase 220-230V 60Hz		
Cooling capacity		*1	kW	2.2	2.8	3.6
		*1	BTU/h	7,500	9,600	12,300
Heating capacity		*1	kW	2.5	3.2	4.0
		*1	BTU/h	8,500	10,900	13,600
Power consumption	Cooling		kW	0.06/0.06	0.06/0.06	0.07/0.08
	Heating		kW	0.06/0.06	0.06/0.06	0.07/0.08
Current	Cooling		A	0.29/0.29	0.29/0.29	0.34/0.38
	Heating		A	0.29/0.29	0.29/0.29	0.34/0.38
External finish				Galvanized		
Dimension H x W x D	Rear inlet		mm (in.)	292 x 640 x 580 (11-1/2 x 25-1/4 x 22-7/8)		
	Bottom inlet		mm (in.)	300 x 640 x 570 (11-7/8 x 25-1/4 x 22-1/2)		
Net weight			kg (lbs.)	18 (40)		
Heat exchanger				Cross fin (Aluminum fin and copper tube)		
Fan	Type x Quantity			Sirocco fan x 1		
	Airflow rate (Lo-Mid-Hi)		m^3/min	4.8-5.8-7.9		4.8-5.8-9.3
			L/s	80-97-132		80-97-155
			cfm	170-205-279		170-205-328
	External static pressure	*2	Pa	5		
Motor	Type			1-phase induction motor		
	Output		kW	0.018		0.023
Air filter				PP Honeycomb fabric (washable)		
Refrigerant pipe diameter	Gas		mm (in.)	ø12.7 (ø1/2) Brazed		
	Liquid		mm (in.)	ø6.35 (ø1/4) Brazed		
Field drain pipe diameter			mm (in.)	O.D. 26 (1)		
Sound pressure level (Lo-Mid-Hi)	220V	*3	dB (A)	20-25-30		20-25-33
	230V		dB (A)	21-26-32		21-26-35
	240V		dB (A)	22-27-30		22-27-33

Notes:

*1 Cooling/Heating capacity indicates the maximum value at operation under the following condition.
Cooling : Indoor 27°C(81°F)DB/19°C(66°F)WB, Outdoor 35°C(95°F)DB
Heating : Indoor 20°C(68°F)DB, Outdoor 7°C(45°F)DB/6°C(43°F)WB
*2 The external static pressure is set to 5Pa (at 220V, 230V, 240V).
*3 Measured in anechoic room. Sound pressure levels of the unit with a rear air inlet. (Sound pressure levels are higher than the unit with a bottom air inlet.)

* If quietness is required, installation of a crank-shaped duct is recommended. Please refer to the installation pattern below for the duct system design.

(Unit: mm)



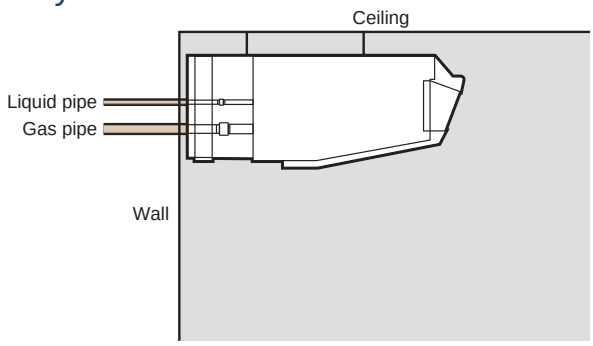
Ⓐ Air inlet
Ⓑ Air outlet
Ⓒ Access door
Ⓓ Ceiling surface
Ⓔ Duct
Ⓕ Duct box
Ⓖ Air filter
Ⓗ Inlet grille
* Reference data

PCFY-P VKM-E



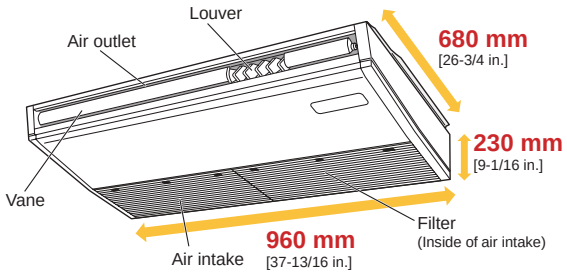


Easy installation



The ceiling suspended cassette can easily be installed without requiring duct work, even if the ceiling does not have sufficient space.

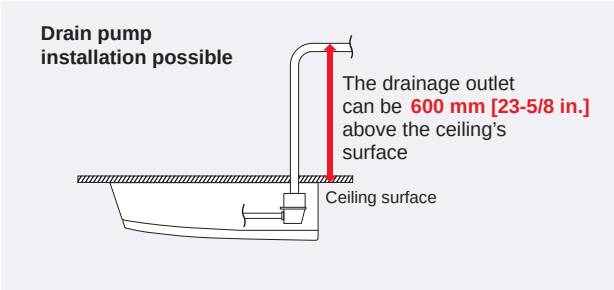
230 mm [9-1/16 in.] high unit is designed in consideration of interior design coordination



Sleek and slim with stylishly curved lines, the PCFY-Series is designed to blend into interior.

Drain pump is available for all models

The optional drain pump allows the drain connection to be raised as high as 600mm [23-5/8 in.], expanding flexibility in choosing the unit's location.



Auto Vane Control

Outlet vanes can be moved up and down using the remote controller. This improved airflow control feature solves the problem of drafts.



Equipped with automatic air-speed adjustment

In addition to the conventional 4-speed settings, units are now equipped with an automatic air-speed adjustment mode. This setting automatically adjusts the air-speed to conditions that match the room environment. At the start of heating/cooling operation, the airflow is set to high-speed to quickly heat/cool the room. When the room temperature reaches the desired setting, the airflow speed is decreased automatically for stable comfortable heating/cooling operation.



Optional Parts

Description	Model	Applicable capacity
Drain pump kit	PAC-SH83DM-E	P40
	PAC-SH84DM-E	P63, 100, 125
High efficiency filter	PAC-SH88KF-E	P40
	PAC-SH89KF-E	P63
	PAC-SH90KF-E	P100, 125
Wireless remote controller kit	PAR-SL94B-E	P40, 63, 100, 125
Anti-allergy enzyme filter	PAC-SK48KF-E	P40
	PAC-SK49KF-E	P63
	PAC-SK50KF-E	P100, 125

Specifications

Model				PCFY-P40VKM-E	PCFY-P63VKM-E	PCFY-P100VKM-E	PCFY-P125VKM-E
Power source				1-phase 220-240V 50Hz/1-phase 220V 60Hz			
Cooling capacity		*1	kW	4.5	7.1	11.2	14.0
		*1	BTU/h	15,400	24,200	38,200	47,800
Heating capacity		*1	kW	5.0	8.0	12.5	16.0
		*1	BTU/h	17,100	27,300	42,700	54,600
Power consumption	Cooling		kW	0.04	0.05	0.09	0.11
	Heating		kW	0.04	0.05	0.09	0.11
Current	Cooling		A	0.28	0.33	0.65	0.76
	Heating		A	0.28	0.33	0.65	0.76
External finish (Munsell No.)				6.4Y 8.9/ 0.4			
Dimension H x W x D			mm	230 x 960 x 680	230 x 1,280 x 680	230 x 1,600 x 680	
			in.	9-1/16 x 37-13/16 x 26-3/4	9-1/16 x 50-3/8 x 26-3/4	9-1/16 x 63 x 26-3/4	
Net weight			kg (lbs.)	24 (53)	32 (71)	36 (79)	38 (84)
Heat exchanger				Cross fin (Aluminum fin and copper tube)			
Fan	Type x Quantity			Sirocco fan x 2	Sirocco fan x 3	Sirocco fan x 4	
	Airflow rate (Lo-Mid2-Mid1-Hi)	*2	m^3/min	10-11-12-13	14-15-16-18	21-24-26-28	21-24-27-31
			L/s	167-183-200-217	233-250-267-300	350-400-433-467	350-400-450-517
			cfm	353-388-424-459	494-530-565-636	742-847-918-989	742-847-953-1,095
	External static pressure		Pa	0			
Motor	Type			DC motor			
	Output		kW	0.090	0.095	0.160	
Air filter				PP Honeycomb (long life)			
Refrigerant pipe diameter	Gas (Flare)		mm (in.)	ø12.7 (ø1/2)	ø15.88 (ø5/8)		
	Liquid (Flare)		mm (in.)	ø6.35 (ø1/4)	ø9.52 (ø3/8)		
Field drain pipe diameter			mm (in.)	O.D. 26 (1)			
Sound pressure level (Lo-Mid2-Mid1-Hi)		*2 *3	dB (A)	29-32-34-36	31-33-35-37	36-38-41-43	36-39-42-44

Notes:

*1 Cooling/Heating capacity indicates the maximum value at operation under the following condition.
Cooling Indoor : 27°C(80.6°F)DB/19°C(66.2°F)WB, Outdoor 35°C(95°F)DB
Heating Indoor : 20°C(68°F)DB, Outdoor 7°C(44.6°F)DB/6°C(42.8°F)WB
*2 Airflw rate/Sound pressure level are shown in (low-middle 2-middle 1-high).
*3 It is measured in anechoic room.

PKFY-P VLM-E
PKFY-P VKM-PA NEW


PKFY-P VLM (P15~P32)


PKFY-P VLM (P40/P50)


PKFY-P VKM (P63/P100)



Sophisticated design with new white color that matches the room's interior (VKM Model)

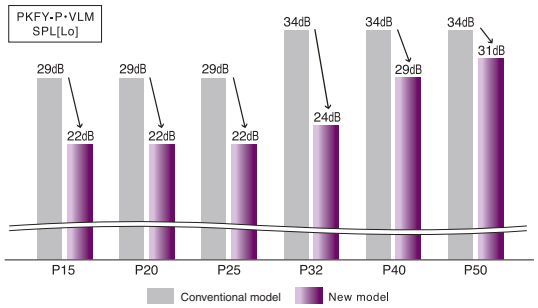

PKFY-P VKM-E
Conventional model


NEW
PKFY-P VKM-PA
New model

A sharp and simple form that combines beauty and function. The simple square design harmonizes beautifully with the straight lines created by the intersection of the walls, floor and ceiling. Also adopted a new white body color. It will make your life and space beautiful and comfortable without disturbing the atmosphere of the room.

Low noise

The noise level has been reduced compared to the conventional model (PKFY-P VBM/VHM) by improving the unit structure such as the line flow fan.



* Measurement condition (Fan speed: Low)
* It is measured in anehoic room.

Improved Airflow control

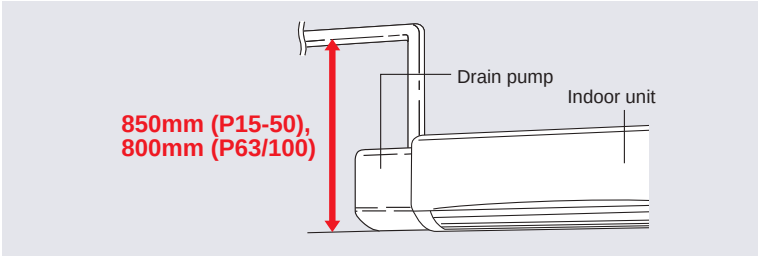
Fan speed and Vane control

The VLM can set the fan speed to 4 steps and auto mode. Also, the vane angle can be set to 5 steps. This has enabled air conditioning to be tailored to your taste.

		Conventional		Current
		PKFY-P**VBM	PKFY-P**VHM	PKFY-P**VLM-E
Fan Speed		4 speeds	3 speeds + AUTO	4 speeds + AUTO
Vane Control	Vane Angle	4 steps	5 steps	5 steps
	Swing mode	–	✓	✓

Drain pump option

The optional drain pump allows the drain connection to be raised as high as 850mm (P15-50), 800mm (P63/100), allowing more flexible in piping layout design.



Optional Parts

Description	Model	Applicable capacity
External LEV Box	PAC-SG95LE-E	P15, 20, 25, 32, 40, 50, 63
Drain pump kit	PAC-SL48DM-E	P15, 20, 25, 32, 40, 50, 63, 100
Plasma quad connect	MAC-100FT-E	P15, 20, 25, 32, 40, 50, 63, 100

Specifications

Model				PKFY-P15VLM-E	PKFY-P20VLM-E	PKFY-P25VLM-E	PKFY-P32VLM-E	PKFY-P40VLM-E	PKFY-P50VLM-E
Power source				1-phase 220-240 V 50 Hz, 1-phase 220-230 V 60Hz					
Cooling capacity (Nominal)		*1	kW	1.7	2.2	2.8	3.6	4.5	5.6
		*1	BTU/h	5,800	7,500	9,600	12,300	15,400	19,100
	Power input		kW	0.02	0.02	0.03	0.04	0.04	0.05
	Current input		A	0.20	0.20	0.25	0.35	0.35	0.45
Heating capacity (Nominal)		*2	kW	1.9	2.5	3.2	4.0	5.0	6.3
		*2	BTU/h	6,500	8,500	10,900	13,600	17,100	21,500
	Power input		kW	0.01	0.01	0.02	0.03	0.03	0.04
	Current input		A	0.15	0.15	0.20	0.30	0.30	0.40
External finish (Munsell No.)				Plastic, MUNSELL (0.7PB 9.2/0.4)					
External dimension H x W x D			mm	299 x 773 x 237				299 x 898 x 237	
			in.	11-25/32 x 30-7/16 x 9-11/32				11-25/32 x 35-3/8 x 9-11/32	
Net weight			kg (lbs.)	11 (25)				13 (29)	
Heat exchanger				Cross fin (Aluminum fin and copper tube)					
Fan	Type x Quantity			Line flow fan x 1					
	External static press		Pa (mmH$_2$O)	0 (0)					
	Motor type			DC motor					
	Motor output		kW	0.03					
	Driving mechanism			Direct driven					
	Airflow rate (Lo-Mid2-Mid1-Hi)		m^3/min	4.0-4.2-4.4-4.7	4.0-4.4-4.9-5.4	4.0-4.6-5.4-6.7	4.3-5.4-6.9-8.4	6.3-7.4-8.6-10.0	6.8-8.3-10.2-12.4
			L/s	67-70-73-78	67-73-82-90	67-77-90-112	72-90-115-140	105-123-143-167	113-138-170-207
			cfm	141-148-155-166	141-155-173-191	141-162-191-237	152-191-244-297	222-261-304-353	240-293-360-438
Noise level (measured in anechoic room)			dB (A)	22-24-26-28	22-26-29-31	22-27-31-35	24-31-37-41	29-34-37-40	31-36-41-46
Insulation material				Polyethylene sheet					
Air filter				PP honeycomb					
Protection device				Fuse					
Refrigerant control device				LEV					
Refrigerant piping diameter	Liquid (Flare)		mm (in.)	ø6.35 (ø1/4)					
	Gas (Flare)		mm (in.)	ø12.7 (ø1/2)					
Field drain pipe diameter			mm (in.)	I.D.16 (5/8)					
Optional parts	DRAIN PUMP KIT			PAC-SL48DM-E					
	EXTERNAL LEV BOX			PAC-SG95LE-E					

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-1) Indoor : 27°CD.B./19°CW.B. (81°FD.B./66°FW.B.), Outdoor 35°CD.B. (95°FD.B.) Pipe length : 7.5 m (24-9/16 ft.), Level difference : 0 m (0 ft.)
*2 Nominal heating conditions (subject to JIS B8615-1) Indoor : 20°CD.B. (68°FD.B.), Outdoor 7°CD.B./6°CW.B (45°FD.B./43°FW.B.) Pipe length : 7.5 m (24-9/16 ft.), Level difference : 0 m (0 ft.)

Model				PKFY-P63VKM-PA	PKFY-P100VKM-PA
Power source				1-phase 220-240V 50Hz, 1-phase 220V-230V 60Hz	
Cooling capacity (Nominal)		*1	kW	7.1	11.2
		*1	BTU/h	24,200	38,200
	Power input		kW	0.05	0.08
(220V)	Current input		A	0.37	0.58
Heating capacity (Nominal)		*2	kW	8.0	12.5
		*2	BTU/h	27,300	42,600
	Power input		kW	0.04	0.07
(220V)	Current input		A	0.30	0.51
External finish (Munsell No.)				Plastic, MUNSELL (0.7PB 9.2/0.4)	
External dimension H x W x D			mm	365x1170x295	
			in.	14-3/8 x 46-1/16 x 11-5/8	
Net weight			kg (lbs.)	21(46)	
Heat exchanger				Cross fin (Aluminum fin and copper tube)	
Fan	Type x Quantity			Line flow fan x 1	
	External static press		Pa (mmH$_2$O)	0 (0)	
	Motor type			DC motor	
	Motor output		kW	0.056	
	Driving mechanism			Direct-drive	
	Airflow rate (Low-High)		m^3/min	16-20	20-26
			L/s	267-333	333-433
			cfm	565-706	706-918
Sound pressure level (measured in anechoic room)			dB (A)	39-45	41-49
Insulation material				Polyethylene sheet	
Air filter				PP honeycomb	
Protection device				Fuse	
Refrigerant control device				LEV	
Refrigerant piping diameter	Liquid (Flare)		mm (in.)	ø9.52 (ø3/8)	
	Gas (Flare)		mm (in.)	ø15.88 (ø5/8)	
Field drain pipe diameter			mm (in.)	I.D.16 (5/8)	
Optional parts	DRAIN PUMP KIT			PAC-SL48DM-E	
	EXTERNAL LEV BOX			PAC-SG95LE-E	-

Notes:

*1 Nominal cooling conditions (subject to JIS B8615-1) Indoor : 27°CD.B./19°CW.B. (81°FD.B./66°FW.B.), Outdoor 35°CD.B. (95°FD.B.) Pipe length : 7.5 m (24-9/16 ft.), Level difference : 0 m (0 ft.)
*2 Nominal heating conditions (subject to JIS B8615-1) Indoor : 20°CD.B. (68°FD.B.), Outdoor 7°CD.B./6°CW.B (45°FD.B./43°FW.B.) Pipe length : 7.5 m (24-9/16 ft.), Level difference : 0 m (0 ft.)

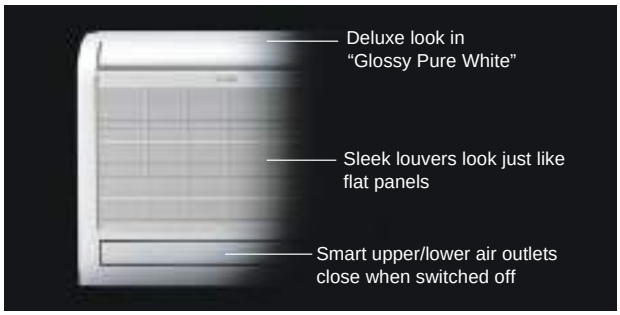
PFFY-P VKM-E2





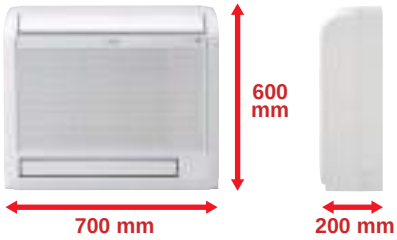
Sophisticated Design

An innovative floor-standing air-conditioner from Mitsubishi Electric. A pleasing mix of streamlined form and diversified function. Engineered to keep room walls free, provide comfortable cooling in summer, and toasty heating in the winter.
The “Glossy Pure White” color ensures a deluxe look, a perfect match for any room. Both upper and lower air outlets remain closed when switched off, a smart and striking image.
A superb new air-conditioner from Mitsubishi Electric, providing a handsome fit for your own distinctive interior.



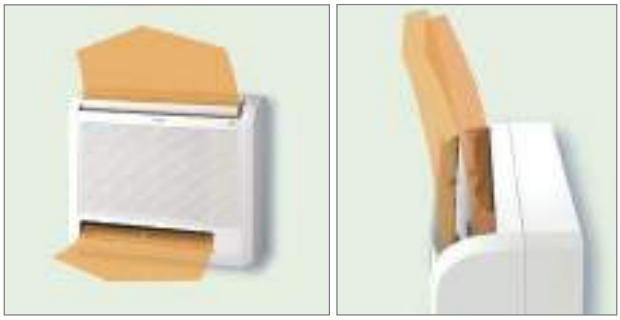
Slim yet Mighty

The unit’s body is slim and trim, highlighting its compact essence. An ideal size for living rooms, bedrooms, and more.
The removable and washable front panel makes cleaning a snap. Easy, regular cleaning helps your air-conditioner stay beautiful while maintaining its energy-efficient operation.

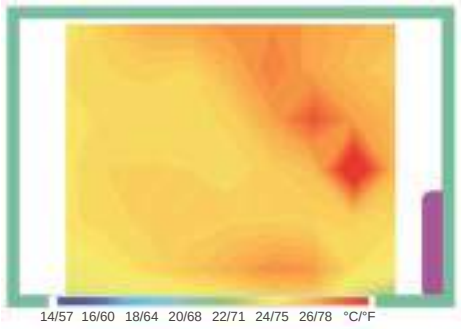


Optimum Air Distribution

Comfy room temperatures are accomplished through optimum, powerful and efficient air distribution through the upper and lower air outlets.
The upper vane angle is remote controllable, with 5 air flow direction levels (+Swing and Auto modes) and 4 wind power levels (+Auto mode).
By setting the vane angle almost vertical, bothersome direct wind can be avoided for increased comfort.



The air from both the upper and lower air outlets is optimally controlled and distributed evenly to every corner of the room. In heating mode, the warm air is smartly controlled to stay at the floor level: Say goodbye to chilly feet!



Specifications

Model				PFFY-P20VKM-E2	PFFY-P25VKM-E2	PFFY-P32VKM-E2	PFFY-P40VKM-E2
Power source				1-phase 220-240V 50Hz			
Cooling capacity		*1	kW	2.2	2.8	3.6	4.5
		*1	BTU/h	7,500	9,600	12,300	15,400
Heating capacity		*1	kW	2.5	3.2	4.0	5.0
		*1	BTU/h	8,500	10,900	13,600	17,100
Power consumption	Cooling		kW	0.025	0.025	0.025	0.028
	Heating		kW	0.025	0.025	0.025	0.028
Current	Cooling		A	0.20	0.20	0.20	0.24
	Heating		A	0.20	0.20	0.20	0.24
External finish				Plastic (Pure white)			
Dimension H x W x D			mm	600 x 700 x 200			
			in.	23-5/8 x 27-9/16 x 7-7/8			
Net weight			kg (lbs.)	15 (34)			
Heat exchanger				Cross fin (Alminium plate fin and copper tube)			
Fan	Type x Quantity			Line flow fan x 2			
	Airflow rate (Lo-Mid-Hi-SHi)	*2	m^3/min	5.9-6.8-7.6-8.7	6.1-7.0-8.0-9.1	6.1-7.0-8.0-9.1	8.0-9.0-9.5-10.7
	External static pressure		Pa	0			
Motor	Type			DC motor			
	Output		kW	0.03 x 2			
Air filter				PP honeycomb fabric (Catechin Filter)			
Refrigerant pipe diameter	Gas (Flare)		mm (in.)	ø12.7 (ø1/2)			
	Liquid (Flare)		mm (in.)	ø6.35 (ø1/4)			
Field drain pipe diameter			mm (in.)	I.D.16 (5/8)			
Sound pressure level (Lo-Mid-Hi-SHi)		*2	dB (A)	27-31-34-37	28-32-35-38	28-32-35-38	35-38-42-44

Notes:

*1 Cooling/heating capacity indicates the maximum value at operation under the following condition.
Cooling Indoor : 27°C(81°F)DB/19°C(66°F)WB, Outdoor : 35°C(95°F)DB
Heating Indoor : 20°C(68°F)DB, Outdoor : 7°C(45°F)DB/6°C(43°F)WB
*2 Airflow rate/Sound pressure level are in (low-middle-high-shigh).
*3 It is measured in anechoic room.

PFFY-P VEM-E





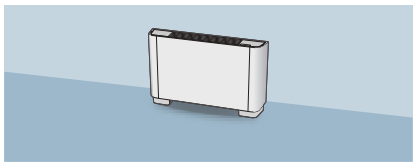
New design

The new sophisticated design in clear white and pearl grey blends in with any interior.
Having a depth of merely 217 mm [8-9/16 in.], the compact unit is ideal for installation around the perimeter of a room.
Three installation options are available to suit a wide range of applications.



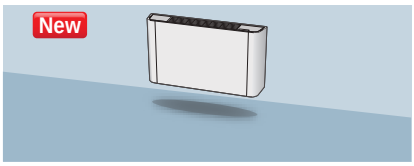
Three installation options

Floorstanding



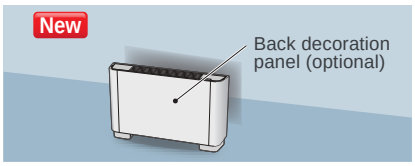
Conventional floorstanding installation is possible.

Wall-mounted



Wall-mounted installation allows for a stylish interior design.

Freestanding



With the optional back decoration panel, the unit can be installed away from the wall for more design flexibility.

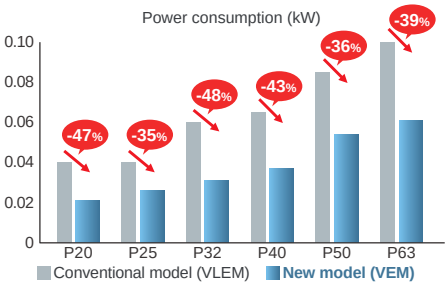
*The legs are not attached to the unit at the time of shipment from the factory. They need to be attached when installing the unit on the floor.

Reduced power consumption and noise

The PFFY-P VEM-E features new components and an optimized structure for more efficient and comfortable operation.

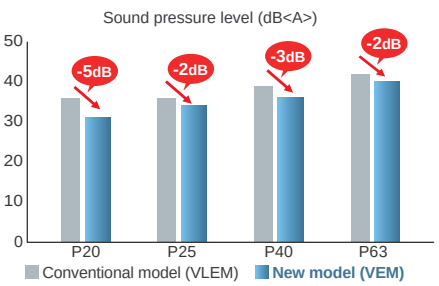
- The unit is equipped with a high-efficiency DC fan motor.
- The inner pipes of the heat exchanger have been downsized from ø9.52 to ø7.0 to fit in more pipings.
- The new structure realizes smooth airflow and reduces pressure loss in the air pathway.

Reduced power consumption



*Measurement conditions (Power source: AC220-240V/50Hz, Fan speed: High)
The unit consumes the same amount of power in both cooling and heating modes.

Reduced noise



*Measurement conditions (Measured point: 1.5m×1.5m, Power source: AC230V/50Hz)
Sound pressure level as measured in an anechoic room.

Flexible airflow setting

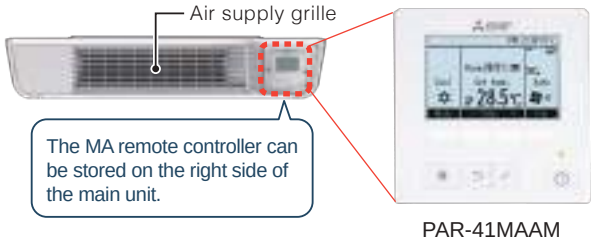
Airflow can be set to three levels to suit various installation conditions and maintain a comfortable room temperature.

Airflow setting

	Model	Airflow
New	PFFY-P VEM	Low-Mid-High*
Conventional	PFFY-P VLEM	Low-High

* The airflow setting has been increased from two levels to three levels.

Remote controller storage in the main unit

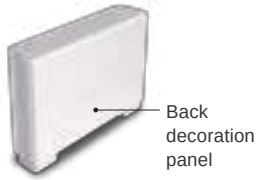


PAR-41MAAM

Optional parts

Description	Model	Remarks
Back decoration panel*	PAC-BP32VEM-E	For PFFY-P20, 25, 32VEM-E
	PAC-BP50VEM-E	For PFFY-P40, 50VEM-E
	PAC-BP63VEM-E	For PFFY-P63VEM-E

* The back decoration panel is required for freestanding installation. When it is attached to the main unit, the pipes must run under the floor. Refer to the Installation Manual for details.



Specifications

Model				PFFY-P20VEM-E	PFFY-P25VEM-E	PFFY-P32VEM-E	PFFY-P40VEM-E	PFFY-P50VEM-E	PFFY-P63VEM-E
Power source				1-phase 220-230-240 V 50/60 Hz					
Cooling capacity (Nominal)		*1	kW	2.2	2.8	3.6	4.5	5.6	7.1
		*1	BTU/h	7,500	9,600	12,300	15,400	19,100	24,200
	Power input		kW	0.021	0.026	0.031	0.037	0.054	0.061
	Current input		A	0.26-0.25-0.24	0.31-0.30-0.29	0.37-0.35-0.34	0.39-0.38-0.36	0.58-0.56-0.55	0.52-0.50-0.48
Heating capacity (Nominal)		*2	kW	2.5	3.2	4.0	5.0	6.3	8.0
		*2	BTU/h	8,500	10,900	13,600	17,100	21,500	27,300
	Power input		kW	0.021	0.026	0.031	0.037	0.054	0.061
	Current input		A	0.26-0.25-0.24	0.31-0.30-0.29	0.37-0.35-0.34	0.39-0.38-0.36	0.58-0.56-0.55	0.52-0.50-0.48
External finish				Galvanized steel plate, MUNSELL (1.0Y 9.2/0.2)/ABS, MUNSELL (5.32GY 8.75/0.37)					
External dimension H x W x D			mm	669 (726) x 1,142 x 217	669 (726) x 1,142 x 217	669 (726) x 1,142 x 217	669 (726) x 1,342 x 217	669 (726) x 1,342 x 217	669 (726) x 1,542 x 217
		*3	in.	26-3/8 (28-5/8) x 45 x 8-9/16	26-3/8 (28-5/8) x 45 x 8-9/16	26-3/8 (28-5/8) x 45 x 8-9/16	26-3/8 (28-5/8) x 52-7/8 x 8-9/16	26-3/8 (28-5/8) x 52-7/8 x 8-9/16	26-3/8 (28-5/8) x 60-3/4 x 8-9/16
Net weight			kg (lbs.)	29.5 (67)	29.5 (67)	30 (67)	35 (78)	35 (78)	39.5 (89)
Heat exchanger				Cross fin (Aluminum fin and copper tube)					
FAN	Type x Quantity			Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 3	Sirocco fan x 3	Sirocco fan x 4
	External static press.		Pa	0					
			mmH_2O	0.0					
	Motor Type			DC motor					
	Motor output		kW	0.096					
	Driving mechanism			Direct-driven by motor					
	Air flow rate			(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)
			m^3/min	5.0 - 6.0 - 7.0	5.5 - 6.5 - 8.0	5.5 - 7.0 - 8.5	8.0 - 9.5 - 11.0	10.0 - 11.5 - 13.5	12.0 - 14.0 - 16.5
			L/s	83 - 100 - 117	92 - 108 - 133	92 - 117 - 142	133 - 158 - 183	167 - 192 - 225	200 - 233 - 275
			cfm	177 - 212 - 247	194 - 230 - 282	194 - 247 - 300	282 - 335 - 388	353 - 406 - 477	424 - 494 - 583
Sound pressure level				(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)	(Low-Mid-High)
(measured in anechoic room)			dB <A>	23.0-27.0-31.0	25.0-29.0-34.0	25.0-31.0-36.0	29.0-33.0-36.0	34.0-37.0-41.0	32.0-36.0-40.0
Air filter				PP honeycomb fabric.					
Refrigerant piping diameter	Liquid (R410A)		mm (in.)	6.35 (1/4) Brazed	6.35 (1/4) Brazed	6.35 (1/4) Brazed	6.35 (1/4) Brazed	6.35 (1/4) Brazed	9.52 (3/8) Brazed
	Gas (R410A)		mm (in.)	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed
Field drain pipe size			mm (in.)	O.D.32 (1-1/4)					
Optional parts	Back decoration panel			PAC-BP32VEM-E	PAC-BP32VEM-E	PAC-BP32VEM-E	PAC-BP50VEM-E	PAC-BP50VEM-E	PAC-BP63VEM-E

Notes:

*1. Nominal cooling conditions
Indoor: 27° CD.B./19° CW.B. (81° FD.B./66° FW.B.), Outdoor: 35° CD.B. (95° FD.B.), Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)
*2. Nominal heating conditions
Indoor: 20° CD.B. (68° FD.B.), Outdoor: 7° CD.B./6° CW.B. (45° FD.B./43° FW.B.), Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)
*3. The values in () show the height of unit with leg.
* Details on foundation work, duct work, insulation work, electrical wiring, power source switch, and other items shall be referred to the Installation Manual.
* Due to continuing improvement, above specifications may be subject to change without notice.

Floor standing concealed type

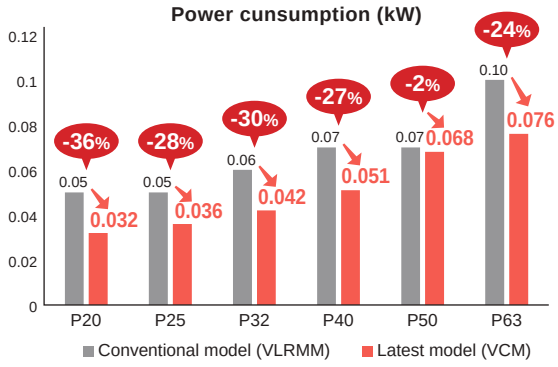
PFFY-P VCM-E



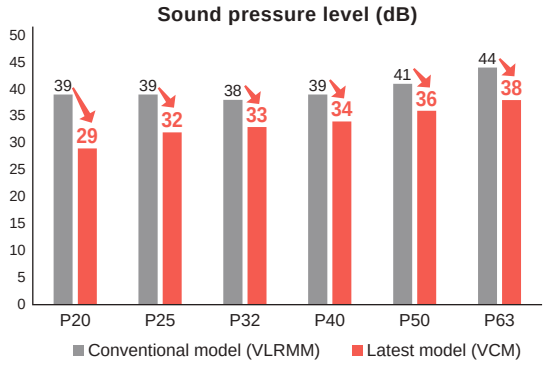


Reduced power consumption and noise

The structure realizes smooth airflow to reduce pressure loss in the air pathway. Additionally, the inner pipes of its heat exchanger have been downsized from ø9.52 to ø7.0 to contain a larger number of pipings.
The combination of the structure and components contributes to reducing power consumption and operation noise.



* Measurement condition (External static pressure: 40Pa Fan speed: High)
* The unit consumes the same power in both cooling and heating modes.

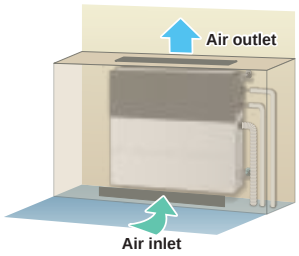


* Measurement condition (External static pressure: 40Pa Fan speed: High)
* The sound pressure level in operation is measured at 1.5 m apart from the front side and bottom side of the unit in anechoic room.

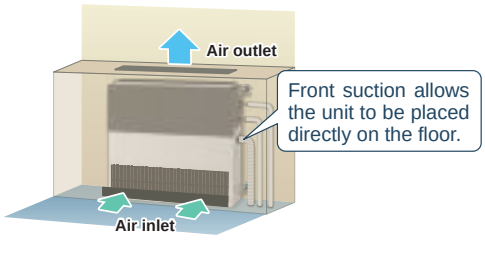
Flexible installation pattern ideal for perimeter zone air conditioning

Air inlet can be selected from two patterns, bottom suction or front suction, by changing the panel, fan guard and filter.

• **Bottom suction*1**

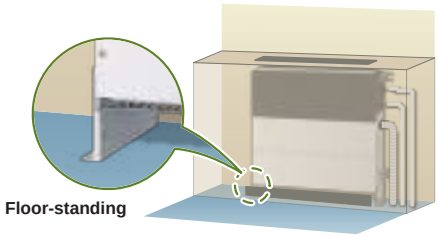


• **Front suction*2**



• **Floor standing with legs**

The unit can be placed on the floor with the supplied legs attached.



* Height of unit (with legs) is 690 mm.

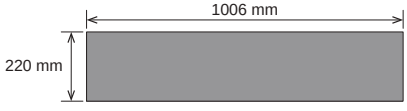
*1 Select a site where the flow of supply air is not blocked. The unit cannot be placed directly on the floor in the case of bottom suction.

*2 Front suction makes more noise than bottom suction. Bottom suction is recommended when installing the unit in rooms that need to be quiet, such as bedrooms.

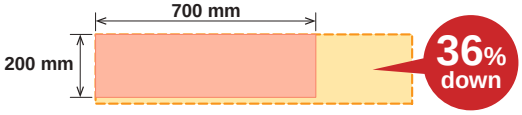
Smaller footprint

The latest model (P32) has a 36% smaller footprint compared to the PFFY-VLRMM, owing to a redesigning of the positions of the inner components.

Conventional model (P32)



Latest model (P32)



Flexible airflow and external static pressure setting

Airflow rate and external static pressure can be selected to suit various installation conditions.

	Conventional		Latest
Model Name	PFFY-P VLRM	PFFY-P VLRMM	PFFY-P VCM
Airflow rate	Low-High	Low-Mid-High	Low-Mid-High
External static pressure(Pa)	0	20-40-60	0-10-40-60

Specifications

Model				PFFY-P20VCM-E	PFFY-P25VCM-E	PFFY-P32VCM-E
Power source				1-phase 220-230-240 V 50/60 Hz		
Cooling capacity (Nominal)	*1		kW	2.2	2.8	3.6
	*1		BTU/h	7,500	9,600	12,300
	*2	Power input	kW	0.022	0.026	0.031
	*2	Current input	A	0.25	0.30	0.34
Heating capacity (Nominal)	*3		kW	2.5	3.2	4.0
	*3		BTU/h	8,500	10,900	13,600
	*2	Power input	kW	0.022	0.026	0.031
	*2	Current input	A	0.25	0.30	0.34
External finish				Galvanized steel plate	Galvanized steel plate	Galvanized steel plate
External dimension H x W x D	*4		mm	615 (690) x 700 x 200	615 (690) x 700 x 200	615 (690) x 700 x 200
			in.	24-1/4 (27-3/16) x 27-9/16 x 7-7/8	24-1/4 (27-3/16) x 27-9/16 x 7-7/8	24-1/4 (27-3/16) x 27-9/16 x 7-7/8
Net weight			kg (lbs)	18 (40)	18 (40)	18.5 (42)
Heat exchanger				Cross fin (Aluminum fin and copper tube)		
FAN	Type x Quantity			Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 2
	*5 External static press.		Pa	<0> - 10 - <40> - <60>	<0> - 10 - <40> - <60>	<0> - 10 - <40> - <60>
			mmH_2O	<0.0> - 1.0 - <4.1> - <6.1>	<0.0> - 1.0 - <4.1> - <6.1>	<0.0> - 1.0 - <4.1> - <6.1>
	Motor Type			DC motor	DC motor	DC motor
	Motor output		kW	0.096	0.096	0.096
	Driving mechanism			Direct-driven by motor	Direct-driven by motor	Direct-driven by motor
	Air flow rate			(Low-Mid-High)		
			m^3/min	5.0 - 6.0 - 7.0	5.5 - 6.5 - 8.0	5.5 - 7.0 - 8.5
			L/s	83 - 100 - 117	92 - 108 - 133	92 - 117 - 142
			cfm	177 - 212 - 247	194 - 230 - 282	194 - 247 - 300
Sound pressure level (measured in anechoic room)			*2 dB<A>	(Low-Mid-High)		
				21-23-26	22-25-29	23-26-30
Air filter				PP honeycomb fabric.	PP honeycomb fabric.	PP honeycomb fabric.
Refrigerant piping diameter	Liquid (410A)		mm (in.)	6.35 (1/4)Brazed	6.35 (1/4)Brazed	6.35 (1/4)Brazed
	Gas (410A)		mm (in.)	12.7 (1/2)Brazed	12.7 (1/2)Brazed	12.7 (1/2)Brazed
Field drain pipe size			mm (in.)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)

Model				PFFY-P40VCM-E	PFFY-P50VCM-E	PFFY-P63VCM-E
Power source				1-phase 220-230-240 V 50/60 Hz		
Cooling capacity (Nominal)	*1		kW	4.5	5.6	7.1
	*1		BTU/h	15,400	19,100	24,200
	*2	Power input	kW	0.038	0.052	0.058
	*2	Current input	A	0.38	0.50	0.49
Heating capacity (Nominal)	*3		kW	5.0	6.3	8.0
	*3		BTU/h	17,100	21,500	27,300
	*2	Power input	kW	0.038	0.052	0.058
	*2	Current input	A	0.38	0.50	0.49
External finish				Galvanized steel plate	Galvanized steel plate	Galvanized steel plate
External dimension H x W x D	*4		mm	615 (690) x 900 x 200	615 (690) x 900 x 200	615 (690) x 1,100 x 200
			in.	24-1/4 (27-3/16) x 35-7/16 x 7-7/8	24-1/4 (27-3/16) x 35-7/16 x 7-7/8	24-1/4 (27-3/16) x 43-5/16 x 7-7/8
Net weight			kg (lbs)	22.5 (51)	22.5 (51)	25.5 (58)
Heat exchanger				Cross fin (Aluminum fin and copper tube)		
FAN	Type x Quantity			Sirocco fan x 3	Sirocco fan x 3	Sirocco fan x 4
	*5 External static press.		Pa	<0> - 10 - <40> - <60>	<0> - 10 - <40> - <60>	<0> - 10 - <40> - <60>
			mmH_2O	<0.0> - 1.0 - <4.1> - <6.1>	<0.0> - 1.0 - <4.1> - <6.1>	<0.0> - 1.0 - <4.1> - <6.1>
	Motor Type			DC motor	DC motor	DC motor
	Motor output		kW	0.096	0.096	0.096
	Driving mechanism			Direct-driven by motor	Direct-driven by motor	Direct-driven by motor
	Air flow rate			(Low-Mid-High)		
			m^3/min	8.0 - 9.5 - 11.0	10.0 - 11.5 - 13.5	12.0 - 14.0 - 16.5
			L/s	133 - 158 - 183	167 - 192 - 225	200 - 233 - 275
			cfm	282 - 335 - 388	353 - 406 - 477	424 - 494 - 583
Sound pressure level (measured in anechoic room)			*2 dB<A>	(Low-Mid-High)		
				25-27-30	28-31-34	28-32-35
Air filter				PP honeycomb fabric.	PP honeycomb fabric.	PP honeycomb fabric.
Refrigerant piping diameter	Liquid (410A)		mm (in.)	6.35 (1/4)Brazed	6.35 (1/4)Brazed	9.52 (3/8)Brazed
	Gas (410A)		mm (in.)	12.7 (1/2)Brazed	12.7 (1/2)Brazed	15.88 (5/8)Brazed
Field drain pipe size			mm (in.)	O.D.32 (1-1/4)	O.D.32 (1-1/4)	O.D.32 (1-1/4)

Notes:

*1. Nominal cooling conditions
Indoor: 27°CD.B./19°CW.B. (81°FD.B./66°FW.B.), Outdoor: 35°CD.B. (95°FD.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)
*2. The values are measured at the factory setting of external static pressure.
*3. Nominal heating conditions
Indoor: 20°CD.B. (68°FD.B.), Outdoor: 7°CD.B./6°CW.B. (45°FD.B./43°FW.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)
*4. The values in ( ) show the height of unit with leg.
*5. The factory setting of external static pressure is shown without < >.
Refer to "Fan characteristics curves", according to the external static pressure, in DATA BOOK for the usable range of air flow rate.
*Details on foundation work, duct work, insulation work, electrical wiring, power source switch, and other items shall be referred to the Installation Manual.
*Due to continuing improvement, above specifications may be subject to change without notice.

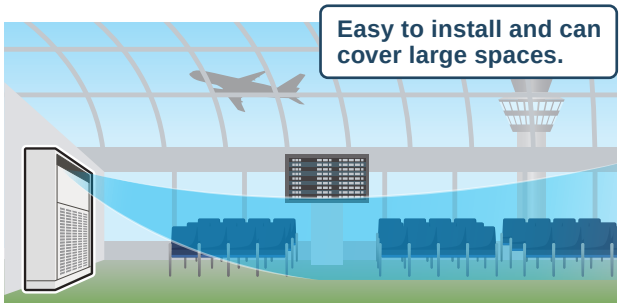
Floor standing exposed type



PFFY-P YM-E
PFFY-P YMH-E





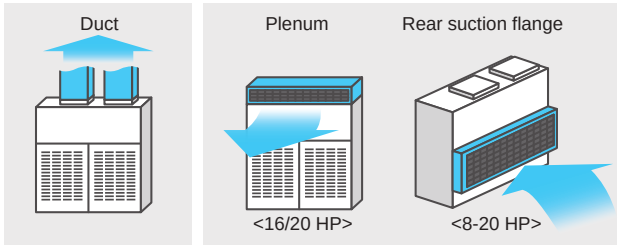


Reduces installation and maintenance time

This series is a floor-standing, large capacity, indoor unit, which reduces the piping and installation burdens, and makes maintenance easy.

Increased adaptation to local needs

In addition to the standard duct blowing, both plenum blowing and rear suction are optionally selectable.



Wide ranges of airflow rate and static pressure options are available to suit a greater variety of needs

		Air flow rate (m³/min [ft.³/min])	Static pressure (Pa)
		High, 50/60 Hz	380 V, 50/60 Hz
PFFY-P200YM-E	8 HP	65.0/69.0 [2300/2430]	0
PFFY-P250YM-E	10 HP	77.0/72.0 [2720/2540]	0
PFFY-P200YMH-E*	8 HP	65.0 [2300]	180/200
PFFY-P250YMH-E*	10 HP	72.0 [2540]	180/210
PFFY-P400YM-E	16 HP	150.0 [5300]	210/390
PFFY-P500YM-E	20 HP	200.0 [7060]	290/510

*High static pressure model

Pulley belt option

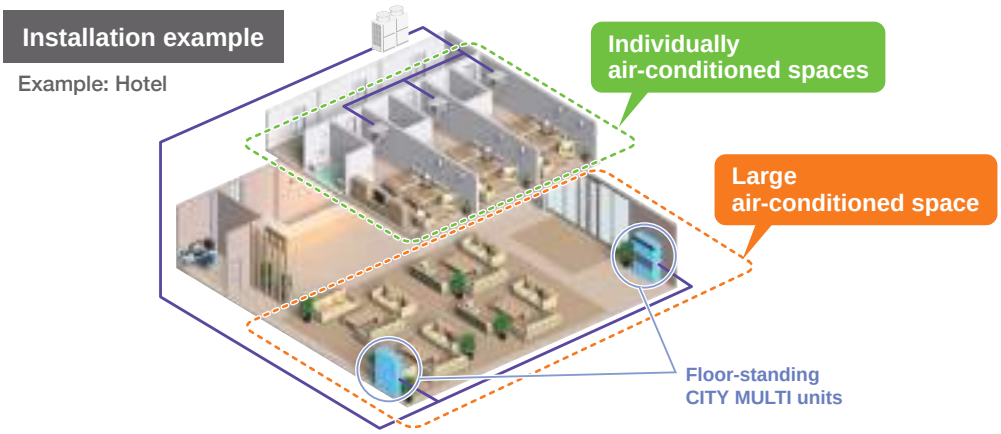
This option supports the use of wider ranges of airflow rates and static pressures to suit a greater variety of needs.

Both large-scale and individual air conditioning can be performed

When this model is used in a large space and CITY MULTI indoor units are used in individual rooms, one outdoor unit can control the air conditioners in these rooms of various sizes.

Multiple units can be connected to one outdoor unit

Multiple units of this model can be connected to one outdoor unit. Air can be spread throughout a large room.



Optional Parts

Description	Model	Applicable capacity
OA duct flange	PAC-ODF10DF-E	P200, 250
	PAC-ODF20DF-E	P400, 500
Plenum	PAC-PLE20PL-E1	P400, 500

Specifications

Model				PFFY-P200YM-E	PFFY-P250YM-E	PFFY-P200YMH-E	PFFY-P250YMH-E	PFFY-P400YM-E	PFFY-P500YM-E
Power source				3-phase 4-wire 380-400-415 V 50/60 Hz					
Cooling capacity (Nominal)	*1		kW	22.4	28.0	22.4	28.0	45.0	56.0
	*1		BTU/h	76,400	95,500	76,400	95,500	153,500	191,100
*2	Power input		kW	0.490/0.680	1.05/1.26	1.00/1.41	1.31/1.41	2.86/3.79	3.94/5.30
*2	Current input (380-400-415 V)		A	0.97-0.98-0.99/ 1.24-1.23-1.22	1.74-1.83-1.88/ 2.06-2.05-2.04	1.82-1.85-1.87/ 2.37-2.37-2.37	2.14-2.18-2.20/ 2.18-2.18-2.18	5.23-5.25-5.33/ 6.16-6.18-6.26	7.66-7.68-7.76/ 8.49-8.51-8.58
Heating capacity (Nominal)	*3		kW	25.0	31.5	25.0	31.5	50.0	63.0
	*3		BTU/h	85,300	107,500	85,300	107,500	170,600	215,000
*2	Power input		kW	0.490/0.680	1.05/1.26	1.00/1.41	1.31/1.41	2.86/3.79	3.94/5.30
*2	Current input (380-400-415 V)		A	0.97-0.98-0.99/ 1.24-1.23-1.22	1.74-1.83-1.88/ 2.06-2.05-2.04	1.82-1.85-1.87/ 2.37-2.37-2.37	2.14-2.18-2.20/ 2.18-2.18-2.18	5.23-5.25-5.33/ 6.16-6.18-6.26	7.66-7.68-7.76/ 8.49-8.51-8.58
External finish				Galvanized steel plate (with polyester coating) <MUNSELL 3.0Y 7.8/1.1 or similar>					
External dimension H x W x D			mm	1,665 x 1,200 x 500	1,665 x 1,200 x 500	1,465 x 1,200 x 500	1,465 x 1,200 x 500	1,800 x 1,860 x 650	1,800 x 1,860 x 650
			in.	65-9/16 x 47-1/4 x 19-11/16	65-9/16 x 47-1/4 x 19-11/16	57-11/16 x 47-1/4 x 19-11/16	57-11/16 x 47-1/4 x 19-11/16	70-7/8 x 73-1/4 x 25-5/8	70-7/8 x 73-1/4 x 25-5/8
Net weight			kg (lbs)	157 (347)	158 (349)	138 (305)	139 (307)	310 (684)	362 (799)
Heat exchanger				Cross fin (Aluminum fin and copper tube)					
Fan	Type x Quantity			Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 2	Sirocco fan x 2
	External static press. (380 V)		Pa	0	0	180/200	180/210	210/390	290/510
			mmH_2O	0.0	0.0	18.4/20.4	18.4/21.4	21.4/39.8	29.6/52.0
	Motor Type			3-phase induction motor					
	Motor output		kW	0.400	0.500	0.770	0.770	3.700	5.500
	Driving mechanism			Direct-driven by motor				Belt driving	
	Air flow rate			(High-Low)		(High)			
			m^3/min	65.0-59.0/69.0-60.0	77.0-56.0/72.0-50.0	65.0	72.0	150.0	200.0
			L/s	1,083-983/1,150-1,000	1,283-933/1,200-833	1,083	1,200	2,500	3,333
			cfm	2,295-2,083/2,436-2,119	2,719-1,977/2,542-1,766	2,295	2,542	5,297	7,062
Sound pressure level (measured in anechoic room) (380 V)		*2	dB (A)	(High-Low) 58-56/60-56	63-60/62-60	(High) 58/60	60/61	68/69	69/69
Air filter				PP honeycomb fabric.					
Refrigerant piping diameter	Liquid (R410A)		mm (in.)	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	9.52 (3/8) Brazed	12.7 (1/2) Brazed	15.88 (5/8) Brazed
	Gas (R410A)		mm (in.)	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed	28.58 (1-1/8) Brazed
Field drain pipe size			in.	Rc 1	Rc 1	Rc 1	Rc 1	Rc 1-1/4	Rc 1-1/4

Notes:

*1 Nominal cooling conditions
Indoor: 27°CD.B./19°CW.B. (81°FD.B./66°FW.B.), Outdoor: 35°CD.B. (95°FD.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)
*2 The values are measured in fan mode and at the factory setting of external static pressure.
*3 Nominal heating conditions
Indoor: 20°CD.B. (68°FD.B.), Outdoor: 7°CD.B./6°CW.B. (45°FD.B./43°FW.B.)
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)
*4 Long period operation in a high temperature and humidity atmosphere (dew point of 23°C or more) may cause condensation to form in the indoor unit.
*5 In case of this type of unit is connected, the maximum connected indoor unit capacity to one outdoor unit have to be less than or equal to 100%.
*6 This unit cannot be connected to R2 or WR2-Series. (PFFY-P400, P500YM-E only)
*7 This unit cannot be connected to PUMY-Series.

* Details on foundation work, duct work, insulation work, electrical wiring, power source switch, and other items shall be referred to the Installation Manual.
* Due to continuing improvement, above specifications may be subject to change without notice.

Floor standing exposed type

PFFY-P YM-E-F

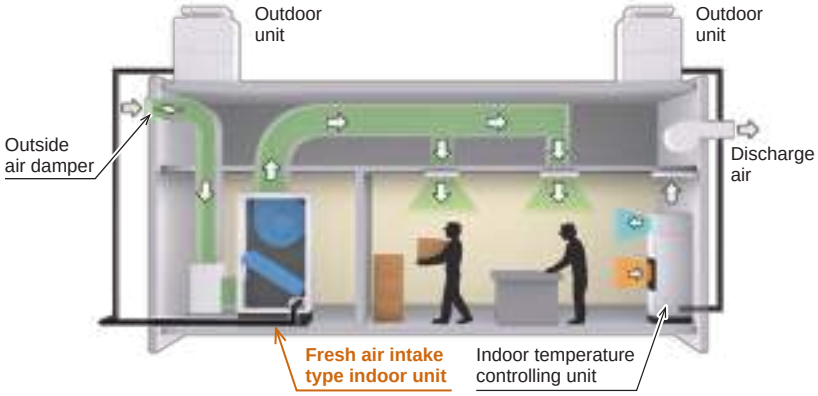




Enable intake of outside air

This model can take in the outside air, it delivers fresh air to indoors and improves comfort even in places where much ventilation is required, such as factories.

*This product is for use in occupant spaces and not suitable for use in spaces requiring stringent thermostatic control.
*Fresh air intake type is designed to supply conditioned outside air into the room. Do not use to handle internal thermal load.



*Please prepare dampers, ducts, and grilles locally in the field.

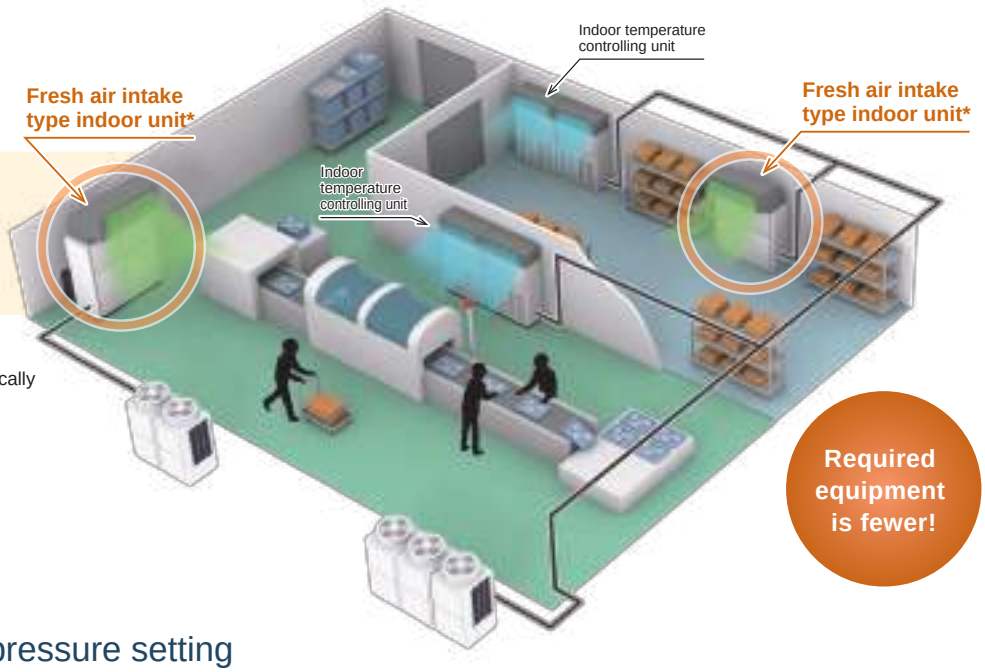
Usable in combination with CITY MULTI indoor units

P300 is usable in combination with the CITY MULTI indoor units in a single refrigerant system*.
By installing an outdoor unit and indoor units that match the size of each room, it is possible to achieve individual air conditioning and intaking fresh air.

*When fresh air intake type indoor units connect to an outdoor unit together with other types of indoor unit, the total capacity of fresh air intake type indoor units needs to be 30% or less of the connected outdoor unit capacity. Please refer to NOTEs of specification regarding the details.

Installation example

Example: Factory



Suitable for use to require outside air intake

Example: Factory, Airport, Hall, Restaurant

*Please prepare plenums locally in the field.

Required equipment is fewer!

Air flow rate, external static pressure setting

The airflow rate of this product at High speed is 45 m³/min for the P300 model and 90 m³/min for the P600 model. Two patterns of static pressure setting are selectable, depending on the size and the use of the building.

	Air flow rate (m³/min)	External static pressure
	High	
PFFY-P300YM-E-F	45.0	80 Pa, 140 Pa
PFFY-P600YM-E-F	90.0	120 Pa, 200 Pa

Specifications

Model				PFFY-P300YM-E-F	PFFY-P600YM-E-F
Power source				3-phase 4-wire 380-400-415 V 50/60 Hz	
Cooling capacity (Nominal)		*1	kW	33.5	67.0
		*1	BTU/h	114,300	228,600
	*2	Power input	kW	0.350-0.360-0.370/0.450-0.450-0.470	0.790-0.810-0.860/0.960-0.960-0.980
	*2	Current input	A	0.86-0.88-0.91/0.92-0.93-0.91	2.76-3.03-3.46/2.38-2.39-2.52
Temp. range of cooling				21°C D.B./15.5°C W.B. ~ 43°C D.B./35°C W.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is lower than 21°C D.B.	
Heating capacity (Nominal)		*3	kW	28.0	56.0
		*3	BTU/h	95,500	191,100
	*2	Power input	kW	0.350-0.360-0.370/0.450-0.450-0.470	0.790-0.810-0.860/0.960-0.960-0.980
	*2	Current input	A	0.86-0.88-0.91/0.92-0.93-0.91	2.76-3.03-3.46/2.38-2.39-2.52
Temp. range of heating				0°C D.B. ~ 20°C D.B. * Thermo-off (FAN-mode) automatically starts if the outdoor temperature is higher than 20°C D.B.	
External finish				Galvanized steel plate (with polyester coating) <MUNSELL 3.0Y 7.8/1.1 or similar>	
External dimension H x W x D			mm	1,465 x 1,200 x 500	1,805 x 1,860 x 710
			in.	57-11/16 x 47-1/4 x 19-11/16	71-1/8 x 73-1/4 x 28
Net weight			kg (lbs)	146 (322)	357 (788)
Heat exchanger				Cross fin (Aluminum fin and copper tube)	Cross fin (Aluminum fin and copper tube)
Fan	Type x Quantity			Sirocco fan x 2	Sirocco fan x 2
	External static press.		Pa	80/140	120/200
			mmH_2O	8.2/14.3	12.2/20.4
	Motor Type			3-phase induction motor	3-phase induction motor
	Motor output		kW	0.400	2.200
	Driving mechanism			Direct-driven by motor	Belt driving
	Air flow rate			(High)	(High)
			m^3/min	45.0	90.0
			L/s	750	1,500
			cfm	1,589	3,178
Sound pressure level (measured in anechoic room)				(High)	(High)
			*2 dB (A)	48.5/48.5	54.0/56.0
Air filter				PP honeycomb fabric 1012 × 720 Dust collection efficiency (Weight Method) 17%	PP honeycomb fabric 894 x 612 x 2 Dust collection efficiency (Weight Method) 17%
Refrigerant piping diameter	Liquid (R410A)		mm (in.)	9.52 (3/8) Brazed	15.88 (5/8) Brazed
	Gas (R410A)		mm (in.)	22.2 (7/8) Brazed	28.58 (1-1/8) Brazed
Field drain pipe size			in.	Rc 1	Rc 1-1/4

Notes:

*1 Nominal cooling conditions
Indoor: 33°C D.B./28°C W.B., Outdoor: 33°C D.B.
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)
*2 The values are measured in fan mode and at the factory setting of external static pressure.
*3 Nominal heating conditions
Indoor: 7°C D.B., Outdoor: 7°C D.B./3°C W.B.
Pipe length: 7.5 m (24-9/16 ft.), Level difference: 0 m (0 ft.)

- Long period operation in a high temperature and humidity atmosphere (dew point of 23°C or more) may cause condensation to form in the indoor unit.
- This unit cannot be connected to PUMY, R2 and WR2 series.
- Fresh air intake type indoor units cannot be connected to an outdoor unit together with PWFY series.
- When this fresh air intake type indoor unit is included in the system, the upper limit of connectable indoor unit capacity range is 100% of the connected outdoor unit capacity.
- When fresh air intake type indoor units connect to an outdoor unit together with other types of indoor unit, the total capacity of fresh air intake type indoor units needs to be 30% or less of the connected outdoor unit capacity.
- The actual capacity characteristics vary with the combination of indoor and outdoor units.
  See the technical information in DATA BOOK for the details.
- Thermo off (Fan) operation automatically starts either when temperature is lower than 21°C D.B. in cooling mode or when the temperature exceeds 20°C D.B. in heating mode.
- Dry mode is not available.
- When this unit is used as sole A/C system, be careful about the dew in air outlet grilles in cooling mode.
- Un-conditioned outdoor air such as humid air or cold air blows to the indoor during thermo off operation, which may occur dew condensation on the grills and ducts. Please insulate the grills, ducts, and rooms to prevent dew condensation properly.
- Air filter must be installed in the air intake side. The filter should be attached where easy maintenance is possible in case of usage of field supply filters.
- Fresh air intake type indoor unit is designed to supply pretreated outside air into the room.
  Do not use to handle internal thermal load.
- Depending on the air conditioning load, outside temperature, and due to the activation of protection functions, the desired preset temperature may not always be achieved and the outlet air temperature may swing.
  Note that untreated outside air may be delivered directly into the room upon the activation of protection functions.
- The fan temporary stops during defrost.

* Details on foundation work, duct work, insulation work, electrical wiring, power source switch, and other items shall be referred to the Installation Manual.
* Due to continuing improvement, above specifications may be subject to change without notice.



Remote Controller



Remote controller list

Building Management Zone

Centralized control



*This image shows AE-C400E-X.

NEW

AE-C400E-X/EW-C50E-X with BACnet Interface

For BACnet®



NEW

BACS-AP50E BACnet adapter

For BACnet®

BMS* and CITY MULTI can be connected. This enables control of the entire building and air-conditioning control on the BMS side. *Building management system

Floor Management Zone

System controller



AE-C400E-X NEW

This model, featuring a color LCD screen, can control up to 50 indoors unit when used independently, and up to 400 units can be controlled by connecting additional AE-C400E-X or EW-C50E-X.



EW-C50E-X NEW

This model can control up to 50 indoor units when used independently, or when connected to the AE-C400E-X as an expansion unit.



PAC-YT40ANRA

The power can be turned on and off easily for 50 indoor units in up to 16 groups with this single unit.



AT-50B

This model is suitable for control on each floor. You can control up to 50 indoor units on the color LCD screen.

The air conditioners in each group can be turned on and off, and their modes can be changed. The weekly timer allows them to be turned on automatically before work starts, and off after closing time.

Local remote controller



PAR-41MAAM
(MA remote controller)

The temperature can be set in steps of 0.5°C [1°F] increments, and the air flow direction and error icons are displayed on the screen.



PAR-21MAA
(MA remote controller)

The temperature can be set in steps of 1°C/1°F increments. The button panel can be accessed and closed when the buttons are not used.



PAR-U02MEDA
(ME remote controller)

All elements appear on the LCD screen, which features an occupancy sensor. All conditions including grouping can be set on this one controller.



PAC-YT52CRA
(MA remote controller)

A simple remote controller dedicated to setting the temperature and fan speed



PAR-CT01MAA-S
(MA remote controller)

All elements appear on the LCD screen. The background and character colors can be selected.



PAR-SL101A-E
(MA Wireless remote controller)

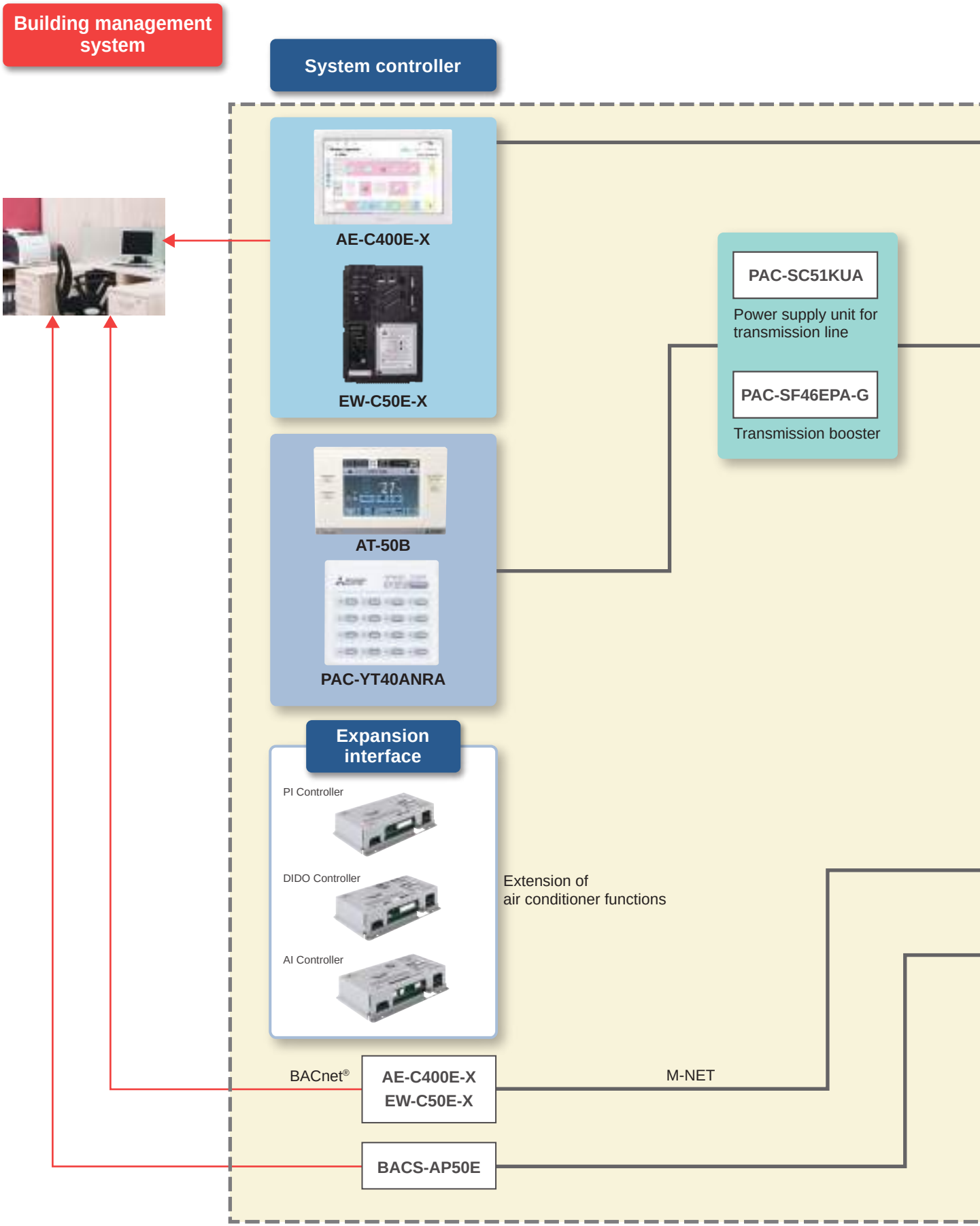
* Connected only to PLFY-P VHM-PA / PLFY-P VFM-E1/PKFY-P VLM-E
* Requires wireless signal receiving unit



PAR-FL32MA
(MA Wireless remote controller)

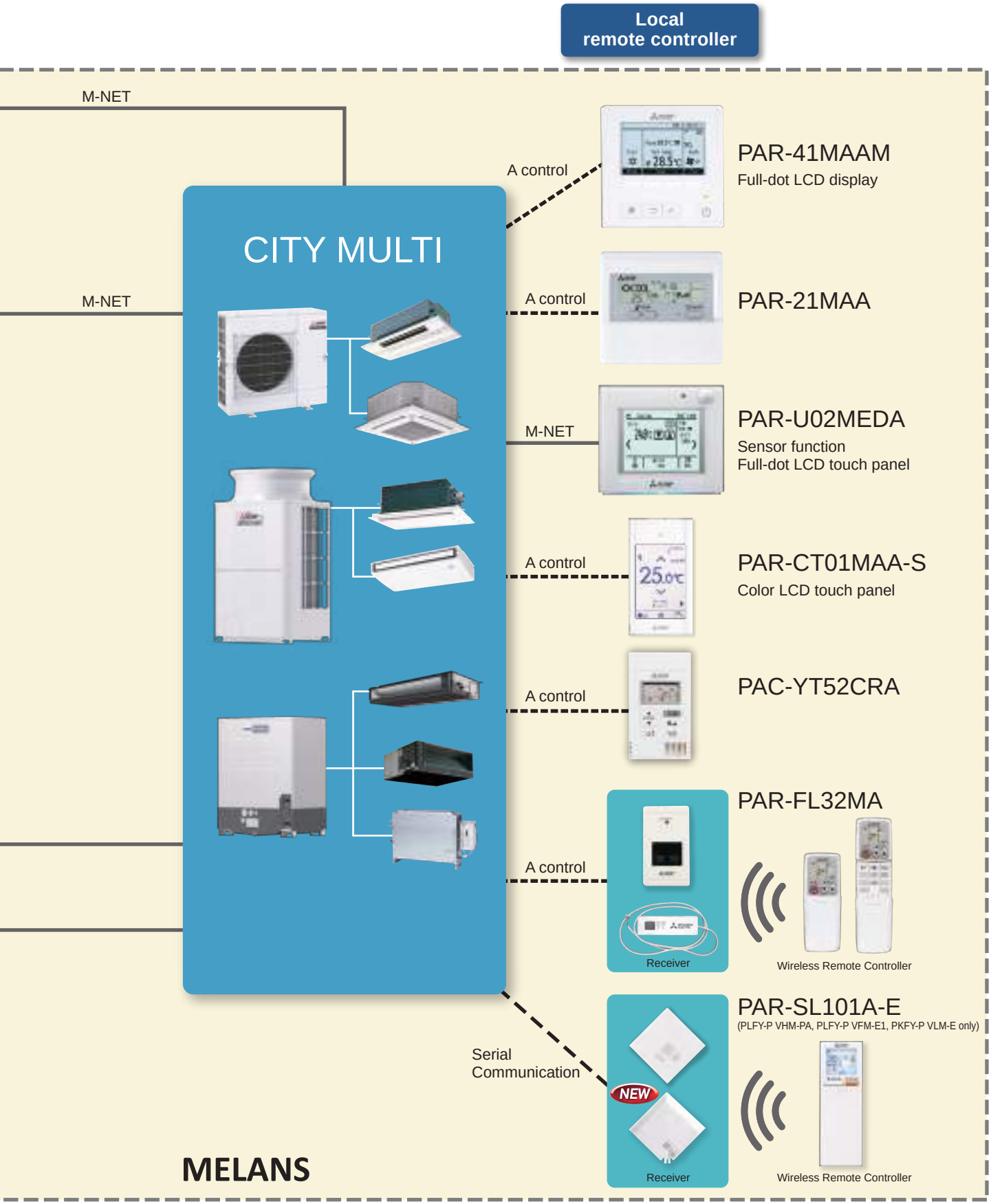
* Requires wireless signal receiving unit

A suitable remote controller can be selected to control the air conditioners in each room according to each use situation.



M-NET

Using our MELANS products enhances air-conditioning EFFICIENCY and QUALITY, contributing to ENERGY SAVINGS and reducing running cost. We offer a wide variety of MELANS products to meet requirements - from the smallest and simplest, to the largest and most complex. We have individual remote controllers, various centralized controllers, BMS interface, etc.


Local
remote controller
M-NET
M-NET
CITY MULTI
A control
PAR-41MAAM
Full-dot LCD display
A control
PAR-21MAA
M-NET
PAR-U02MEDA
Sensor function
Full-dot LCD touch panel
A control
PAR-CT01MAA-S
Color LCD touch panel
A control
PAC-YT52CRA
A control
PAR-FL32MA
Receiver
Wireless Remote Controller
Serial
Communication
NEW
PAR-SL101A-E
(PLFY-P VHM-PA, PLFY-P VFM-E1, PKFY-P VLM-E only)
Receiver
Wireless Remote Controller
MELANS

Integrated Communications Control with Mitsubishi Electric Unique Transmission Network (M-NET)

Model	Local remote controller *7							System controller *7 NEW							
	PAR-41MAAM	PAR-21MAA	PAR-U02MEDA	PAR-CT01MAA-S	PAC-YT52CRA	PAR-FL32MA	PAR-SL101A-E	PAC-YT40ANRA	AT-50B	AE-C400E-X		AE-C400E-X + AE-C / EW-C		EW-C50E-X	
Controllable Groups / Indoors (Group / Indoor) *6	1 / 16	1 / 16	1 / 16	1 / 16	1 / 16	1 / 16	1 / 1	16 / 50	50 / 50	50 / 50		400 / 400		50 / 50	
										AE-C400E-X	Browser	AE-C400E-X	Browser	EW-C50E-X	Browser
■Operation															
ON / OFF	○	○	○	○	○	○	○	◎	◎	◎ ■	◎ ■	◎ ■	◎ ■	▲	◎ ■
Mode (cool / heat / dry / fan)	○	○	○	○	○	○	○	N	◎	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
Temperature setting	○	○	○	○	○	○	○	N	◎	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
Relative temperature display	N	N	N	○	N	N	N	N	N	N	N	N	N	N	N
Dual set point *8	○	N	○	○	○	N	○ *9	○ *10	◎	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
Local Permit / Prohibit	N	N	N	N	N	N	N	N	◎	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
Fan speed	○	○	○	○	○	○	○	N	◎	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
Air flow direction	○	○	○	○	○	○	○	N	◎	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
■Status monitoring															
ON / OFF	○	○	○	○	○	○	○	◎	◎	◎	○	◎	○	▲	○
Mode (cool / heat / dry / fan)	○	○	○	○	○	○	○	N	○	○	○	○	○	N	○
Temperature setting	○	○	○	○	○	○	○	N	○	○	○	○	○	N	○
Local Permit / Prohibit	○	○	○	○	○	N	N	○	○	○	○	○	○	N	○
Fan speed	○	○	○	○	○	○	○	N	○	○	○	○	○	N	○
Air flow direction	○	○	○	○	○	○	○	N	○	○	○	○	○	N	○
Indoor temperature	○	○	○	○	○	N	N	N	○	○	○	○	○	N	○
Filter sign	○	○	○	○	N	N	N	N	◎	○	○	○	○	N	○
Error flashing	○	○	○	○	○	N	N	○	◎	○	○	○	○	▲	○
Error code	○	○	○	○	○	N	N	○	○	○	○	○	○	N	○
Operation hour	N	N	N	N	N	N	N	N	N	N	N	N	N	N	N
■Scheduling															
One day	○	○	○	○	N	N	N	N	○	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
ON / OFF times per day	1	8	1	1	N	1	1	N	16	24	24	24	24	N	24
Weekly	○	○	○	○	N	N	N	N	○	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
ON / OFF times per week	8 x 7	8 x 7	8 x 7	8 x 7	N	N	N	N	16 x 7	24 x 7	24 x 7	24 x 7	24 x 7	N	24 x 7
Annual	N	N	N	N	N	N	N	N	N	◎ ■	◎ ■	◎ ■	◎ ■	N	◎ ■
Optimized start-up	N	N	N	N	N	N	N	N	N	○	○	○	○	N	○
Auto-off timer	○	○	○	○	N	N	N	N	N	N	N	N	N	N	N
Min. timer setting unit (minute)	5	1	5	5	N	10	10	N	5	1	1	1	1	N	1
■Recording															
Error log	○	N	N	○	N	N	N	N	○	○	○	○	○	N	○
Daily / monthly report	N	N	N	N	N	N	N	N	N	N	N	N	N	N	N
Electricity charge	N	N	N	N	N	N	N	N	N	●	●	●	●	●	●
Energy management data	N	N	N	N	N	N	N	N	N	●	●	●	●	N	●

Model	Local remote controller *7							System controller *7 NEW							
	PAR-41MAAM	PAR-21MAA	PAR-U02MEDA	PAR-CT01MAA-S	PAC-YT52CRA	PAR-FL32MA	PAR-SL101A-E	PAC-YT40ANRA	AT-50B	AE-C400E-X		AE-C400E-X + AE-C / EW-C		EW-C50E-X	
Controllable Groups / Indoors (Group / Indoor) *6	1 / 16	1 / 16	1 / 16	1 / 16	1 / 16	1 / 16	1 / 1	16 / 50	50 / 50	50 / 50		400 / 400		50 / 50	
										AE-C400E-X	Browser	AE-C400E-X	Browser	EW-C50E-X	Browser
■Other															
Temp-set limitation by Local R / C	○	○	○	○	○	N	N	N	N	N	N	N	N	N	N
Temp-set limitation by System controller	○*4	○*4	○	○*4	○*4	N	N	N	○*4	N	○*4	N	○*4	N	○*4
Operation lock	○	○	○	○	○	N	N	N	◎	N	N	N	N	N	N
Night setback	○	N	○	○	N	N	N	N	◎	○	○	○	○	N	○
Sliding temperature control	N	N	N	N	N	N	N	N	N	○	○	○	○	N	○
BACnet® connection	N	N	N	N	N	N	N	N	N	●	●	●	●	●	●
■Management (Group / Interlocked)															
Group setting	○*1	○*1	○	○*1	○*1	N	N	○	○	○*2	○*2	○*2	○*2	N	○*2
Block setting	N	N	N	N	N	N	N	N	N	○*2	○*2	○*2	○*2	N	○*2
■Operating on LOSSNAY interlocked (Group / Interlocked)															
ON / OFF	N / ○	N / ○	N / ○	N / ○	N / ○	N / ○*5	N / ○*5	◎ / ◎*3	◎ / ◎	◎ / ◎	◎ / ◎	◎ / ◎	◎ / ◎	◎ / ◎	▲ / ▲	◎ / ◎
Fan speed	N / ○	N / ○	N / ○	N / ○	N	N	N	N	◎ / ◎	◎ / ◎	◎ / ◎	◎ / ◎	◎ / ◎	◎ / ◎	N	◎ / ◎
Ventilation mode	N	N	N	N	N	N	N	N	◎ / N	◎ / N	◎ / N	◎ / N	◎ / N	N	◎ / N
■Status monitoring on LOSSNAY interlocked (Group / Interlocked)															
ON / OFF	N / ○	N / ○	N / ○	N / ○	N / ○	N	N	N	○ / ○	◎ / ◎	◎ / ◎	◎ / ◎	◎ / ◎	▲ / ▲	◎ / ◎
Fan speed	N / ○	N / ○	N / ○	N / ○	N	N	N	N	○ / ○	○ / ○	○ / ○	○ / ○	○ / ○	N	○ / ○
Ventilation mode	N	N	N	N	N	N	N	N	○ / N	○ / N	○ / N	○ / N	○ / N	N	○ / N

◎: Each group / Batched ; ○: Each group ; □: Block (for CITY MULTI Indoor unit, not for all Mr.SLIM) ; ●: AE-C400E-X/EW-C50E-X license registration possible.
(●): License registration for the optional functions required N: Not Available (Not Used.) △: Batched only ; ▲: Batched handling (for maintenance) ■: Block

*1. Group setting via wiring between Indoor units with cross-over cable;
*2. Setting via the integrated web browser is possible for Ver. 1.4 or later.
*3. Interlock is set at Local remote controller.
*4. This function can only be set on the ME remote controller.
This function cannot be used with the MA/Simple MA remote controller.
(However, the validity of this function with the MA/Simple MA remote controller depends on the indoor unit model, and it is possible to use this function with them.)
*5. Interlock is set from system controllers (Except PAC-YT40ANRA) or local remote controllers.
*6. The maximum number of controllable units decreases depending on the indoor unit model.
*7. For indoor use only.
*8. This function is supported only when all of the indoor units, remote controllers, and system controllers that are connected to a given group features said function.
*9. Function setting of this remote controller is necessary.
*10. Please contact your local distributor regarding the availability of this function.

Air conditioner control system interface

LMAP04-E : LonWorks® Interface
Controls up to 50 Groups/ 50 units, for details, refer to its description.

Optional Parts For Control

Model	Description
PAC-SE42TS-E	Remote Sensor for A/J/K/M-Net Control
PAC-SE55RA-E	Remote ON/OFF adaptor for Indoor Unit
PAC-SA88HA-EP	Remote Display Adaptor for Indoor Unit
PAC-SC37SA-E	Output signal connector
PAC-SC36NA-E	Input signal connector
PAC-SF46EPA-G	Transmission booster
PAC-SC51KUA	Power supply unit
PAC-YT51HAA-J	External input/output adapter for AT-50B
PAC-YG10HA-E	External input/output adapter for AE-C400E-X
PAC-YK94UTB-J	Electrical Box
PAC-YK96TK-J	Mounting Kit for control panel
PAC-YK92TB-J	Mounting attachment for wall-surface installation
PAC-YK91RF-J	Replace attachment

Centralized controller

AE-C400E-X



Dimensions	306(W) x 211(H) x 71.8(D) mm 12-1/16(W) x 8-5/16(H) x 2-27/32(D) in.

Mounted with a color LCD touch panel with excellent visibility and operability

- The AE-C400E-X features a 12.1-in color LCD display that provides excellent visibility. It has a flat-glass, capacitive touch panel for quick and precise response.

Up to 400 indoor units can be controlled

- One AE-C400E-X/EW-C50E-X can control up to 50 indoor units. Up to 400 units can be controlled by connecting additional AE-C400E-X or EW-C50E-X.

Air conditioners can be monitored and operated remotely

- Air conditioners can be remotely monitored and operated from a Web browser* on a personal computer by connecting the computer to the Internet via a modem or VPN router using a LAN connection. Up to 2000 indoor units can be controlled from Web browser.

* For Windows, Microsoft® Edge or Google Chrome is required. For Macintosh, Safari 7 is required. Windows and Microsoft® Edge are registered trademarks of Microsoft Corporation in the United States and other countries.

Enables energy management of air conditioners*

- The power consumption* and operating time of air conditioners are displayed on the AE-C400E-X. They can be used to check air conditioner usage and the effect of energy-saving control.



* Electric energy input is required.

Detailed airflow direction and speed settings can be registered in annual and weekly schedules

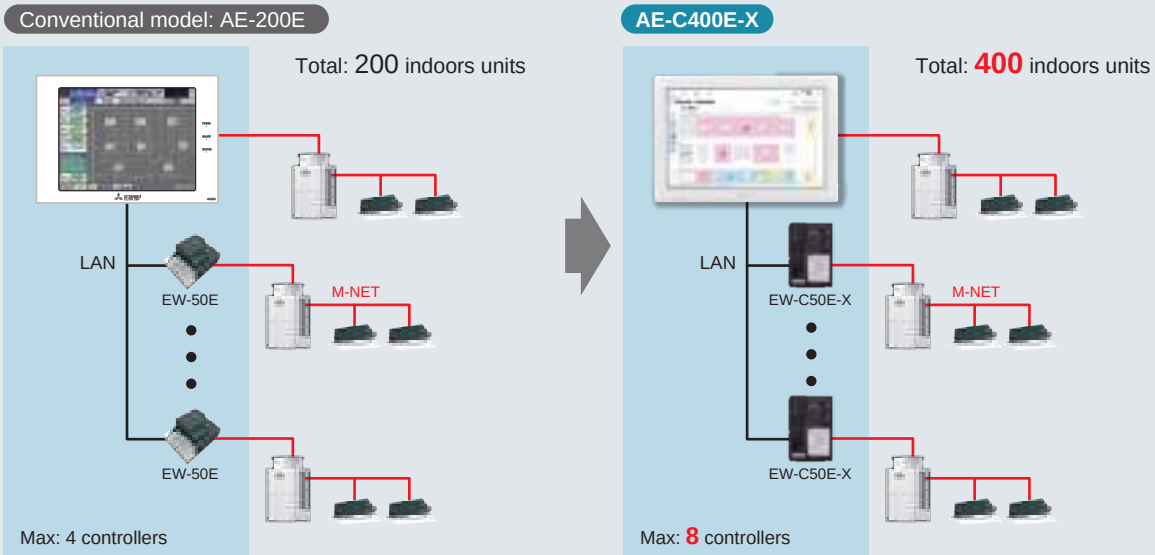
- In addition to an annual schedule, five patterns of weekly schedules can be set per season, specifying start and stop times, temperature, and airflow direction and speed in each schedule.



USB can be directly inserted in the side slot. Data can be collected easily.



Comparing the number of connectable units



12.1-in color LCD touch panel with backlight

A 12.1-in high resolution color LCD improves visibility.
The panel has a backlight to enable operations in a dark room.
It can be operated by lightly touching the screen with a finger.



Centralized control from a Web browser

Air conditioners can be operated and monitored using a personal computer, tablet, or smartphone connected to the Internet by LAN at the same convenience as visiting a Web page.



Operation/monitoring screen

The AE-C400E-X features a new GUI* with a revamped icon design for clearer visual operation. Additionally, it provides a unified display across both the LCD and Web browser, allowing for consistent operation on either interface.

*Graphical User Interface

● Monitoring screen (personal computer and tablet)



● Monitoring screen (smartphone)

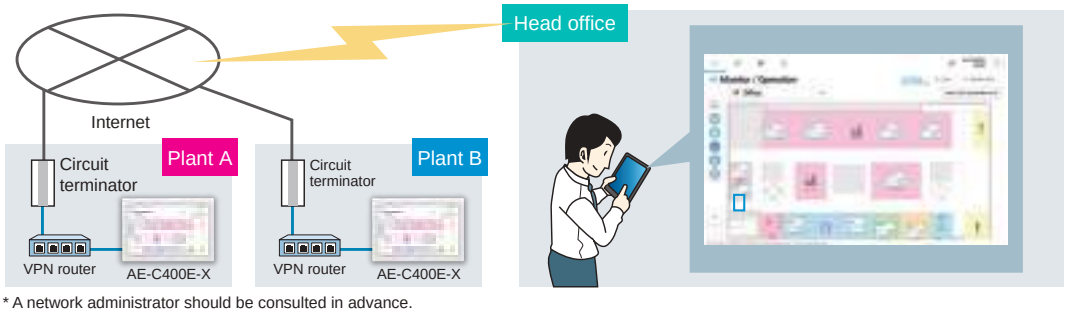


From smartphones, air conditioners can be operated by group units only

* The initial setting tool is required to make initial settings.
* On a system incorporating only the EW-C50E-X, floor layouts can be registered using the initial setting tool. The plan view creating function is optional.
* Air conditioners are centrally controlled using a Web browser on a personal computer, but the personal computer can be used for other purposes.
* In the case of Windows, Microsoft® Edge or Google Chrome is required. In the case of Macintosh, Safari 7 is required. Windows and Microsoft® Edge are registered trademarks of Microsoft Corporation in the United States and other countries.
  iPad and Safari are registered trademarks of Apple Inc. in the United States and other countries. Google Chrome is a registered trademark of Google Inc.

● Monitoring via the Internet

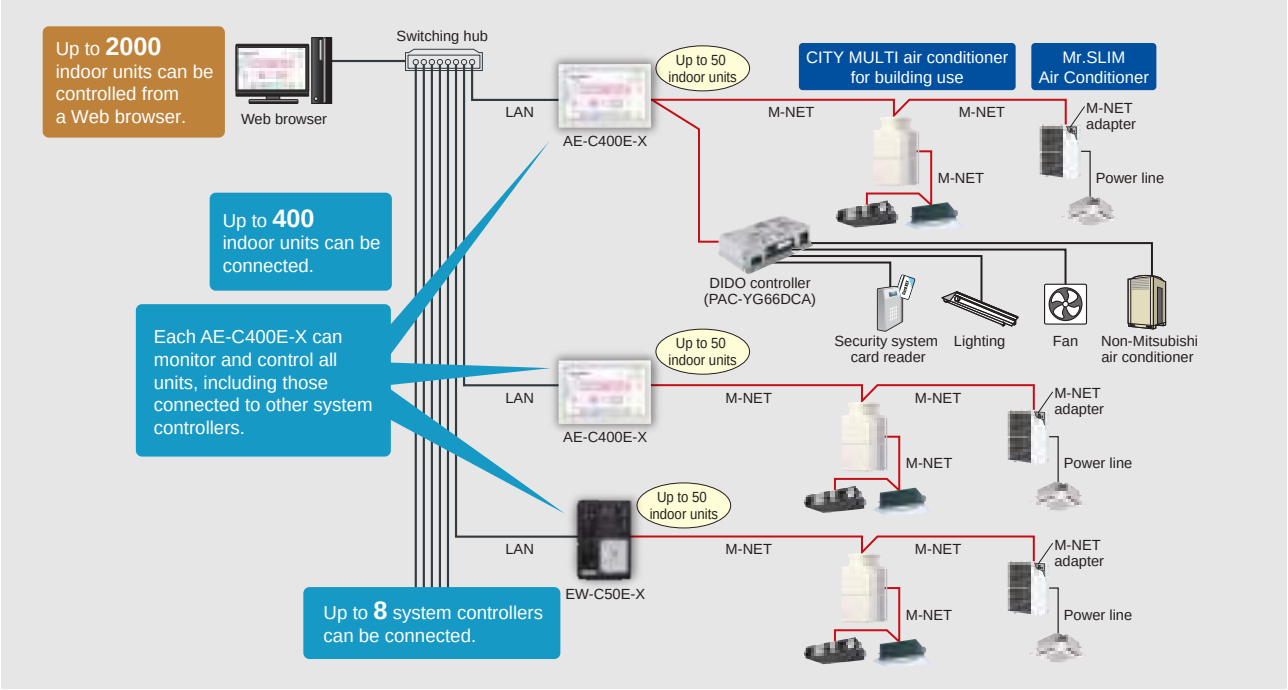
A tablet can be used to remotely operate air conditioners and monitor energy usage and troubles.



* A network administrator should be consulted in advance.
* When connecting the AE-C400E-X/EW-C50E-X to the Internet, use a VPN router for security.
* It is necessary to create an account with an Internet provider.

System configuration image

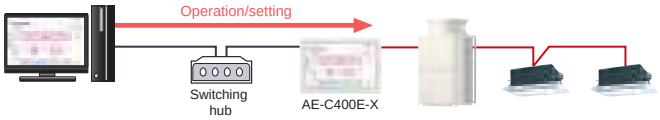
One AE-C400E-X/EW-C50E-X can control up to 50 indoor units. Up to 400 units can be controlled by connecting additional AE-C400E-X or EW-C50E-X.



Centralized control by floor plan image

Air conditioners can be operated and monitored using the air conditioner icons on the floor plan image* displayed on the AE-C400E-X or the Web browser. On the floor plan image, each floor is divided into six sections, and up to 20 floors can be registered.

* The floor plan image function is optional.





There are no restrictions on color specifications and support for various file formats, including JPEG and PIG.

Data input/output from/to USB port type C

Setting data (initial setting) and energy management data can be output to a USB flash drive*1. Likewise, the floor plan image data and setting data can be retrieved from the USB flash drive and input to the AE-C400E-X.



Dark mode (Web browser only)

A black background option has been added for the Web browser. Users can switch between settings to suit their preferences. To display in dark mode, add "?color=dark" at the end of the Web browser's URL

(ex) https://(IP address)/control?color=dark

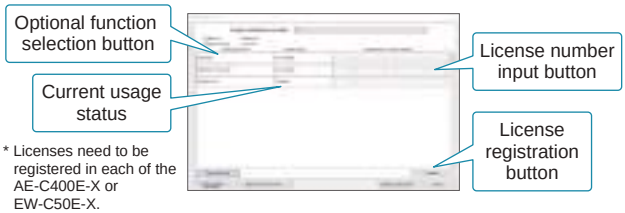


Error display

A list of units in trouble can be displayed. Touch an error code button to display error details.



License registration screen



* Licenses need to be registered in each of the AE-C400E-X or EW-C50E-X.

Air conditioners can be easily controlled by using the scheduling function

Scheduling function

The scheduling function simplifies climate control by allowing you to set up air conditioning schedules based on the season. You can create weekly and annual schedules for effortless temperature adjustments. Up to 24 different events can be set per day to perfectly match your needs.





Schedule setting items

Schedule Settings	•Set Time (In 1-Minute Increments)
Regular Schedule	•Stop Operation •Operation Mode •Set Temperature
Optimal Startup Schedule	•Air Direction •Remote Control Prohibited

Weekly schedule

The weekly schedule allows you to set different times for each day of the week. You can create up to 5 schedules and easily switch between schedules based on the season or specific period such as spring, summer, autumn, winter, or long vacations. Set these schedules in advance to match your seasonal needs.

e.g., Weekly schedules for spring, summer, autumn, winter, and long holidays

Priority high

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Weekly Schedule1							Holiday					
Weekly Schedule2				Spring								
Weekly Schedule3							Summer					
Weekly Schedule4										Autumn		
Weekly Schedule5	Winter											Winter

S	M	T	W	T	F	S
7	1 8	2 9	3 10	4 11	5 12	6 13

Weekdays
08:00 Cooling
17:30 Stop

Weekends
00:00
Stop all units

Annual schedule

The annual schedule allows you to make settings for holidays and special days, aside from your weekly schedule. You can program up to 50 days within a 24-month period, using up to 5 different operational patterns. These settings take precedence over the weekly schedule, so you won't need to make changes to your weekly settings.

e.g., Annual schedules for holidays such as public holidays and company founding anniversaries

B: For holidays
00:00 Stop all units

S	M	T	W	T	F	S
7	1 B	2 9	3 10	4 11	5 12	A 13

A: For Saturday work
08:00 Cooling
13:30 Stop

Daily schedule

When an unexpected change occurs, you can set up a schedule for just that day. This daily schedule takes precedence over both the weekly and annual schedules, allowing you to accommodate sudden adjustments without altering your existing weekly or annual settings.

e.g., Adding an air conditioning operation schedule for Saturday afternoon to the original Saturday schedule to accommodate an emergency meeting that has been scheduled for the afternoon

T	W	T	F	S
2 9	3 10	4 11	5 12	A 13

A: For Saturday work
08:00 Cooling
13:30 Stop

Emergency meeting scheduled in the afternoon

T	W	T	F	S
2 9	3 10	4 11	5 12	tdy 13

Today: For Saturday work (schedule change)
13:00 Cooling
17:30 Stop

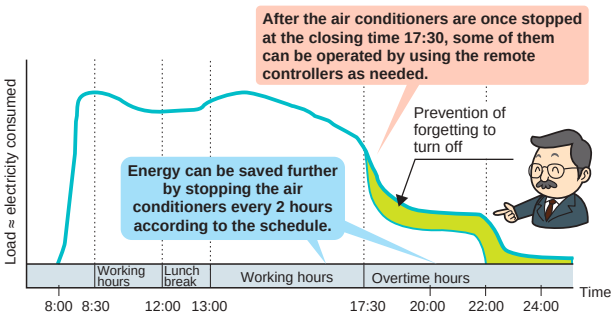
Energy-saving operation utilizing the schedule function

Utilization of schedule function of AE-C400E-X

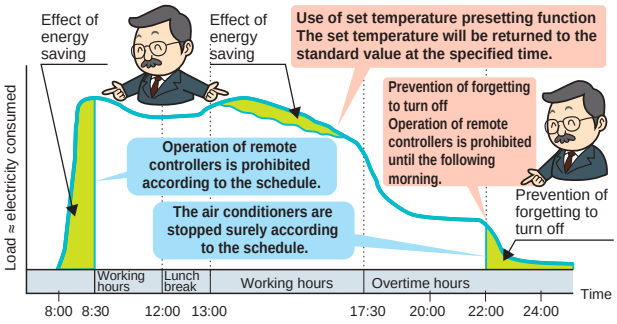
AE-C400E-X is provided with the daily, weekly, seasonal and annual schedule function as standard. If all air conditioners are once stopped at the closing time, it is possible to prevent waste of energy caused by workers forgetting to turn off.

Energy-saving air conditioning can be realized by setting the daily operation pattern. Failure to turn off can be prevented by inputting the quitting time.

For saving electricity during overtime hours



For saving electricity frequently throughout the day



Convenient functions to improve energy saving performance and comfort

Energy saving effect

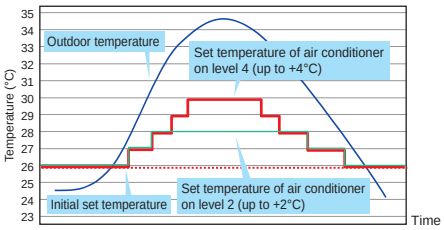
Operation according to outdoor temperature

During the cooling or heating season, the air conditions are controlled to reduce the difference between outdoor temperature and indoor temperature (around the entrance) and avoid physical effect of sudden temperature change. This function is effective also in energy saving. The control according to the outdoor temperature can be set for each group.

* Thermometers and AI controller (PAC-YG63MCA) are required.



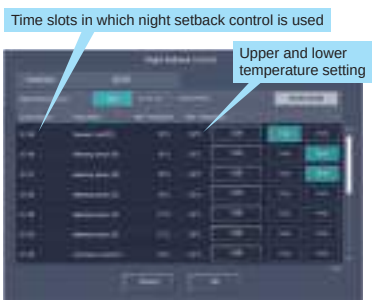
Any of the set temperature change levels 1 (1°C) to 4 (4°C) can be set for each air conditioner.

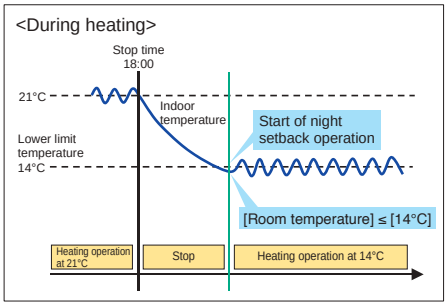


Improved comfort

Night setback function

This function is designed to automatically operate air conditioners to keep the room temperature within a certain range when the temperature becomes higher or lower than the preset upper or lower limit.

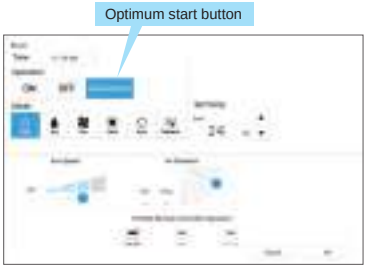




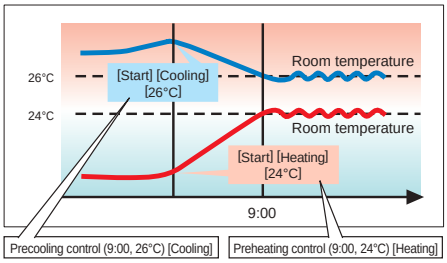
Optimum start control function

This function is used to start air conditioners 5 to 60 minutes before the set time so that the set temperature can be obtained at the set time.

The optimum start can be scheduled by setting temperature and time on the schedule setting screen.



Air conditioners are started before the set time so that the room temperature reaches 24°C (26°C) at 9:00.

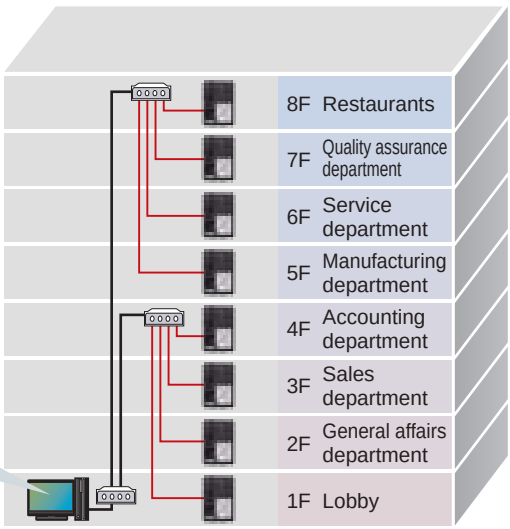


Usage examples

Integrated control of an entire building (up to 2000 indoor units)

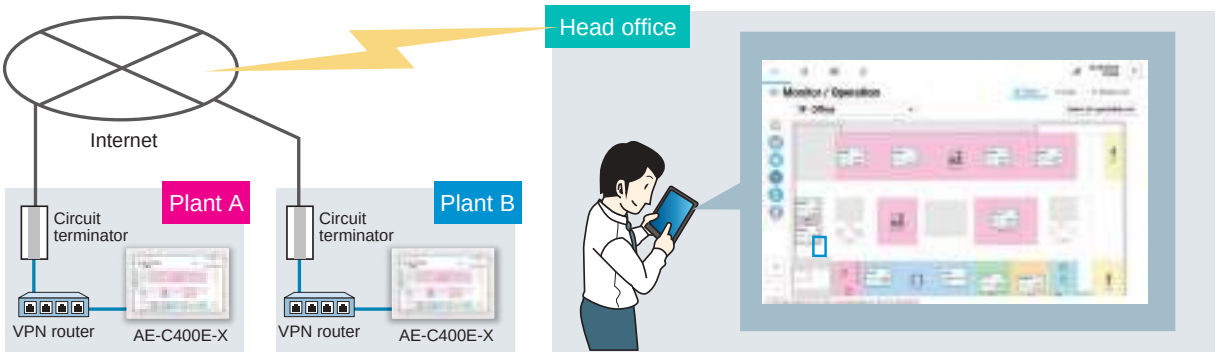
The comprehensive management browser allows the monitoring and control of up to 2,000 indoor units connected to a maximum of 40 AE-C400E-X/EW-C50E-X controllers. By setting up floor layouts, visibility is enhanced, enabling more intuitive operation.





Internet connection

It is possible to check the operating conditions and energy usage of air conditioners in other places and for trouble from the head office (a remote place) via the Internet.

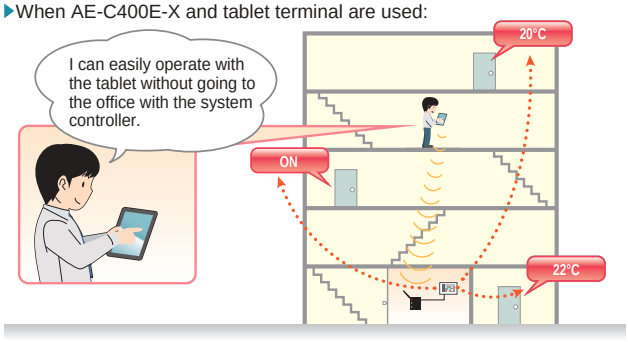


* Consult with the network administrator in advance.
* When connecting AE-C400E-X/EW-C50E-X via the Internet, use a VPN router to ensure the security.
* It is necessary to establish an account with an Internet provider.

With use of tablet (example)

With AE-C400E-X, you can monitor and operate the air conditioners from the tablet.

▶When AE-C400E-X and tablet terminal are used:



With AE-C400E-X, you can monitor and operate the air conditioners from the tablet.

▶ With only AE-C400E-X:



▶ **With AE-C400E-X + tablet terminal:**



Function list * The functions and specifications are subject to change.

Function		Details	LCD/PC/tablet			Smart phone
			Building manager	Tenant manager	General user	
Monitor/Operation screen	Floor layout screen	The operating state of the air conditoners is displayed on the floor layout.	✓	—	—	—
	List screen	The operating state of the air conditioners is displayed in list format.	✓	✓	✓	✓
	Status list screen	The number of On/Off/Error state of the air conditioners is displeyed each floor.	✓	—	—	—
	Advanced	The airconditoiners can be operated.	✓	✓	✓	✓
Energy management	Energy Use Status	The power consumption, outdoor temperature and operation time can be displayed in bar graphs or line graphs for comparison.	✓	✓	—	—
	Energy management table*1	The results of apportionment of energy consumption to energy management blocks, meters, indoor units and outdoor units are displayed.	✓	—	—	—
	Peak-Cut	The peak-cut control level and average electric power and displayed.	✓	—	—	—
Schedule functions	Schedule settings*2	It is possible to set the weekly schedule based on the day-of-the-week pattern (for each season), annual schedule and daily schedule for the units in each group, in each block or on each floor or all units collectively.	✓	✓	—	—
	Date range setting	The periods for weekly schedules 1 to 5 can be set.	✓	—	—	—
Notice	Error list	The addresses of units in trouble and error codes and the adddresses of units whose troubles have been detected are displayed.	✓	—	—	—
	Unit error log/Communication error log	500 errors which have occurred each set of AE-C400E-X/EW-C50E-X are displayed. (250 unit errors and 250 communication errors)	✓	—	—	—
	Filter sign	A list of units on which the filter sign is on is displayed.	✓	—	—	—

*1: The table can be displayed only when the charge license has been registered.
*2: The tenant management users cannot set the weekly schedule for each season.

[User classification]

	Administrator	Tenant	General user
Accessible air conditioners	All	Air conditioners specified by administrator	

BACnet® connection function

AE-C400E-X/EW-C50E-X can be connected to the centralized monitoring unit through BACnet®.

BACnet® connection (The BACnet license is required.)

Major features

- **The controllers can be connected to the centralized monitoring unit through BACnet®.**

  When air conditioners are monitored and operated by the centralized monitoring unit, AE-C400E-X/EW-C50E-X can be connected to the centralized monitoring unit through the open-protocol BACnet® by registering the license (BACnet® connection) in the controllers.

- **Amounts of power consumption apportioned to air conditioners can be output.**

  Electric energy consumed by air conditioners (outdoor units and indoor units) is apportioned to the groups according to the operating conditions of the indoor units, and the results can be output.
  (The charge license must be registered.)
  The apportioned power consumption can be used for calculation of air conditioning charge by the centralized monitoring unit.

- **BACnet® standard**

  AE-C400E-X and EW-C50E-X conform to the following BACnet® standard.
  • ISO 16484-5 (ANSI/ASHRAE 135-2010)
  (They conform also to ANSI/ASHRAE 135-2004 and ANSI/ASHRAE 135-2008.)

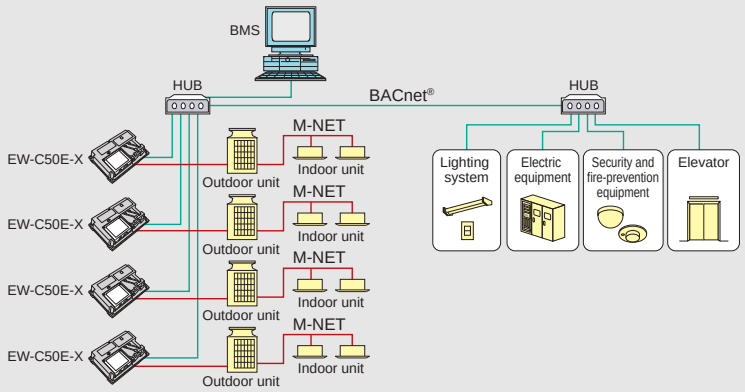
- **BACnet® devices**

  Each of the controllers AE-C400E-X and EW-C50E-X works as a device on the BACnet®, and up to 50 indoor units can be connected to each device.

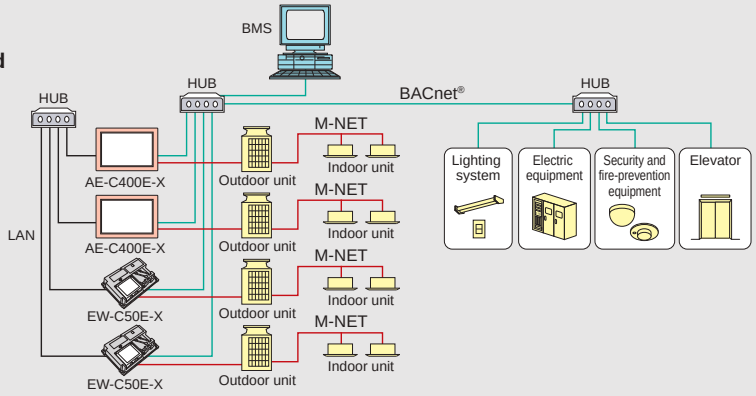
System configuration (example)

- **Configuration for monitoring and operation of air conditioners by centralized monitoring unit (example)**

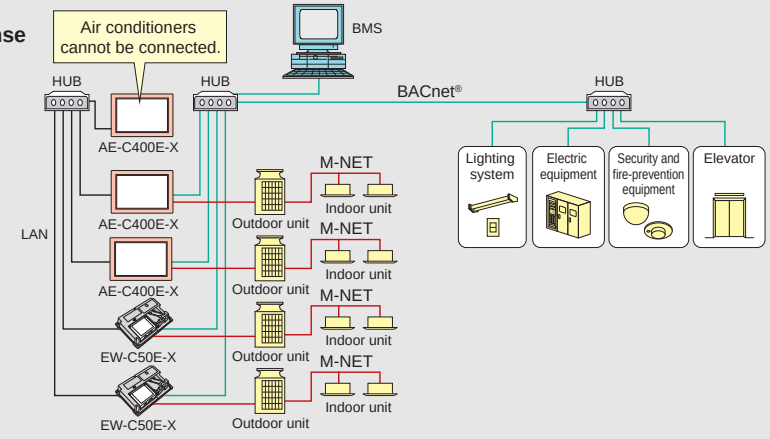
  (Air conditioners are not monitored or operated on LCD screens of AE-C400E-X)



- **Configuration for monitoring and operation of air conditioners on LCD screens of centralized monitoring unit and AE-C400E-X (example)**



- **Configuration for registration of charge license in AE-C400E-X/EW-C50E-X (example)**



BACnet® is a registered trade mark of ASHRAE (American Society of Heating, Refrigerating and Air-Conditioning Engineers, INC.).

Function list

* The functions and specifications are subject to change.

The following items can be transferred between the centralized monitoring unit and BACnet®.

✓: Function provided

Item	Description	Indoor unit	OA processing unit (IC attribute)	OA processing unit (FU attribute)	LOSSNAY not interlocked	State monitoring	Setting/operation
Start/stop	The units in each group can be started and stopped. It is possible to monitor in which state, started or stopped, the units in each group are.	✓	✓		✓	✓	✓
Operation mode	The operation modes (cooling, heating, fan, auto or drying) of the units in each group can be set. The operation modes (cooling, heating, fan, auto or drying) of the units in each group can be monitored.	✓	✓			✓	✓
Air speed	The air speeds (low, high, medium 2, medium 1 or auto) of the units in each group can be set. The air speeds (low, high, medium 2, medium 1 or auto) of the units in each group can be monitored.	✓	✓		✓	✓	✓
Air flow direction	The air flow directions (horizontal, downward 60%, downward 80%, downward 100% or swing) of the units in each group can be set. The air flow directions (horizontal, downward 60%, downward 80%, downward 100% or swing) of the units in each group can be monitored.	✓				✓	✓
Indoor temperature	The current value of room temperature of each group can be monitored. The past log (*4) can be read out.	✓	✓			✓	✓
Set temperature	The temperature for the units in each group can be set, and the setting can be read out (in 0.5°C steps). Some of the four temperature settings (indoor temperature, cooling temperature, heating temperature and auto 1 temperature) are used depending on the use and setting of the dual auto mode.	✓	✓			✓	✓
Filter sign	The filter signs of the units in each group can be monitored.	✓	✓		✓	✓	
Filter sign reset	The filter signs of the units in each group can be reset.	✓	✓		✓		✓
Prohibition of remote controller operations	The operations of the units in each group from the remote controller can be enabled or disabled. It is possible to monitor whether the operations of the units in each group from the remote controller are enabled or disabled. (The operations for start/stop, operation mode, set temperature and filter sign reset can be prohibited.)	✓	✓		✓	✓	✓
Emergency stop	It is possible to stop the units in each group or all units and disable the operations (start/stop) of the units in each group or all units from the remote controller.	✓	✓		✓		✓
Ventilation mode	The ventilation modes (heat exchange, normal or auto) of the units in each group can be set. The ventilation modes (heat exchange, normal or auto) of the units in each group can be monitored.		✓		✓	✓	✓
Night purge	The night purge state (stopped or started) of the units in each group can be monitored.		✓		✓	✓	
Thermo ON/OFF	The thermos ON/OFF state of the units in each group can be monitored.	✓	✓			✓	
Communication state	It is possible to monitor whether or not the M-NET communication among the units in each group is normally performed. When the state changes, a notification can be received.	✓	✓		✓	✓	
Alarm signal	It is possible to monitor whether or not the air conditioners in each group are normally running. When the state changes, a notification including an error code can be received.	✓	✓		✓	✓	
Error code	The error codes (classified into 9 kinds of codes) of the units in each group can be monitored. When the state changes, a notification can be received.	✓	✓		✓	✓	
System alarm signal	The system error state can be monitored. When the state changes, a notification including an error code can be received.					✓	
Power distribution and billing support function *1 *2	The current value of electric energy on the electricity meter connected to the pulse input of PI controller can be monitored. The past log (*4) can be read out.					✓	✓
	When an electricity meter is connected, the current value of the electric energy (consumed by indoor and outdoor units) apportioned to each group/each interlocked unit (*3) by the power distribution and billing support function of AE-C400E-X can be monitored. The past log (*4) can be read out. When an electricity meter is not connected, the current value of the apportionment parameter (consumed by outdoor units) apportioned to each group by the power distribution and billing support function of AE-C400E-X can be monitored. The past log (*4) can be read out.	✓	✓	✓	✓	✓	✓

*1: To use the function, the charge license is required. The charge information cannot be read out from BACnet®.
*2: To use the function, an electricity meter is required.
*3: The interlocked unit refers to the OA processing unit set in the energy management block.
*4: The default values for log collection cycle are one minute (indoor temperature) and one day (values other than indoor temperature).
To use a collection cycle other than the default values, it is necessary to set the cycle on the building management system. The collection cycle setting units and ranges are one minute and 1 minute to 1 day (indoor temperature) and 30 minutes and 30 minutes to 1 day (temperatures other than indoor temperature).

Centralized Remote Controller

Centralized controller

EW-C50E-X

EW-C50E-X suitable for remote control from personal computer! Usable as expansion controller for AE-C400E-X

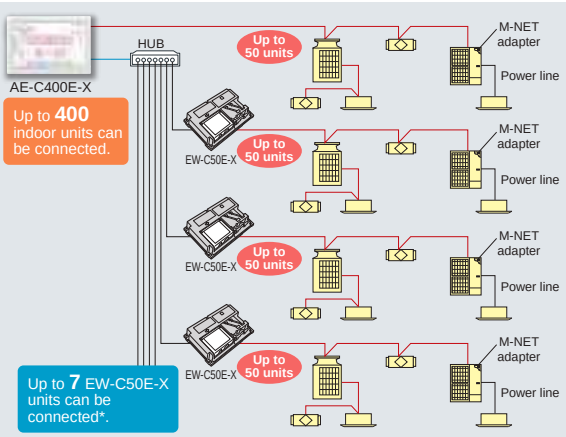
Centralized air conditioning control system EW-C50E-X

Flexibly applicable to centralized control in large- to small-scale buildings



EW-C50E-X without LCD screen

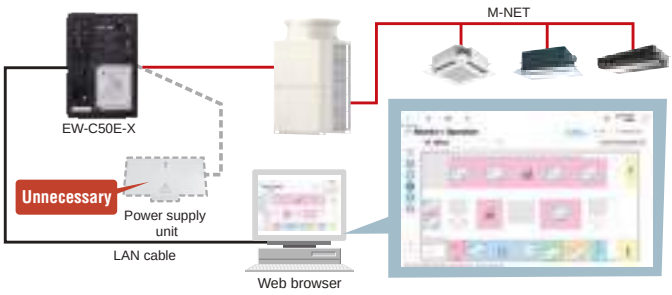
Dimensions	185(W) x 278(H) x 60.3(D) mm 7-5/16(W) x 10-31/32(H) x 2-3/8(D) in.



* When the M-NET of AE-C400E-X is not used, up to 8 sets of EW-C50E-X can be connected.

Major features

- **Usable as expansion controller for AE-C400E-X**
  When 7 sets of EW-C50E-X are connected to AE-C400E-X, up to 400 indoor units can be operated and monitored by AE-C400E-X.
- **Air conditioners can be operated and monitored only with EW-C50E-X by using a personal computer, tablet or smartphone.**
  Without AE-C400E-X, air conditioners can be monitored and operated only with this controller by using the browser software*1 of a personal computer. They can be monitored and operated remotely by using the Internet, and the air conditioners in some buildings can be operated simultaneously.*2

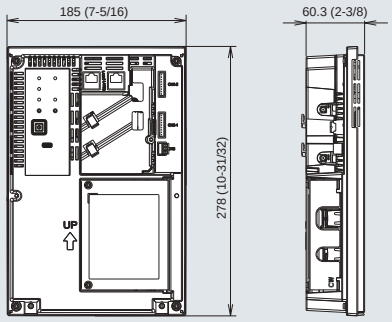


*1. In the case of Windows, Microsoft® Edge or Google Chrome is required.
In the case of Macintosh, Safari 7 is required.
Windows and Microsoft® Edge are registered trademarks of Microsoft Corporation in the United States and other countries.
iPad and Safari are registered trademarks of Apple Inc. in the United States and other countries.
Google Chrome is a registered trademark of Google Inc.

*2. The company names and product names in the text may be trademarks or registered trademarks of their respective companies.
When connecting EW-C50E-X via the Internet, avoid connecting it directly to the Internet. Connect it through a router or the like provided with the VPN function to ensure the security.

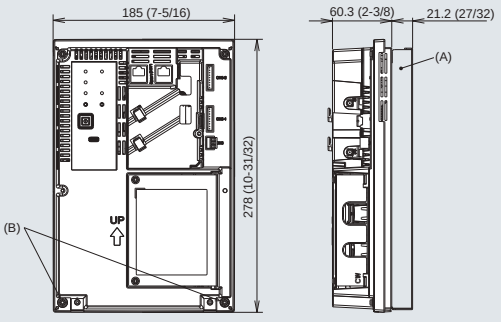
Outline drawing

[1] Controller



[2] Installation on a panel inside a metal control box

Unit: mm (in)



(A) Installation frame (supplied part D-12)
(B) controller mounting hole

Specification table

Item		Specifications
Power supply	Rating	100-240 VAC ±10%, 50/60 Hz, single phase
Power consumption		15 W
LAN1, LAN2		100BASE-TX
RS-485		For connecting a watt-hour meter (Modbus-RTU)
External input/output	Input	Photocoupler input (4 inputs x 2)
	Output	Transistor output (2 outputs x 2) (sink type)
Ambient conditions	Operating temperature range	-10°C to +55°C (+14°F to +131°F)
	Storage temperature range	-20°C to +60°C (-4°F to +140°F)
	Humidity	30% to 90% RH (non-condensing)
Exterior		Body: Electrogalvanized steel sheet Cover: PC+ABS
External dimensions	W × H × D	185 × 278 × 60.3 mm (7-5/16 × 10-31/32 × 2-3/8 in) (185 × 278 × 81.5 mm (7-5/16 × 10-31/32 × 3-7/32 in) when installed on the installation frame)
Weight		1.9 kg (5 lbs)
Installation conditions		In the metal control box installed indoors

Function

* The functions and specifications are subject to change.

◎: By group or multiple groups ○: By group □: Batch only

Item	Description	Setting Display	Display
ON/OFF	Switches to ON or OFF air conditioners and general equipment.	◎	◎
Operation mode switching	Switches to cool, dry, auto, fan, or heat operation. * Depending on the unit, some modes are not available.	◎	○
Room temperature setting	The temperature can be set in the following range. The values inside the parenthesis are for indoor units for medium temperature. * Depending on the model, the setting temperature range differs. · Cooling/dry : 19°C to 35°C (4.5°C to 30°C) · Heating : 17°C to 28°C (17°C to 28°C) · Auto (single set point): 19°C - 28°C · Auto (dual set points) [Cool] Same as the set temp. range for Cool mode. [Heat] Same as the set temp. range for Heat mode. · Setback (dual set points) [Cool] Same as the set temp. range for Cool mode. [Heat] Same as the set temp. range for Heat mode.	◎	○
Set temperature 0.5°Cincrements	The temperature can be set and displayed in 0.5°C increments. * With some unit combinations, the temperature is set in 1°C increments.	◎	○
Fan speed setting	The fan speed can be set to 4 levels, 3 levels, 2 levels or automatic. * Available fan speeds differ depending on the unit.	◎	○
Air direction setting	Fixed swing in five levels or auto air direction can be set. * Available air directions differ depending on the unit.	◎	○
Prohibition of local remote controller operation	It is possible to disable the ability to use to local remote controller to run or stop, the operation mode, set temperature, filter sign reset, wind speed, wind direction and timer operation. * In the Lossnay group, only ON/OFF and filter reset can be disabled. * Disabling of the fan speed, air direction, and timer operation can be set for the AT-50B, PAR-41MAA, PAR-U02MEDA, and PAC-YT52CRA models.	◎	○
Room temperature display	Displays the suction temperature of the indoor unit.	–	○
Error display	Displays the current error content together with the address.	–	◎
Schedule operation	Today/weekly/weekly by season/yearly Setting content: ON/OFF, operation mode, set temperature, disable local remote controller, air direction/fan	◎	○
Energy management	Displays the power consumption* or operating hours. * Requires an optional part.	–	◎
Ventilator operation (solo)	Group operation can be possible for free plan Lossnay units only. * The above group operation mode includes auto ventilation, heat exchange, and normal ventilation.	◎	○
Ventilator operation (interlocked)	Free plan Lossnay units and indoor units can be interlocked and operated together. * At this point, air volume can be operated but the ventilation mode cannot be selected.	◎	○
External input (timer connection, emergency stop input, etc.)	Using a level signal or pulse signal, it is possible to input the following. Level signal: Emergency Stop Input, Batch ON/OFF, and Demand Input. Pulse signal: Batch ON/OFF or Operation Disable/Enable * Requires an external power supply and separately sold external I/O adapter (PAC-YG10HA-E). Of the above inputs, only one input can be selected.	□	–
External output (error output, operation output)	Using the level signal, ON/OFF and Error/Normal are output. * Requires an external power supply and separately sold external I/O adapter (PAC-YG10HA-E).	–	□
Web browser	Monitor/operation, failure, filter sign monitoring, schedule setting, interlocked control setting (option), energy saving control setting (option), energy saving peak cut setting (option), set temperature range restrictions, other	◎*1	◎*1
Filter reset	Filter sign reset	○	○
Connectable location	Centralized system transmission line: Connectable Recommended Indoor and outdoor transmission line: Connectable	–	–

* The functions and specifications differ depending on the connected equipment and model.
* Electric energy can be proportionally divided using the EW-C50E-X alone.
But the apportioned electricity charge function requires an AE-C400E-X

■Notes
*1. Some items do not support the multi group setting and display.
*2. Use only items for which the unit has the function.

■Connectable equipment: Free plan direct expansion system air conditioner
Inverter air conditioner for facility
Package air conditioner for facility (the AW control model can be connected using an M control compatible indoor unit)
A Control Mr. Slim (Can be connected using an M-NET adapter or special outdoor unit)
Kirigamine room air conditioner (Requires a system control interface or M-NET control interface)
Free plan Lossnay/Lossnay with heating and humidification
Independent humidification unit *2
Environmental measuring controller, metering measurement controller, general interface

Centralized Remote Controller

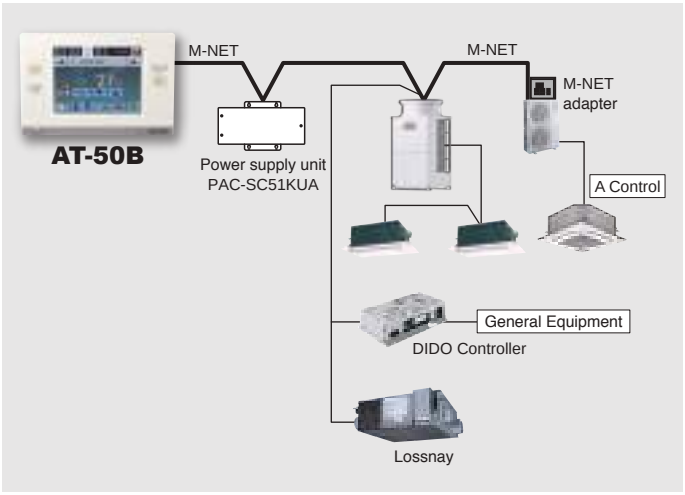
Advanced Touch controller
AT-50B



Dimensions	180(W) x 120(H) x 30(D) mm 7-2/16(W) x 4-3/4(H) x 1-3/16(D) in.

The color touch panel is easy to see and operate.
The operation screen can be selected according to the intended use.

System structure



Design

Backlit LCD Touch Panel

The 5-inch color LCD (Liquid Crystal Display) touch panel enables easy and simple operations.
When the backlight is off, touching the panel turns on the backlight. The backlight will remain on for a preset length of time.
The touch panel displays operation status of the units in GRID, LIST, or in GROUP form.



GRID (zoom out) screen

Displays operation status of all groups.



GRID (zoom in) screen

Displays the operation status details of each group by group name.



LIST screen

Displays the operation status details of each group.



GROUP screen

Displays the operation status details of each group. Sets group operations.

Functions

Controls 50 indoor units in all

One screen shows the operation conditions of 50 connected indoor units.

Weekly and daily schedule

Five one-day schedule patterns and 12 weekly schedule patterns (max. 16 settings per pattern)
Two weekly schedules can be set.

System changeover

The operation mode can be changed according to the indoor temperature settings, target temperature of each group, or a representative indoor unit.

Main system controller/Sub-system controller

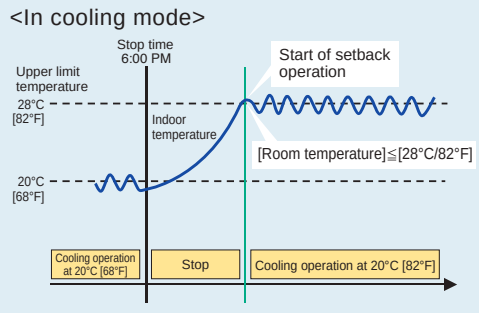
The AT-50B can be used as any of the main and sub system controllers. When it is connected to a system controller, such as the AE-C400E-X, it is used as a sub controller. When some units of the AT-50B are connected, the main and sub controllers can be determined.

Functions [Basic Functions]

- ON/OFF
- Temperature setting
- Airflow direction setting
- Operation mode switching
- Fan speed setting
- Louver setting

Night setback function

When the room temperature goes outside of a certain range during the predetermined period, this function automatically starts heating or cooling operation to prevent dew condensation or an excessive temperature increase in the room.



Simple button arrangement

The F1 and F2 buttons beside the main screen can be customized for frequently used functions.
(Schedule/Operation Mode/Temperature Correction/Remote Controller Restriction)

Advanced Functions

□: Each unit ○: Each group ◎: Group or collective ×: Not available

Item	Description	Setting	Display
Permit / Prohibit	The ON/OFF, operation mode, setting temperature, fan speed, air direction, filter sign reset operations, and timer using the local remote controllers can be prohibited. Only ON/OFF and filter reset can be prohibited for the LOSSNAY group. *The settable items vary depending on the models.	◎	◎
Operation lock	The operation lock can be set to the input operation of the AT-50B. Each button can be set. (Function Button 1, Function Button 2, Collective ON/OFF, Touch Panel) Each function can be set. (Operation mode, Setting temperature, Fan speed, Menu button) The password for the lock release can be set.	◎	◎
Error display	When an error is occurring on an air conditioner unit, the affected unit and the error code are displayed. * When an error occurs, the "ON/OFF" LED flashes. The operation monitor screen shows on abnormal icon over the unit. The error monitor screen shows the abnormal unit address and error code. The error log monitor screen shows the time and date, the abnormal unit address, error code, and source of detection.	×	□◎
Ventilation (independent)	Switches the mode "Bypass/Heat recovery/Auto" for LOSSNAY groups.	◎	◎
Ventilation (interlocked)	The LOSSNAY will run in interlock with the operation of the indoor unit. The mode cannot be changed. The LED will turn ON during operation after interlocking.	◎	◎
Temperature set limitation	Batch-setting to temperature range limit in cooling, heating, and auto modes. This function cannot be used with the MA remote controller. (Depends on the indoor unit model.)	◎	◎
Specific mode operation prohibit (Cooling prohibit, heating prohibit, cooling/ heating prohibit)	When set as the main controller, operation of the following modes with the local remote controllers can be prohibited: When cooling is prohibited: Cooling, dry, automatic can not be chosen. When heating is prohibited: Heating, automatic can not be chosen. When cooling/heating is prohibited: Cooling, dry, heating, automatic can not be chosen.	◎	◎
External input (Emergency stop input, etc.)	The following input with level signals or pulse signals are available. Level signal: "Emergency stop input" or "Collective ON/OFF" Pulse signal: "Collective ON/OFF" or "Local remote controller prohibit/permit" One input can be selected from those above. * An external input/output adapter (PAC-YT51HAA (sold separately)) is required. Relays and DC power supply or other devices must be prepared at the site.	◎	◎
External output (Error output, operation output)	"ON/OFF" and "error/normal" are output with the level signal. * An external input/output adapter (PAC-YT51HAA (sold separately)) is required. Relays and DC power supply or other devices must be prepared at the site.	◎	◎
Checking the Gas Amount	Use this function to check for a refrigerant leak from the outdoor unit. * When this function is used, the gas amount checking function of the outdoor unit cannot be used. This function is for CITY MULTI R2 and Y (PUMY is excluded.) Series only.	□	□
Schedule operation	Weekly schedule setting of up to 12 patterns is available. In one pattern, up to 16 settings for "ON/OFF", "Operation mode", "Set Temperature", "Fan speed", "Air flow direction", and "Permit / Prohibit local operation" can be scheduled. Two types of weekly schedules (Summer/Winter) can be set. Today's schedule allows setting of up to 5 patterns.	○	○

* Depending on the installation conditions, power supply unit (PAC-SC51KUA) is required. Please contact your local distributor or MITSUBISHI ELECTRIC branch office for further information.

Centralized Remote Controller

ON/OFF remote controller

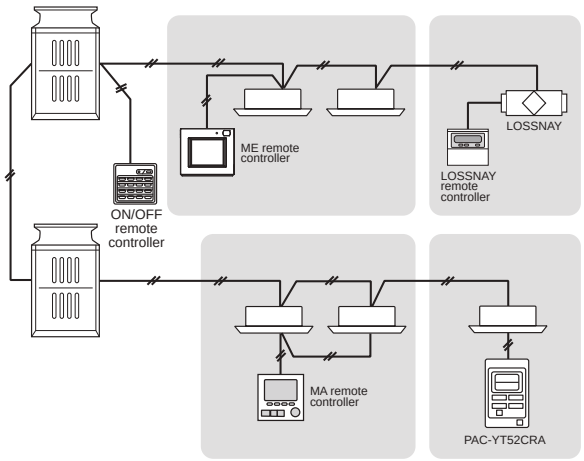
PAC-YT40ANRA

Just press a switch to start. All of the units can be switched ON/OFF by pressing the main switch, and each unit in the group can be switched ON/OFF with individual switches. The PAC-YT40ANRA also has a hardwired connection available (ON/OFF input, fire alarm input, run output, fault output).



Dimensions	130(W) x 120(H) x 19(D) mm 5-1/8(W) x 4-3/4(H) x 3/4(D) in.

System example



- **Control of up to 16 groups/50 indoor units is possible**
  - Up to 16 groups/50 units can be operated with one ON/OFF remote controller.
  - A general-purpose interface is available for control, allowing general devices to also be turned ON and OFF.
- **Just press a switch to start**
  - All of the units can be started and stopped by pressing the main switch, and each unit in the group can be started and stopped with individual switches.
- **LED flashing during failure**
  - If any error should occur in the air conditioner, its details can be confirmed easily with the flashing LED. The LED also indicates whether each group is running or stopped.
- **Interlock operation with external system is possible**
  - It can be flexibly interlocked with a card reader, fire alarm system, or building management system, etc., using the incorporated external input/output function.
- **Flexible group setting**
  - Groups can be easily configured, allowing the group pattern to be freely set according to the layout.
  - The ON/OFF remote controller can be connected at the indoor/outdoor transmission line without the power supply unit.

NOTE
The dual set point function is available depending on the controller version.
Please contact your local distributor regarding the availability of this function.

○: Each group □: Batch only ×: Not available

Function	Description	PAC-YT40ANRA	
UNITS	Max No.Units	50 units/16 groups	
		Setting	Display
ON/OFF	ON and OFF operation	○	○
Error indication	LED flashes during failure. (The error code can be confirmed by removing the cover.)	×	○
Ventilation operation (Independent)	Group operation of only LOSSNAY units possible. *Only ON/OFF of group.	○	○
Ventilation operation (Interlocked)	The LOSSNAY will run in interlock with the operation of the indoor unit. *The fan rate and mode cannot be changed. The LED will turn ON only during operation after interlocking.	○	○
External input	On and Off operation / Fire Alarm*	□	×
External output	On and Off operation / Faults*	×	□

* Applicable to collective only
Not applicable to groups

Wired MA remote controller

PAR-41MAAM



Dimensions 120(W) x 120(H) x 14.5(D) mm
4-23/32(W) x 4-23/32(H) x 37/64(D) in.

Highlight display

The screen background can be set to black to suit the ambience of the room.



*Factory setting : White

- **Backlit LCD (Liquid Crystal Display)**
  Large, easy-to-see display
  Full-dot LCD display with large characters for easy viewing
  Contrast also adjustable
- **Night Setback**
  When the room temperature goes outside of a certain range during the predetermined period, this function automatically starts heating or cooling operation to prevent dew condensation or an excessive temperature increase in the room.
- **3D i-see sensor***
  Settings for 3D i-see sensor can be performed.
- **Draft reduction***
  “Close” has been added to the manual vane angle selection. The air outlet can be closed to reduce drafts from the air conditioner.
- **Auto descending panel***
  Panels can be lowered/raised using the remote controller. The descending distance of the panel can also be selected.

*The availability of the function depends on the indoor unit model. For details, please contact your local distributor.

Functions

○: Available ×: Not available

Item	Description	Setting	Display
ON/OFF	Switches between ON and OFF.	○	○
Operation mode switching	Switches between Cool / Dry / Fan / Auto / Heat.	○	○
Temperature setting	Changes the set temperature. * Set temperature range varies depending on the indoor unit model.	○	○
Air flow direction setting	Changes airflow direction. * Available airflow directions vary depending on the model.	○	○
Louver setting	Switches between louver ON/OFF.	○	○
Ventilation equipment control	Interlocked setting and interlocked operation setting with CITY MULTI LOSSNAY units can be performed. The Stop/Low/High settings of the ventilation equipment can be controlled.	○	○
Error information	When an error occurs, an error code and the unit address appear. Air conditioning unit model, serial number, and contact number can be set to appear when an error occurs. (The above information needs to be entered in advance.) * An error code may not appear depending on the error.	–	○
Timer	ON/OFF timer Turns ON and OFF daily at a set time. • Time can be set in 5-minute increments. • It is also possible to set the ON time only or the OFF time only. Auto-OFF timer Turns off the unit after a certain period of operation. • Operation time can be set to a value from 30 to 240 minutes in 10-minute increments.	○	○
Allows/disallows local operation	The following operation can be prohibited by applying certain settings on the centralized controller: ON/OFF, operation mode, temperature, filter sign reset, air direction, fan speed and timer. * While an operation is prohibited, the operation icon lights up (only on the Main display in "Full" mode).	×	○
Operation lock	The following operations can be prohibited: “Location,” “ON/OFF,” “Mode,” “Set temp.,” “Menu,” “Fan,” “Louver,” or “Vane.”	○	○
Temperature range restriction	The room temperature range for each operation mode can be restricted.	○	○
Auto return	The units operate at the preset temperature after a designated period. (Time can be set to a value from 30 to 120 minutes in 10-minute increments.) * Not valid when the temperature setting range is restricted.	○	×
Daylight saving time	The start / end time for daylight saving time can be set. The daylight saving time function will be activated based on the setting contents.	○	○

Individual Remote Controller

Wired MA remote controller

PAR-21MAA



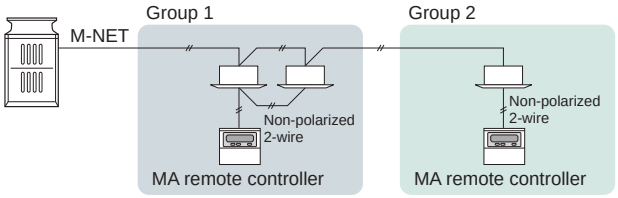


Dimensions 130(W) x 120(H) x 19(D) mm
5-1/8(W) x 4-3/4(H) x 3/4(D) in.

- **Dot Liquid Crystal Display (LCD)**
- **Multi-language Display**

- **Set temperature in 1°C/°F increment**
- **Weekly timer**
  Up to 8 ON/OFF/temperature settings per day in one-minute increments. Setting kept in nonvolatile memory. No need to worry about resetting after a power failure.
- **Self-diagnosis function immediately reports an error code in case of malfunction**

Example of system configuration



Multi-language Display Example [Dot display table]

Language		English	German	Spanish	Russian	Italian	Chinese	French	Japanese
Waiting for start-up		PLEASE WAIT	←	←	←	←	←	←	←
Operation mode	Cool	COOL	Kühlen	FRÍO	Холод	COOL	制冷	FROID	冷房
	Dry	DRY	Trocknen	DESHUMIDIFICACION	Сушка	DRY	除湿	DESHU	ドライ
	Heat	HEAT	Heizen	CALOR	Тепло	HEAT	制热	CHAUD	暖房
	Auto	AUTO	AUTO	AUTOMÁTICO	Авто	AUTO	自动	AUTO	自動
	Auto(Cool)	COOL	Kühlen	FRÍO	Холод	COOL	制冷	FROID	冷房
	Auto(Heat)	HEAT	Heizen	CALOR	Тепло	HEAT	制热	CHAUD	暖房
	Fan	FAN	Lüfter	VENTILACIÓN	Вент	VENTILAZIONE	送风	VENTILATION	送風
	Ventilation	VENTILATION	Gebläse Lüftung	VENTILACIÓN	Вентиляция	ARIA ESTERNA	换气	VENTILATION	換気
	Stand by (Hot adjust)	STAND BY	STAND BY	CALENTANDO	ОБОГРЕВ: ПАУЗА	STAND BY	准备中	PRE CHAUFFAGE	準備中
	Defrost	DEFROST	Abtauen	DESCONGELACIÓN	ОТТАИВАНИЕ	SBRINAMENTO	除霜中	DEGIVRAGE	霜取中
Button not used		NOT AVAILABLE	nicht Verfügbar	NO DISPONIBLE	НЕ ДОСТУПНО	NON DISPONIBILE	无效按钮	NON DISPONIBLE	無効ボタン
Check (Error)		CHECK	Prüfen	COMPROBAR	Проверка	CHECK	检查	CONTROLE	点検
Test run		TEST RUN	Testbetrieb	TEST FUNCIONAMIENTO	Тестовый запуск	TEST RUN	试运转	TEST	試ウンテン
Self check		SELF CHECK	selbst-diagnose	AUTO REVISIÓN	Самодиагностика	SELF CHECK	自我诊断	AUTO CONTROLE	自己ジンダン
Unit function selection		FUNCTION SELECTION	Funktion Auswahl	SELECCIÓN DE FUNCIÓN	Выбор функции	SELEZIONE FUNZIONI	功能选择	SELECTION FONCTIONS	キノウ選択
Setting of ventilation		SETTING OF VENTILATION	Lüftenstufen Wahlen	CONFIG. VENTILACIÓN	Настройка вентустан.	IMPOSTAZIONE ARIA ESTERNA	换气设定	SELECTION VENTILATION	換気設定

Functions

□: Each unit ○: Each group ◎: Group or collective ×: Not available

Item	Description	Setting	Display
ON/OFF	ON and OFF operation for a single group	○	○
Operation mode switching	Switches between Cool / Dry / Auto* / Fan / Heat. Operation modes vary depending on the air conditioner unit. * Auto only supported for the CITY MULTI R2 and WR2 Series.	○	○
Temperature setting	Changes the set temperature. * Set temperature range varies depending on the indoor unit model.	○	○
Fan speed setting	Models with 4 air flow speed settings: High/Mid-1/Mid-2/Low Models with 3 air flow speed settings: High/Mid/Low Models with 2 air flow speed settings: High/Low Fan speed setting (including Auto) varies depending on the model.	○	○
Air flow direction setting	Air flow direction angles (4-angle, or 5-angle Swing) Auto Louver ON/OFF Air flow direction settings vary depending on the model.	○	○
Permit / Prohibit local operation	Individually prohibit operation of each local remote control function (ON/OFF, Change operation mode, Set temperature, Reset filter). *1: When the local remote controller inactivation command is received from the main system controller, " ▨ " is displayed.	×	○*1
Prohibition/permission of specified mode (Cooling prohibited/heating prohibited /cooling-heating prohibited)	Operation for the following modes is prohibited through System Controller settings: At cooling prohibited: Cool, Dry, Auto, At heating prohibited: Heat, Auto, At cooling-heating prohibited: Cool, Heat, Dry, Auto	×	○
Error	When an error is occurring on an air conditioner unit, the affected unit and the error code are displayed.	×	□
Ventilation equipment	Up to 16 indoor units can be connected to an interlocked system that has one LOSSNAY. LOSSNAY items that can be set are "Hi" "Low" "Stop". Ventilation mode switching is not available.	○	○
Set temperature range limit	Set temperature range limit to cooling, heating, or auto mode.	○	○
Auto lock function	Setting/releasing of simplified locking for remote control switch can be performed. · Locking of all switches · Locking of all switches except ON/OFF switch	○	○

ME remote controller

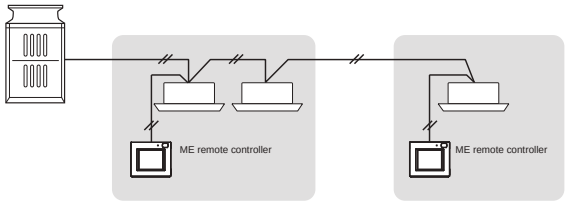
PAR-U02MEDA



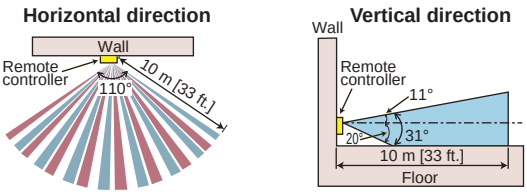
Dimensions	140(W) x 120(H) x 25(D) mm 5-9/16(W) x 4-3/4(H) x 1(D) in.

- **Occupancy Sensor**
  The occupancy sensor detects when the room is empty and provides energy-saving control.
- **Touch Panel & Backlit LCD**
  The operation settings screen is a touch panel.
  When the backlight is off, touching the panel turns on the backlight.
  The backlight will remain on for a preset length of time.
- **LED Indicator**
  The color of the LED indicator indicates operation status.
  The LED indicator is lit during normal operations, and is not lit when units are stopped. In case of error, the indicator blinks.
- **Brightness Sensor**
  The brightness sensor detects brightness in the room and provides energy-saving control.
- **Temperature & Humidity Sensor**
  The sensor detects room temperature and relative humidity.

Example of system configuration



Occupancy Sensor detection zone



Functions

○: Available ×: Not available

Item	Description	Setting	Display
ON/OFF	Switches between ON and OFF.	○	○
Operation mode switching	Switches between Cool / Dry / Fan / Heat / Auto. Operation modes vary depending on the indoor unit model.	○	○
Temperature setting	Changes the set temperature. * Set temperature range varies depending on the indoor unit model.	○	○
Fan speed setting	Changes fan speed. * Available fan speeds vary depending on the model.	○	○
Air flow direction setting	Changes airflow direction. * Available airflow directions vary depending on the model.	○	○
Allows/disallows local operation	The following operation can be prohibited by applying certain settings on the centralized controller: ON/OFF, operation mode setting, temperature setting, fan speed, air direction, and filter sign reset. * While an operation is prohibited, the operation icon lights up.	×	○
Error information	When an error occurs, an error code and the unit address appear. A contact number can be set to appear when an error occurs. (The information above needs to be entered in the Service menu.)	–	○
Schedule (Weekly timer)	Weekly ON/OFF times, operation mode, and set temperatures can be set. • Time can be set in 5-minute increments. Up to 8 schedule patterns can be set per day of the week. * Not valid when the ON/OFF timer is set.	○	○
Timer	ON/OFF timer Turns ON and OFF daily at a set time. • Time can be set in 5-minute increments. • It is also possible to set the ON time only or the OFF time only. Auto-OFF timer Turns off the unit after a certain period of operation. • Operation time can be set to a value from 30 to 240 in 10-minute increments.	○	○
Energy-save control during vacancy	When vacancy is detected by the occupancy sensor, the energy-save control assist function is activated. Four control types are available for selection: ON/OFF/Set temperature/Fan speed/Thermo-off. The brightness sensor can be used in conjunction with the occupancy sensor to detect the occupancy/vacancy status more accurately.	○	○

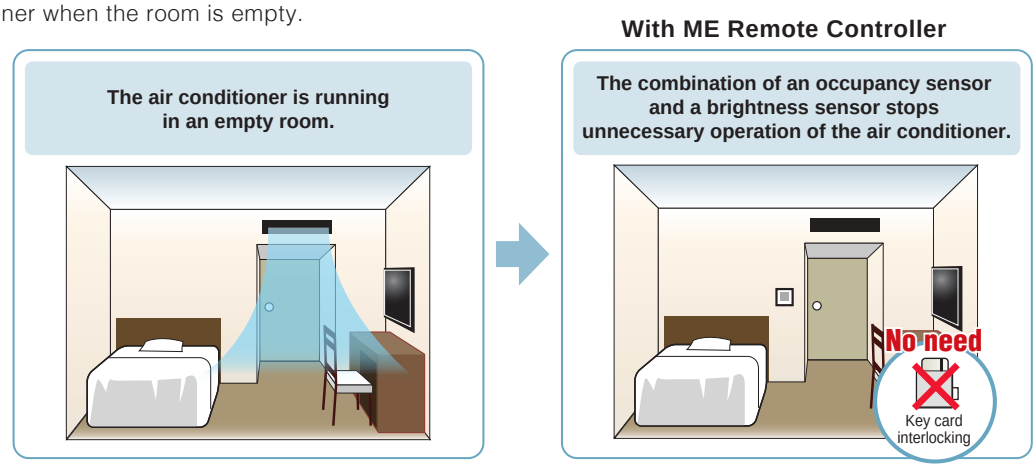


Example of use of PAR-U02MEDA

Automatic turning off air conditioners

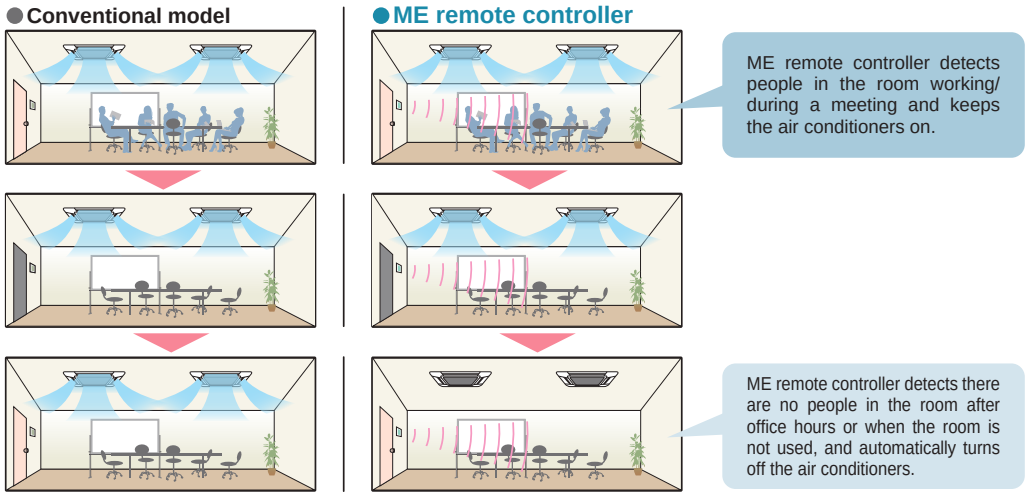
For Hotels

Mitsubishi Electric remote controller has an occupancy sensor to automatically turn off the air conditioner when the room is empty.



The occupancy sensor of the ME remote controller detects the conditions in the room, and the ME remote controller will automatically turn the air conditioners on or off.

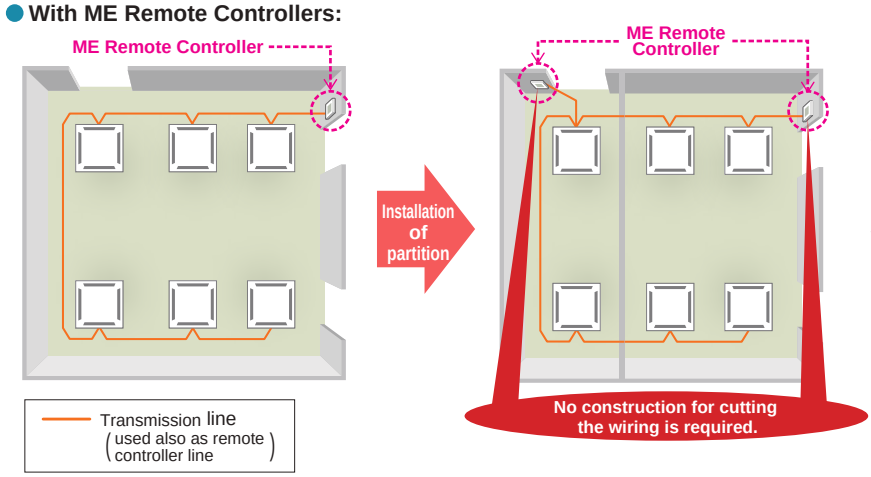
For Offices



Partitioning can be installed later when a ME Remote Controller is used.

For Offices

For Commercial Facilities



The ME remote controller can be operated when it is connected with any of the indoor units.
When changing the room layout, you can set the groups easily with the remote controller.

MA remote controller

PAR-CT01MAA-S



Dimensions	65(W) x 120(H) x 14.1(D) mm 2-9/16(W) x4-3/4(H) x 9/16(D) in.

- **User-friendly**
  Large icons are easily visible on the full color touch panel display.
- **Flexibility**
  Customized display, color of parameter and background, editable parameter on the initial display.

User-friendly

Full color touch panel display



Touch Panel



3.5 inch/HVGA
Full Color LCD

Operation panels



Temperature setting



Operation mode



Fan speed



Vane control



Ventilation



Louver control

Flexibility

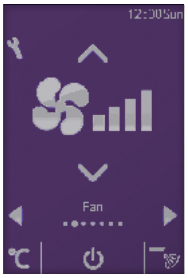
Multiple color patterns

180 color patterns can be selected for the display's control parameters or background.

Control parameter customization

Users can customize the panel to display the selected parameters only.









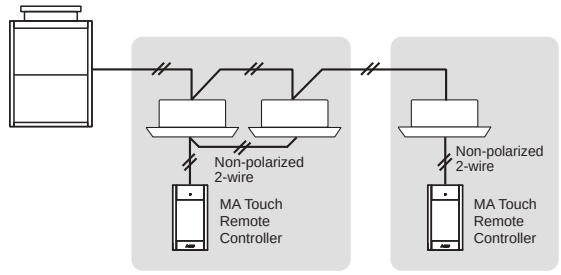


Available in a wide variety of colors to suit the decor of any room.





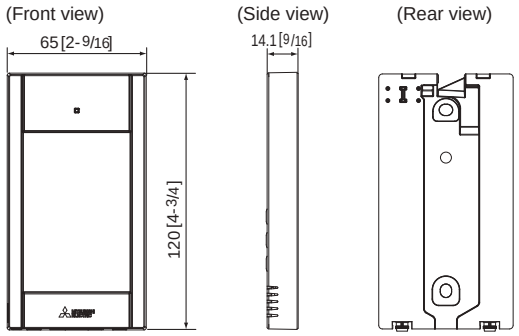
System example



*When a PAR-CT01MAA is connected to a group, no other MA remote controllers can be connected to the same group.

External dimension

Unit: mm[in.]



Functions

○: Available ×: Not available

Item	Description	Setting	Display
ON/OFF	Switches between ON and OFF.	○	○
Operation mode switching	Switches between Cool / Dry / Fan / Auto / Heat.	○	○
Temperature setting *	Changes the set temperature. * The settable temperature range varies depending on the indoor unit model. * Temperature will be displayed either in Celsius in 0.5- or 1-degree increments, or in Fahrenheit, depending on the indoor unit model and the display mode setting on the remote controller.	○	○
Relative temperature display	Changes the target temperature by selecting the temperature difference (between +3 and +5˚C or -3 and -5˚C, in 1˚C increments) between the preset reference temperature and the target temperature in the cool, dry, heat, or auto (single set point) mode. *The temperature can only be set to a value within the operation temperature range of the indoor unit. *When the relative temperature display is selected, certain restrictions apply to the system controller functions. *The reference temperature needs to be set to each operation mode.	○	○
Fan speed setting	Changes fan speed. * Available fan speeds vary depending on the model.	○	○
Air flow direction setting	Changes airflow direction. * Available airflow directions vary depending on the model.	○	○
Louver setting	Switches between louver ON/OFF.	○	○
Ventilation equipment control	Interlocked setting and interlocked operation setting with CITY MULTI Lossnay units can be performed. The Stop/Low/High settings of the ventilation equipment can be controlled.	○	○
Daylight saving time	The start/end time for daylight saving time can be set. The daylight saving time function will be activated based on the settings.	○	×
Error information	When an error occurs, an error code and the unit address appear. Air conditioning unit model, serial number, and contact number can be set to appear when an error occurs. (The information above needs to be entered in advance.) * An error code may not appear depending on the error.	—	○
Touch panel	The touch panel can be cleaned and calibrated.	—	○
Timer	ON/OFF timer Turns ON and OFF daily at a set time. • Time can be set in 5-minute increments. • It is also possible to set the ON time only or the OFF time only. Auto-OFF timer Turns off the unit after a certain period of operation. • Operation time can be set to a value from 30 to 240 minutes in 10-minute increments.	○	○
Allows/disallows local operation	The following operation can be prohibited by applying certain settings on the centralized controller: ON/OFF, operation mode setting, temperature setting, and filter sign reset. * While an operation is prohibited, the operation icon lights up (only on the Main display in "Full" mode).	×	○
Operation lock	The following operations can be prohibited: "Location." "ON/OFF," "mode." "Set temp." "Menu." "Fan." "Louver." or "Vane."	○	○
Temperature range restriction	The room temperature range for each operation mode can be restricted.	○	○
Auto return	The units operate at the preset temperature after a designated period. (Time can be set to a value from 30 to 120 minutes in 10-minute increments.) * Not valid when the temperature setting range is restricted.	○	×
Design	The color of the screen can be changed.	○	○

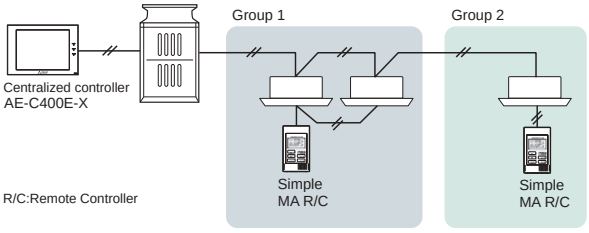
Simple MA remote controller

PAC-YT52CRA



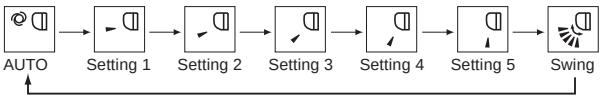
Dimensions 70(W) x 120(H) x 14.5(D) mm
2-3/4(W) x 4-3/4(H) x 19/32(D) in.

Example of system configuration



- **Backlit LCD**
  Backlight for operation in dark areas
- **Flat back**
  Slim and flat type. Hole-free installation on walls
  Less than 14.5 mm [19/32 in.] thick.
- **Vane button (standard)**
  A vane adjustment button has been added to allow the user to change the direction of the air flow (ceiling-cassette and wall-mounted types).

  Pressing the button will switch the vane directions.



  * Air flow direction settings will vary depending on the connected indoor unit model.
  * For models without a vane adjustment function, air flow direction cannot be set. In such cases, the vane icon blinks when the button is pressed.

- **Only cross-over wiring based on two-wire signal lines is required.**
- **Room temperature sensor is built-in.**
- **Can be used to operate all types of indoor units.**
  *As this controller has limited functions, please use it in conjunction with the standard controller or a central controller.
- **LCD temperature settings and display are in 1°C /2°F increments.**

Functions

□: Each unit ○: Each group ×: Not available

Item	Description	Setting	Display
ON/OFF	Switches between ON and OFF.	○	○
Operation mode switching	Switches between Cool / Dry / Fan / Heat / Auto. Operation modes vary depending on the indoor unit model.	○	○
Temperature setting	Changes the set temperature. * Set temperature range varies depending on the indoor unit model.	○	○
Fan speed setting	Changes fan speed. * Available fan speeds vary depending on the model.	○	○
Vane setting	Switches the vane directions. * The settable vane direction varies depending on the indoor unit model to be connected.	○	○
Permit / Prohibit local operation	By setting a centralized controller, the following local operations can be prohibited: ON/OFF, operation mode, preset temperature. * The CENTRAL icon appears while local operations are prohibited.	×	○
Error	Displays the current error status with the address. * The address may hot be displayed depending on the error status.	×	□
Ventilation equipment	When the CITY MULTI indoor unit is connected, interlocked setting of the CITY MULTI LOSSNAY unit is possible. When the Mr. SLIM indoor unit (A-control) is connected, interlocked operation LOSSNAY unit (LGH-R(V) X Type) is possible.	○	○
Set temperature range limit	The preset temperature range can be restricted for each operation mode (COOL/HEAT/AUTO).	○	○

Wireless remote controller



PAR-FL32MA

Dimensions

58(W) x 159(H) x 19(D) mm
[2-5/16(W) x 6-5/16(H) x 3/4(D) in.]



PAR-SL101A-E

(PLFY-P VHM-PA, PLFY-P VFM-E1, PKFY-P VLM-E only)

Dimensions

66(W) x 188(H) x 22(D) mm
[2-5/8(W) x 7-13/32(H) x 7/8(D) in.]



PAR-FA32MA

Dimensions

70(W) x 120(H) x 22.5(D) mm
[2-3/4(W) x 4-3/4(H) x 7/8(D) in.]



PAR-SR5LA-E NEW

(PLFY-P VHM-PA signal receiver)

Dimensions

206(H) x 27(D) mm

PAR-SF9FA-E

(PLFY-VFM-E1 signal receiver)

Dimensions

214(H) x 25.5(D) mm



PAR-SL94B-E*/PAR-SR2MA-E

(Wireless remote controller kit for ceiling-suspended type)
* PAR-SL94B-E includes transmitter.

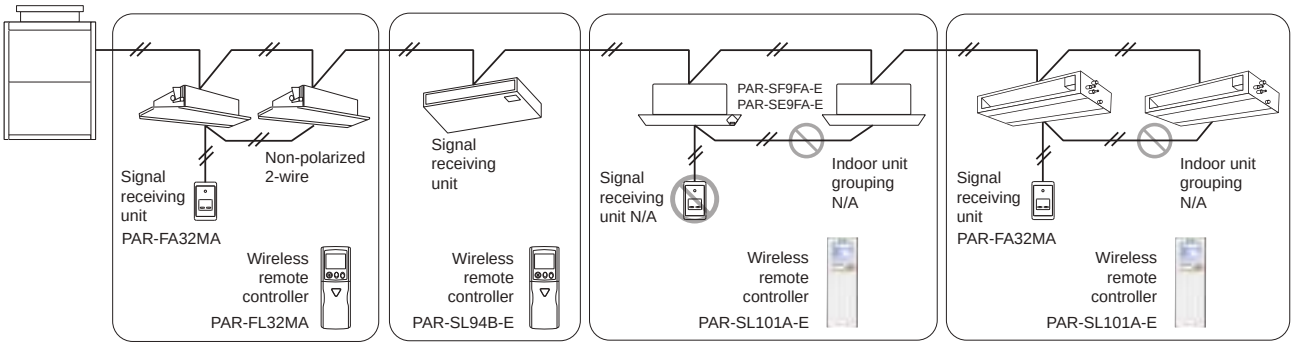
Dimensions

182(W) x 57(H) x 31(D) mm/
58(W) x 159(H) x 19(D) mm
[7-3/16(W) x 2-1/4(H) x 1-1/4(D) in.]/
[2-5/16(W) x 6-5/16(H) x 3/4(D) in.]

- **No need to configure addresses for group operation**
- **Lit LED keeps you informed of operation - the LED also provides you with error codes via the number of blinks**
- **Can be used with the MA remote controller**

  *When used in group configurations, wiring between indoor units is required.
  *Combining ME remote controller and/or LOSSNAY remote controller in a group is not possible.
- **Multiple indoor units cannot be controlled from the PAR-SL101A-E**
  Only one indoor unit can be used in each group
- **LCD temperature setting and display in 1°C /2°F increments**

System configuration example



Wireless remote controller

Compatibility table

Indoor unit model	Receiver model	Transmitter model
PLFY-P VMMD-E	PAR-FA32MA	PAR-FL32MA
PEFY-P VMR-E-L/R		
PEFY-P VMS1(L)-E		
PEFY-P VMA(L)-E4		
PEFY-P VMA3/4-E		
PEFY-P VMH(S)-E		
PEFY-P VMH(S)-E-F		
PFFY-P VKM-E2		
PFFY-P VEM-E		
PFFY-P VCM-E		
PMFY-P VBM-E		
PLFY-P VFM-E1	PAR-SF9FA-E	PAR-SL101A-E (PAR-FL32MA)*1*2
PLFY-EP VEM-E		
PLFY-P VHM-PA	PAR-SR5LA-E	
PCFY-P VKM-E	PAR-SL94B-E (PAR-SL94B-E includes a receiver and a transmitter.)	
PMFY-P VFM-PA	PAR-SR2MA-E	PAR-SL101A-E (PAR-FL32MA)*1*2
PKFY-P VKM-PA	Built-in	PAR-FL32MA
PKFY-P VLM-E	Built-in	PAR-SL101A-E (PAR-FL32MA)*1*2

*1 Use either PAR-SL101A-E or PAR-FL32MA to control each indoor unit, not both.
*2 Multiple indoor units cannot be controlled with the PAR-SL101A-E. Only one indoor unit can be used in each group.

Functions

○: Available ×: Not available

Item	Description	Setting	Display
ON/OFF	ON and OFF operation for a single group	○	○
Temperature setting	Changes the set temperature. * Set temperature range varies depending on the indoor unit model.	○	○
Fan speed setting	Models with 4 air flow speed settings: Hi/Mid-1/Mid-2/Low Models with 3 air flow speed settings: Hi/Mid/Low Models with 2 air flow speed settings: Hi/Low Auto setting varies depending on the model.	○*1	○*1
Air flow direction setting	Air flow direction angles (4-angle, Swing) Auto Louver ON/OFF. Air flow direction settings vary depending on the model.	○*1	○*1
Timer operation	One ON/OFF setting can be set per day.	○	○
Permit / Prohibit local operation	Individually prohibit operation of each local remote control function (ON/OFF, Change operation mode, Set temperature, Reset filter).	×	○*2

*1 Some models will have a different display for the air flowdirection and fan speed.
Set the air flow direction and fan speed when performing initial setting.
*2 If operation is performed when the local remote controller inactivation command is received from the main system controller, a buzzer will sound and an LED will flash.

Centralized Remote Controller

PI Controller

PAC-YG60MCA



Dimensions: 200(W) x 120(H) x 45(D) mm
7-7/8(W) x 4-3/4(H) x 1-13/16(D) in.

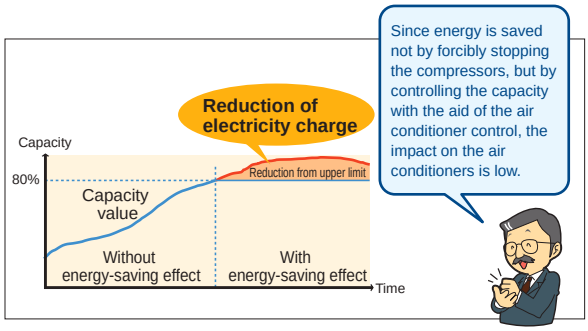
The PI controller counts pulses from a power meter, gas meter, water meter, and calorimeter.
Combining the use of the AE-C400E-X/EW-C50E-X allows for calculating the charges for each unit and performing peak cut (e.g., demand control) operation.
The meters can be monitored on the AE-C400E-X LCD.

Energy Saving Control (Peak Cut)

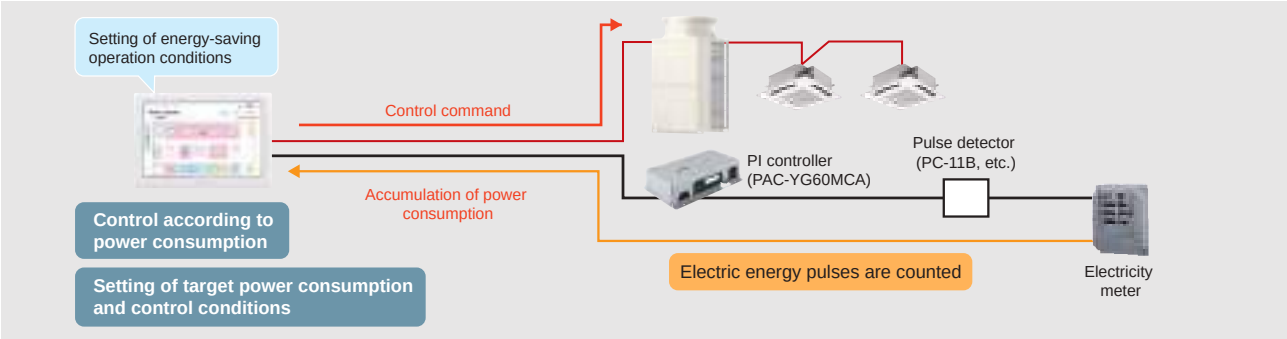
Enables Energy Saving Control with the use of our PI controller.

To perform energy saving, the capacity of the outdoor unit is controlled.

*Please note that when using an energy saving control,
there are no warranties for failures, such as usage over the contracted electricity amount.

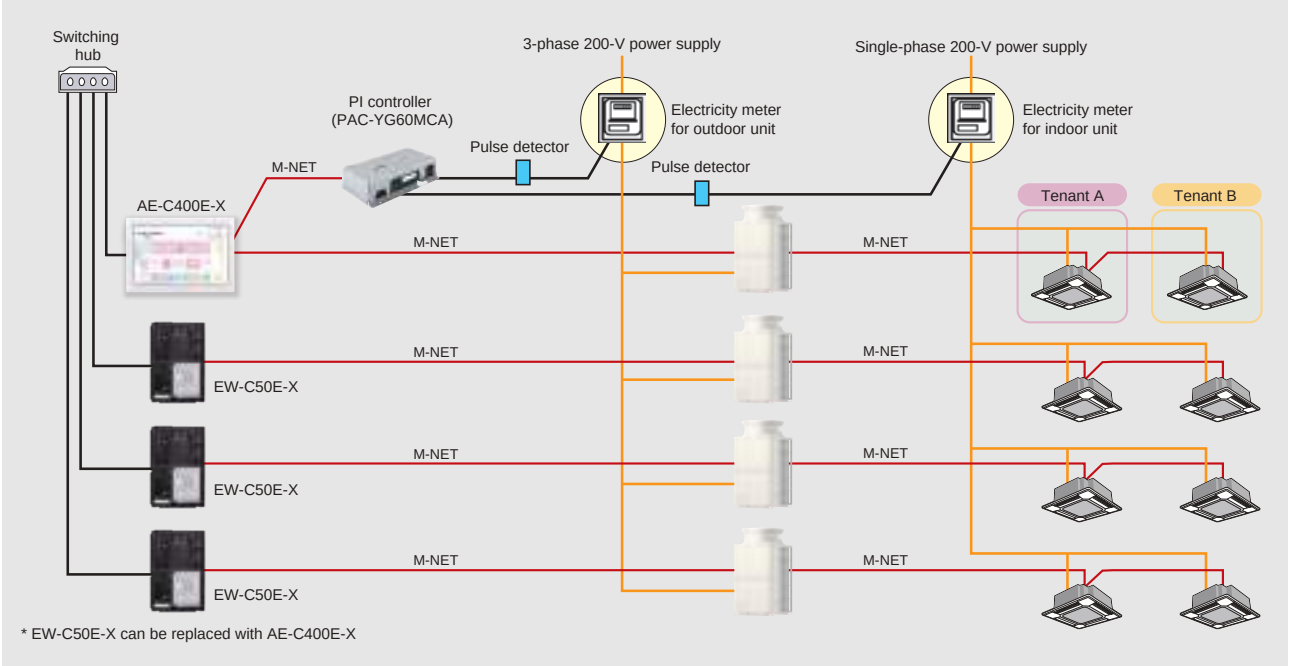


System Structure



Charge function (The charge lisence is required.)

Example of system configuration for apportionment by AE-C400E-X



* EW-C50E-X can be replaced with AE-C400E-X

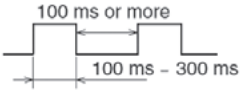
PI controller PAC-YG60MCA

Applicable to billing support system and energy-saving control system

Major features

Up to 4 units of Pulse-input measuring instruments (watt-hour meter, gas meter, water meter, and calorimeter) are connectable to PI controller and accumulate the amount based on the pulse unit designated from the AE-C400E-X/EW-C50E-X. AE-C400E-X/EW-C50E-X monitors the current value of the PI Controller regularly (in 1 minute interval).
The current value can be displayed on AE-C400E-X LCD, AE-C400E-X/EW-C50E-X Web browser.

Table of functions and specifications

Item	Rating and specification		
Power supply	24 VDC±10%: 5 W		Screw terminal block (M3) *3
Interface	M-NET communication	17 to 30 VDC *1	Screw terminal block (M3) *3
	Non-voltage a-contact input	Number of contacts: 4 Pulse signal: a-contact Pulse width: 100 ms to 300 ms (Idle period until next pulse: 100 ms or more)  Rated voltage: 24 VDC Rated current: 1 mA or less *2	Screwless terminal block
Environment conditions	Temperature	Operating temperature range: 0 to 40°C [32°F to 104°F]	
		Storage temperature range: -20 to 60°C [-4°F to 140°F]	
	Humidity	30 to 90%RH (no condensation)	
Dimensions	200 (W) × 120 (H) × 45 (D) mm / 7 7/8 (W) × 4 3/4 (H) × 1 25/32 (D) in		
Weight	0.6 kg [1 3/8 lbs.]		
Time backup during power failure	In the event of power failure or shut-off, the internal capacitor will continue to track time for approximately one week. (The internal capacitor takes about 24 hours to fully charge; a replacement battery is not necessary.)		
Installation environment	Inside a metal control panel (indoors) * Use this product in a hotel, a business office environment or similar environment.		

*1: Supply electric power from a power unit for the transmission line or an outdoor unit. Furthermore, the power consumption factor of M-NET circuitry of this device is “1/4” (equivalent to one ME Remote Controller).
*2: Supply electric power from the main unit to the contacts of the meters.
*3: M3 is the size of the screw on the terminal block (ISO metric screw thread). The number indicates the screw diameter (mm).

Centralized Remote Controller

DIDO Controller

PAC-YG66DCA



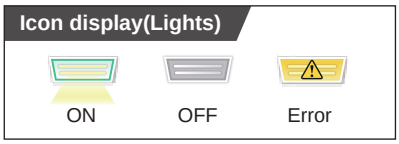
Dimensions	200(W) x 120(H) x 45(D) mm 7-7/8(W) x 4-3/4(H) x 1-13/16(D) in.

The DIDO controller is used in combination with an AE-C400E-X/EW-C50E-X to operate general-purpose equipment, as well as to monitor operating and error status. It is equipped with two sets of standard terminals (Channels 1 and 2), and four sets of expansion connectors for the input/output terminals. Expansion cable is optional.
Operation can be monitored or performed from the AE-C400E-X LCD.
In addition, this device includes a function that interlocks M-NET devices such as indoor units, general equipment, etc.

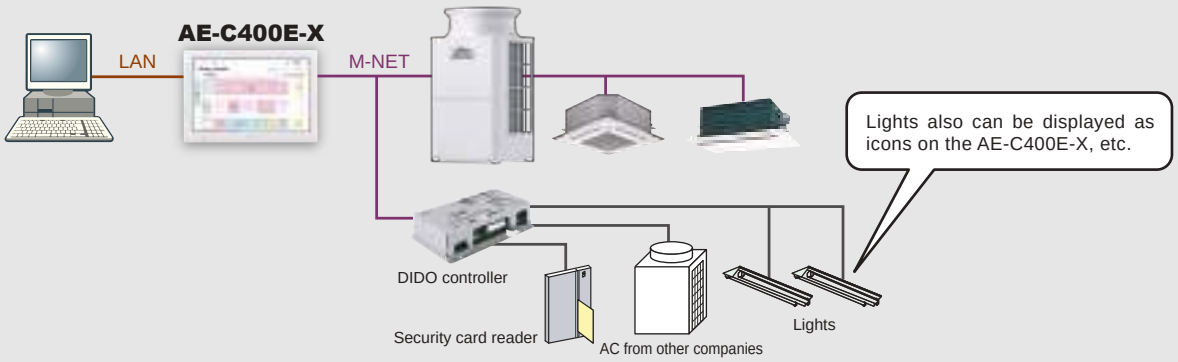
General-purpose equipment Control

Enables controlling and monitoring equipment other than air-conditioners (air-conditioners from other companies, lights, ventilators, etc.)

- In addition to above, the air-conditioners can be interlocked with general-purpose equipment.
  E.g. Interlock between indoor units and security system.
- The indoor units can be turned ON/OFF when the security system is activated/deactivated.



System Structure



AI Controller

PAC-YG63MCA



Dimensions 200(W) x 120(H) x 45(D) mm
7-7/8(W) x 4-3/4(H) x 1-13/16(D) in.

The AI controller measures temperature and humidity; it also has an alarm capability if the measurement data exceed defined setpoints.
Historical measurement data can be displayed only via the AE-C400E-X/EW-C50E-X web browser .
Temperature and humidity can be displayed on the AE-C400E-X LCD.
Furthermore, an alarm can be output if measurement data exceeds a preset upper or lower limit.
The AI controller also features a function that interlocks M-NET devices for indoor units, etc.

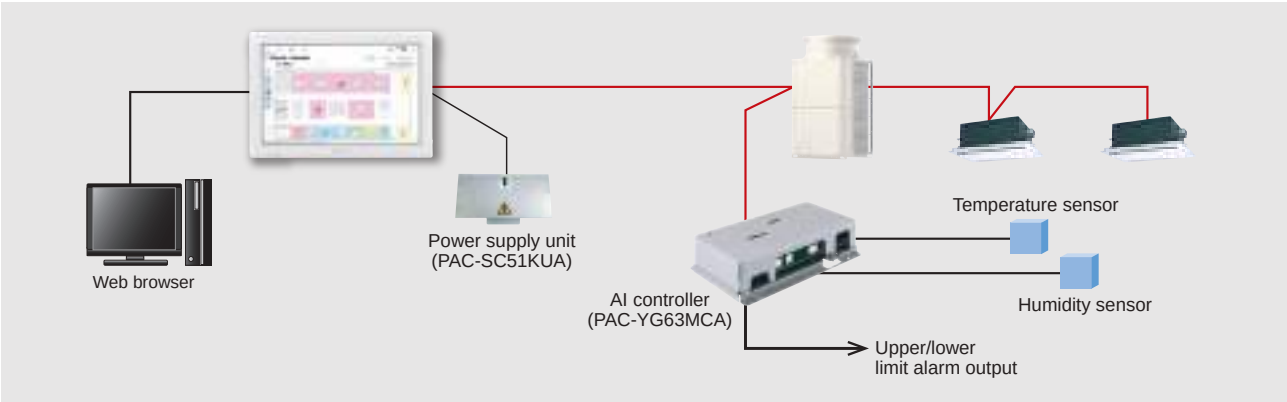
Temperature/Humidity Monitoring

Monitors the values measured by the temperature / humidity sensor connected to the AI controller

Temperature: Pt100, 4 to 20 mA DC, 1 to 5 VDC, 0 to 10 VDC
Humidity: 4 to 20 mA DC, 1 to 5 VDC, 0 to 10 VDC

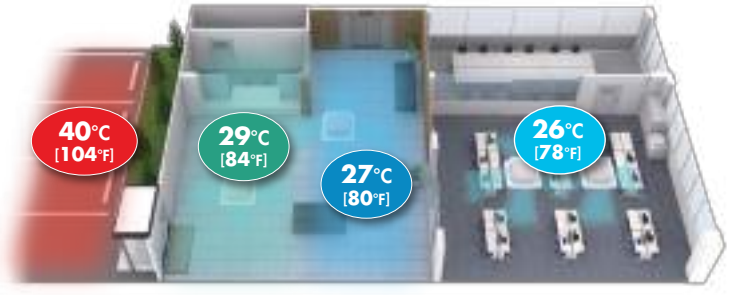
- Trend displays of measurement data can be shown on a web browser and AE-C400E-X.
- An alarm can be output by e-mail when measurement data exceeds a preset upper or lower limit.

System Structure

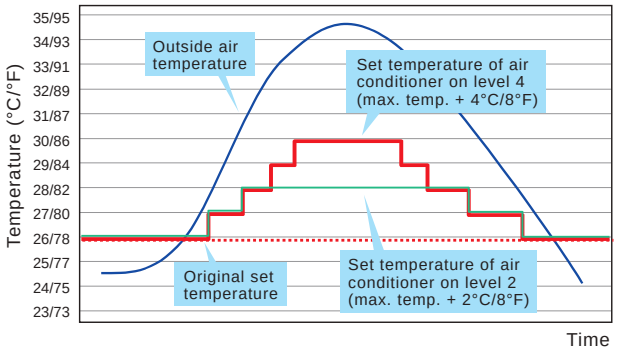


Operation according to outside air temperature

This function controls the air conditioner's operation during the cooling/heating period to reduce the difference between the outside air temperature and the temperature in the building (near the entrance), thereby preventing stress to human health caused by rapid temperature changes. The function is effective in saving energy and can be set for each group.



The degree of change in set temperature from level 1 (1°C/2°F) to 4 (4°C/8°F) can be set for each air conditioner.



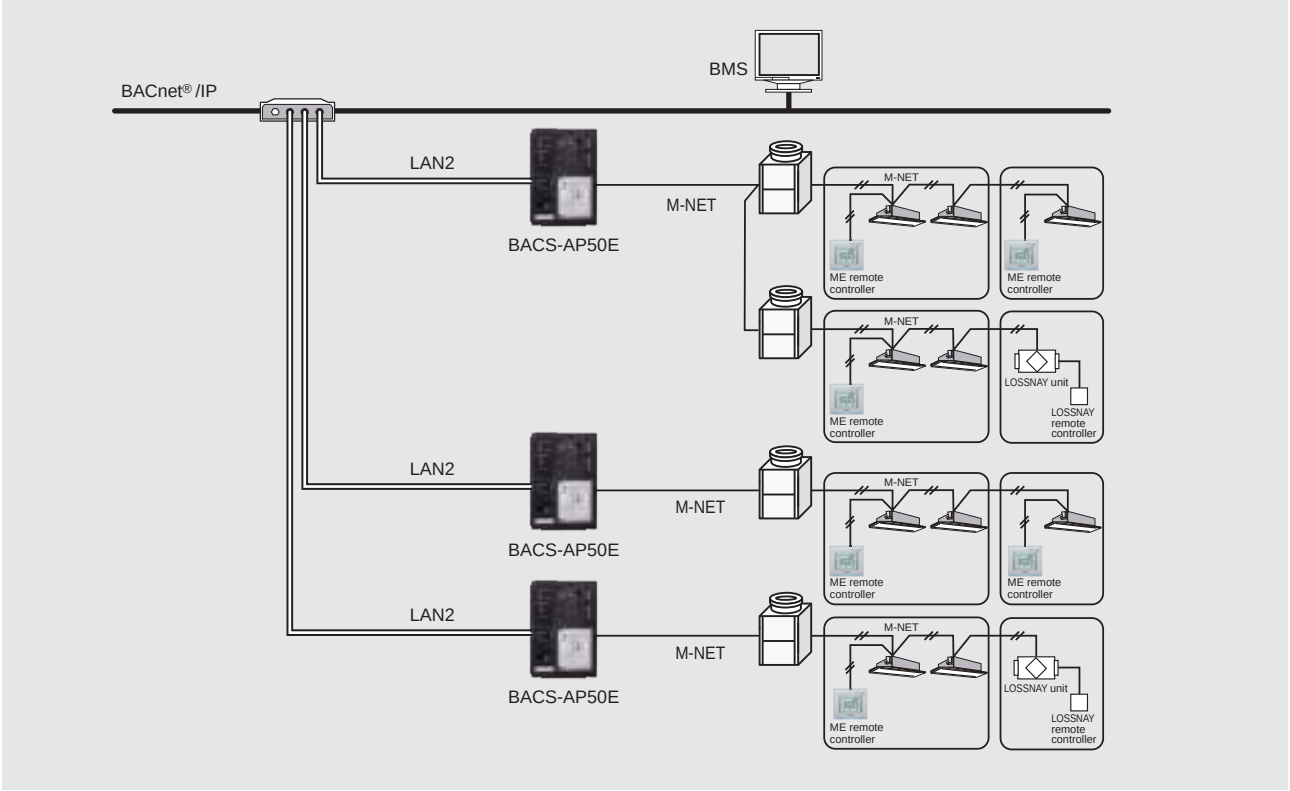
Open network supported

BACnet® (BACS-AP50E) NEW

CITY MULTI can be easily configured into a Building Management System (BMS) using the BACnet® protocol and the M-NET adapter BACS-AP50E. BACnet® is an open transmission protocol commonly used for controlling equipment within a BMS.
The BACS-AP50E can control up to 50 units or groups.
Additional BACS-AP50E adapters can be installed within a centralized controller system to control more than 50 units or groups.

Dual Set Point

System example



BACnet® and M-NET adapter

FUNCTION	CONTENT
Operation	
ON/OFF	ON/OFF
Mode	Cool/Dry/Heat/Auto/Fan
Fan Speed	Low-Mid2-Mid1-High-Auto
Air Direction	Horizontal-60%-80%-100% swing
Set Temperature	Changes the set temperature. * Set temperature range varies depending on the indoor unit model.
Filter Sign Reset	Normal/Reset
Permit/Prohibit	ON/OFF, Mode, Filter sign reset, Set temp, Fan speed
Forced Off	Reset/Execute
Ventilation Mode	Heat Recovery/Bypass/Auto
Air to Water Mode	Heating/ECO/Hot Water/Antifreeze/Cooling

FUNCTION	CONTENT
Monitoring	
ON/OFF	ON/OFF
Mode	Cool/Dry/Heat/Auto/Fan
Fan Speed	Low-Mid2-Mid1-High-Auto
Air Direction	Horizontal-60%-80%-100% swing
Set Temperature	Changes the set temperature. * Set temperature range varies depending on the indoor unit model.
Filter Sign	ON/OFF
Permit/Prohibit	ON/OFF, Mode, Filter sign reset, Set temp, Fan speed
Indoor Temperature	Temperature
Alarm Signal	Normal/Error
Error Code	2 Character code- Indicates all unit alarms
Error Code Detail	4 Character code- Indicates all unit alarms
Communication State	Normal/Error
Ventilation Mode	Heat Recovery/Bypass/Auto
Air to Water Mode	Heating/ECO/Hot Water/Antifreeze/Cooling
Thermo On/Off State	ON/OFF
External Heat Source State	ON/OFF
Trend Log	Indoor Temp



Lossnay



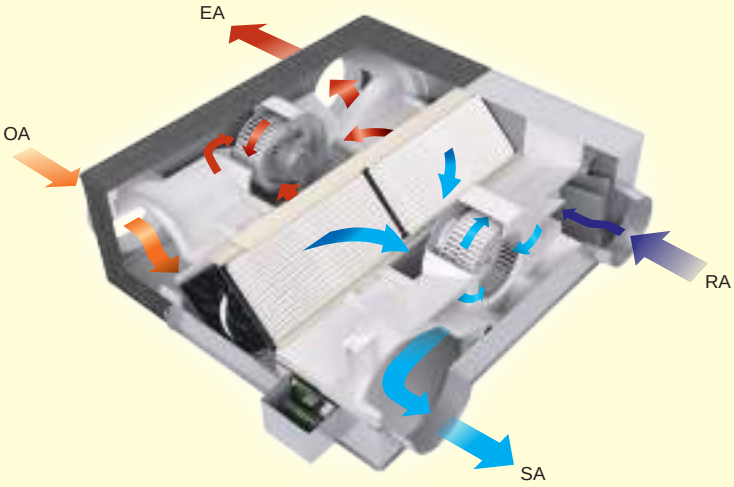
LOSSNAY System

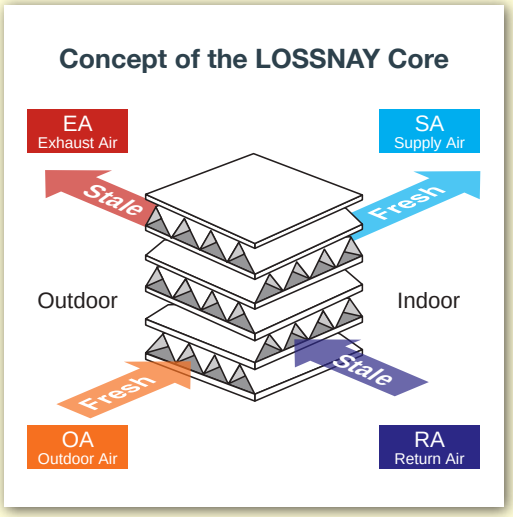
What is LOSSNAY?

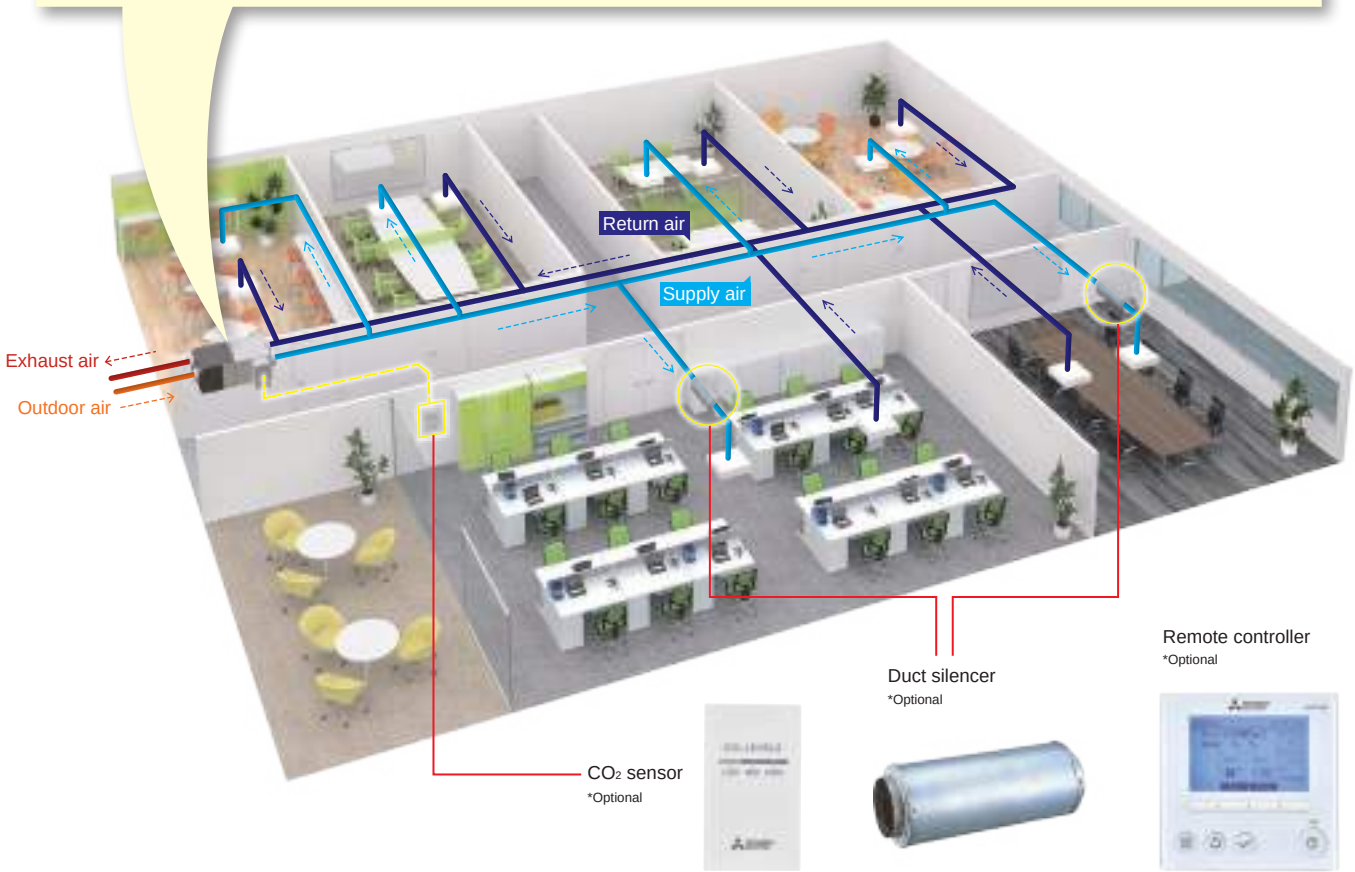
LOSSNAY is a total heat exchange ventilation system that uses paper characteristics to perform temperature (sensible heat) and humidity (latent heat) exchange.

■ How does LOSSNAY work?

The LOSSNAY core located at the crosspoint of each airflow transfers heat and humidity while going through each cross-air passage.





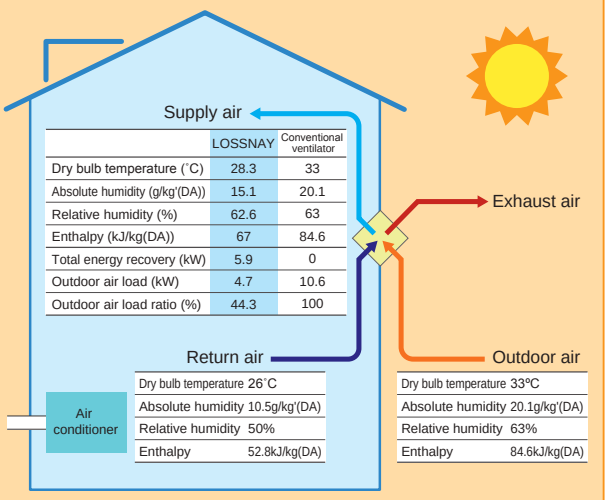


Temperature and Humidity Exchange

Without total heat exchange, air-conditioned air inside the building is expelled, and new hot or cold air is directly brought into the building. LOSSNAY can prevent this by total heat exchange so that fresh outdoor air is conditioned before it is brought into the room.

In summer

Air similar to the conditions of cooled (dehumidified) indoor air is supplied.



	LOSSNAY	Conventional ventilator
Dry bulb temperature (˚C)	28.3	33
Absolute humidity (g/kg'(DA))	15.1	20.1
Relative humidity (%)	62.6	63
Enthalpy (kJ/kg(DA))	67	84.6
Total energy recovery (kW)	5.9	0
Outdoor air load (kW)	4.7	10.6
Outdoor air load ratio (%)	44.3	100

Heat recovery calculation

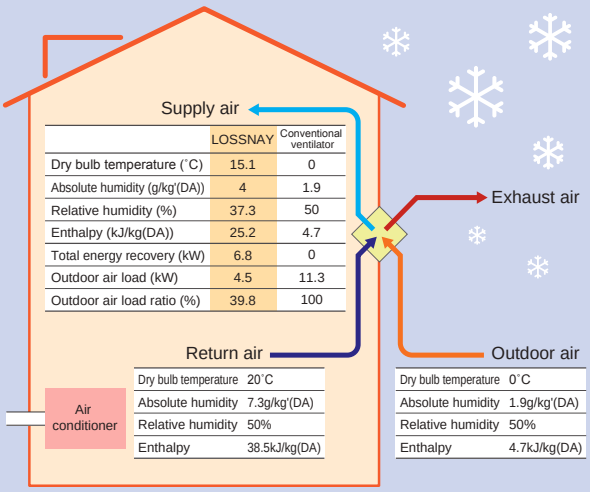
Indoor supply air temperature (ºC) = Outdoor temperature (ºC) - { Outdoor temperature (ºC) - Indoor temperature (ºC) } × Temp. recovery efficiency (%)

Calculation example: 28.3˚C = 33˚C - (33˚C - 26˚C) × 67.5%

*The above applies to the case of LGH-100RVX3-E(1000m³/h).

In winter

Air similar to the conditions of heated (humidified) indoor air is supplied.



	LOSSNAY	Conventional ventilator
Dry bulb temperature (˚C)	15.1	0
Absolute humidity (g/kg'(DA))	4	1.9
Relative humidity (%)	37.3	50
Enthalpy (kJ/kg(DA))	25.2	4.7
Total energy recovery (kW)	6.8	0
Outdoor air load (kW)	4.5	11.3
Outdoor air load ratio (%)	39.8	100

Heat recovery calculation

Indoor supply air temperature (ºC) = { Indoor temperature (ºC) - Outdoor temperature (ºC) } × Temp. recovery efficiency (%) + Outdoor temperature (ºC)

Calculation example: 15˚C = (20˚C - 0˚C) × 75.5% + 0˚C

*The above applies to the case of LGH-100RVX3-E(1000m³/h).

2 Main Benefits of Heat Exchange Ventilation

Energy Saving

Total heat exchange maintains comfortable room temperature, and thereby conserves energy and reduces the load on the air conditioning system

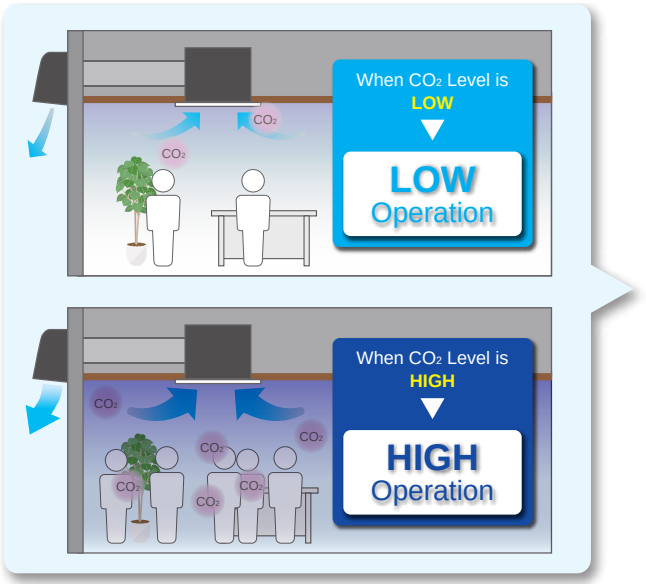
Clean

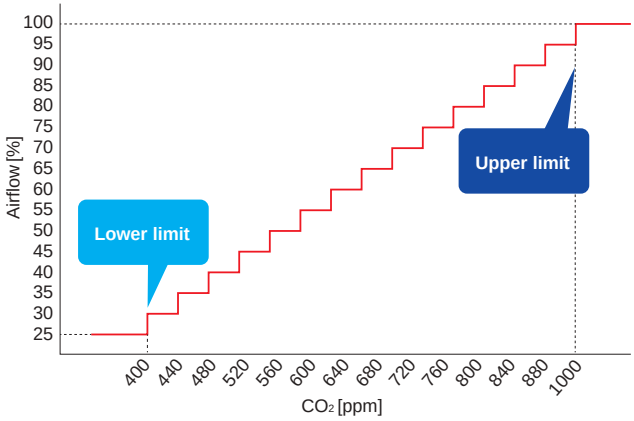
Outdoor air is filtered to prevent contaminants from coming in, and contaminated indoor air is expelled.

"CO_2 Sensor" — Clean and Efficient Operation

● 16 Steps of Automatic Airflow Control by CO_2 Level

The CO_2 sensor controls airflow in 16 steps depending on the CO_2 level in the room.
This saves energy by preventing over-ventilation while maintaining high indoor air quality.



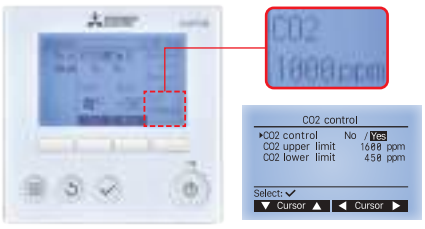


Upper Limit	600 to 2000 ppm
Lower Limit	300 to (upper limit - 300) ppm
Increment	50ppm

● 2 Ways to Monitor CO_2 Level

CO_2 level can be monitored with a LOSSNAY remote controller or wall-mounted CO_2 sensor.

LOSSNAY controller



PZ-62DR-EB

Wall-mounted CO_2 sensor

CO_2 in 3 levels : LOW, MID and HIGH

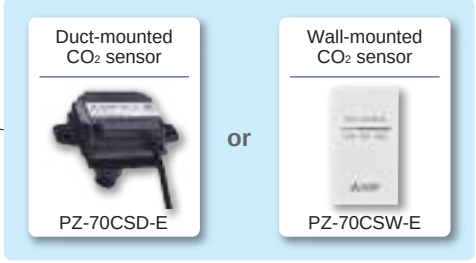


PZ-70CSW-E

● 2 Types of CO_2 Sensors

2 types of CO_2 sensors are available. Power is supplied to both sensors from the LOSSNAY circuit board.

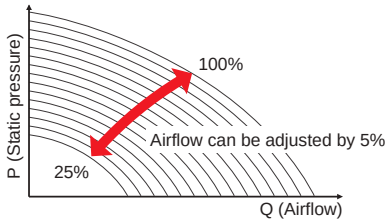




Other "Energy Saving" Features

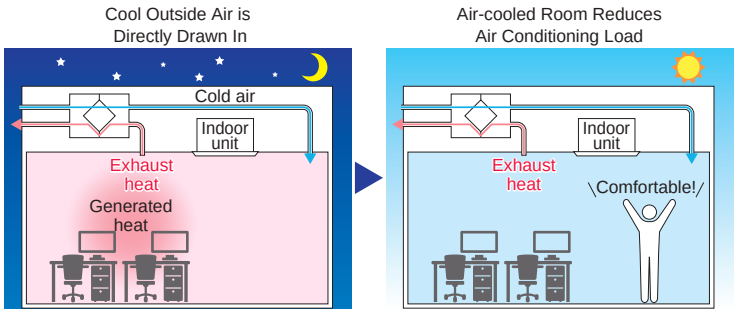
"Flexible Airflow Setting" Prevention of Over-Ventilation

Flexible airflow setting saves energy by preventing over-ventilation!
The fan speed of both supply and exhaust air can be flexibly adjusted within the range between 25% and 100% to ensure sufficient air volume. Airflow can be adjusted in 5% increments.



"Night Purge Mode" Reduction of Morning Air Conditioning Load

When the air conditioner is off and outside air is cooler at night, the Night Purge Mode draws the cooler air into the room. This mode reduces the load when the air conditioning starts up the next morning.



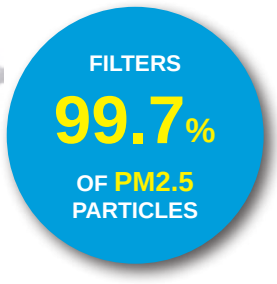
Other "Clean" Features

"Advanced High Efficiency Filter" Removes Outside Pollutants

The new optional filter (PZ-RFP3-E) removes 99.7% of particles larger than 0.5μm. By removing pollutants, fresh and clean air is supplied.

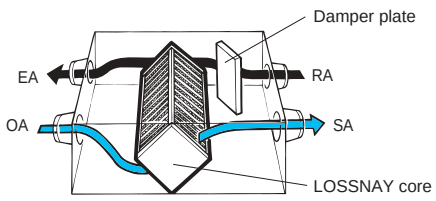
*GB/T 14295-2008: YG class 99.7%
(Collecting efficiency for particles that are 0.5μm or larger)
*PM2.5 is airborne particulates that are 2.5μm or smaller in size.
*The collecting performance of airborne particulates smaller than 0.3μm has not been confirmed.


PZ-RFP3-E



No heat exchange needed? Try the "Bypass Mode"

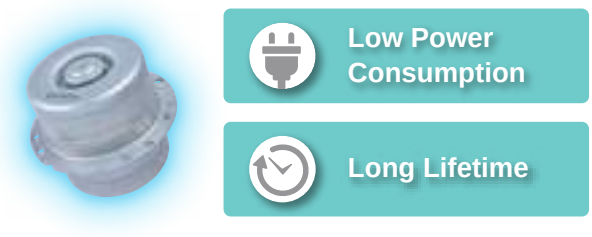
When air conditioning is off and heat exchange is not necessary, LOSSNAY can automatically switch to Bypass Mode.
This enables simple ventilation while filtering outside pollutants, so indoor air quality is maintained without heat exchanging the outside air.



"EC Motor" — High Static Pressure and Low Power Consumption

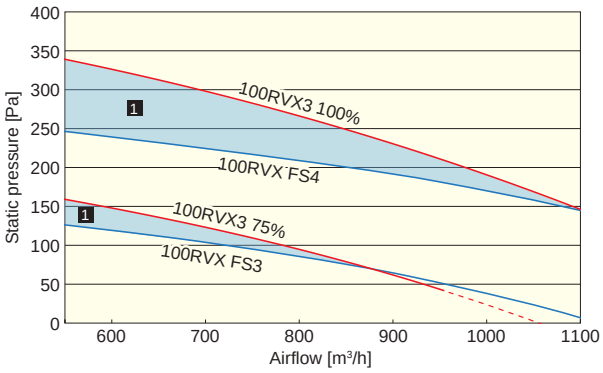
LOSSNAY uses a high efficiency EC motor to realize low power consumption. The RVX3 series is equipped with Mitsubishi Electric's original EC motor, which delivers improved external static pressure compared to the previous RVX model in addition to low power consumption. It also allows flexible duct work.

Mitsubishi Electric's EC Motor



The EC motor used in the RVX3 Series is developed and manufactured by Mitsubishi Electric.

Static Pressure of the RVX and RVX3 Series



1 Increased static pressure

*The dotted lines of the fan curve indicate reference values.

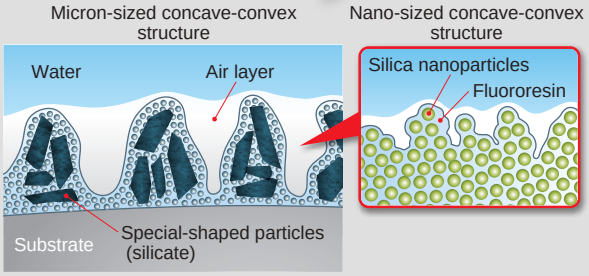
"Dual Barrier Coated Blades" — Reduce Maintenance Frequency

Dual Barrier Coating is applied to the fan blades of LOSSNAY to minimize the adherence of dirt. It keeps the fan in a cleaner state for a longer period of time and thus reduces maintenance frequency.



*Dual Barrier Coating is applied to air supply and exhaust fans

What Is Dual Barrier Coating?

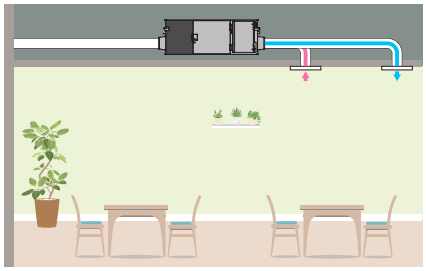


A water-repellent effect is achieved by creating a coating film that has nano-sized concave-convex structures formed by silica nanoparticles made of water-repellent fluororesin and micron-sized concave-convex structures formed by combining micron-sized special-shaped particles (silicate) with the silica nanoparticles. At the same time, the uneven structure forms an air layer that suppresses the adhesion of dust and sand that contain a lot of humidity, reducing the amount of dirt that adheres to the substrate.

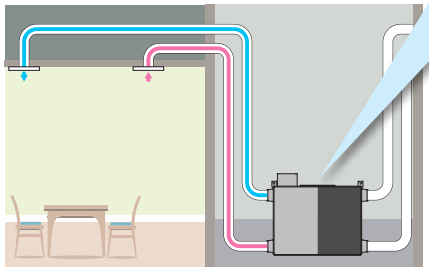
"Vertical and Horizontal Installation" — Flexible Installation

The RVX3 Series can be installed vertically for greater flexibility of installing locations. By using optional parts, it can be installed in places such as the machine room where only vertical installation is possible.

Horizontal Installation



Vertical Installation *NEW!*



■Vertical Installation Plates



EA side plate



RA side plate

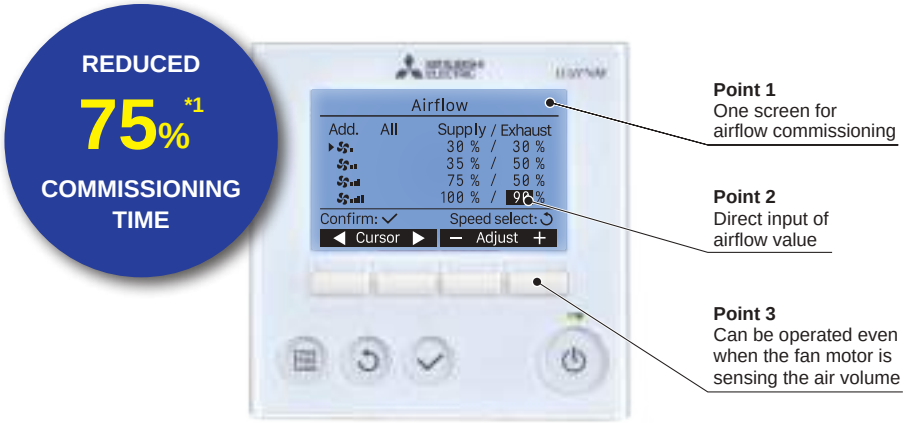


*Not applicable to LGH-160RVX3-E and LGH-200RVX3-E.
*Please follow the installation manual when installing the RVX3 series vertically.

Model name	LOSSNAY
PZ-1VS-E	LGH-15RVX3-E
	LGH-25RVX3-E
	LGH-35RVX3-E
	LGH-50RVX3-E
PZ-2VS-E	LGH-65RVX3-E
	LGH-80RVX3-E
	LGH-100RVX3-E

"New Remote Controller" — Short Commissioning Time

New remote controller PZ-62DR-EB allows supply and exhaust air volume to be adjusted from FS1 to FS4 directly on one screen. It can also be operated while the fan motor is sensing the air volume.
By using PZ-62DR-EB, the commissioning time for LGH-RVX3 is reduced by 75%*1 compared to the previous RVX series when using PZ-61DR-E.



PZ-62DR-EB

*1: The average reduction rate when our workers actually install LGH-100RVX-E with PZ-61DR-E and LGH-100RVX3-E with PZ-62DR-EB.
Setting work involves changing the air volume of supply/exhaust air. The time that can be reduced varies depending on the operator and work conditions.

RVX3 is tested under International standards!

From the new RVX3 Series, LOSSNAY is tested under the latest ISO and EN international standards in place of the conventional JIS Japanese standard. Testing under the standards of European countries can more widely prove that LOSSNAY is ecological at the global level.
Due to the change in testing standards, the method for testing temperature and enthalpy exchange has also changed, so that values are now shown to be lower than the previous model.

Japanese Standard (JIS B8628)

GLOBAL

International/European Standards ISO 16494 / EN 308

*LGH-15/25/35/50RVX3-E is tested under ISO16494,
LGH-65/80/100/160/200RVX3-E is tested under EN308 standards.

The **LOSSNAY RVX3 Series also complies with the ErP (Energy-related Products) Directive** which is required in the EU.

RVX3 is ErP Compliant!

ErP stands for Energy-related Products and refers to products that have an impact on energy consumption during use.

Being ErP compliant proves that **products meet the regulation set out by the European Commission.** Compliance with ErP indicates that LOSSNAY is a high-efficiency, ecological product.

■Regulations for compliance with the ErP Directive

Model	Criteria
Small Air Volume Model (15-50RVX3)	1 Air volume can be controlled by 3 or more notches.
	2 Has a bypass mode.
	3 Complies with the required specific energy consumption.
	4 Shows a signal when filter exchange is needed.
Large Air Volume Model (65-200RVX3)	1 Air volume can be controlled by 3 or more notches.
	2 Has a heat recovery function.
	3 Has a bypass mode.
	4 Heat recovery rate for heating is 73% or more.
	5 Complies with the required specific fan power.

Specifications & Dimensions

LGH-15RVX3-E
LGH-25RVX3-E
LGH-35RVX3-E
LGH-50RVX3-E
LGH-65RVX3-E
LGH-80RVX3-E
LGH-100RVX3-E



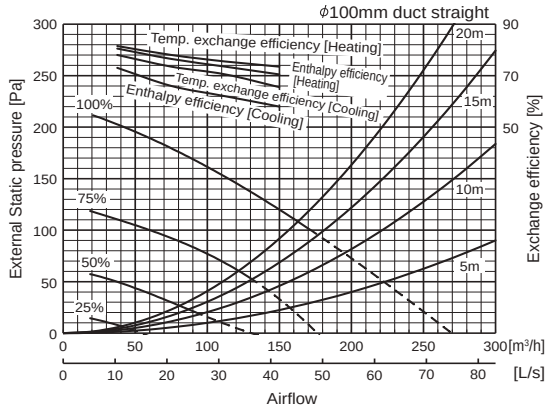
LGH-160RVX3-E
LGH-200RVX3-E



Model		LGH-15RVX3-E			
Electrical power supply		220-240V/50Hz, 220V/60Hz			
Fan speed		4	3	2	1
Default Airflow setting		100%	75%	50%	25%
Input power (W)*1		55	30	15	10
Airflow*1	(m^3/h)	150	113	75	38
	(L/s)	42	31	21	10
Specific fan power [W/(L/s)]*1		1.32	0.96	0.72	0.96
External static pressure (Pa)*1		120	68	30	8
Temperature exchange efficiency (%)*1	Heating	73.5	75.5	78.0	81.5
	Cooling	65.5	70.5	73.5	78.0
Enthalpy exchange efficiency (%)*1	Heating	70.5	73.5	76.5	80.5
	Cooling	58.0	62.0	66.0	73.0
Noise (dB)*2		27.0	22.0	18.0	17.0
Exhaust air transfer ratio (%)*3		5			
Weight (kg)		20			

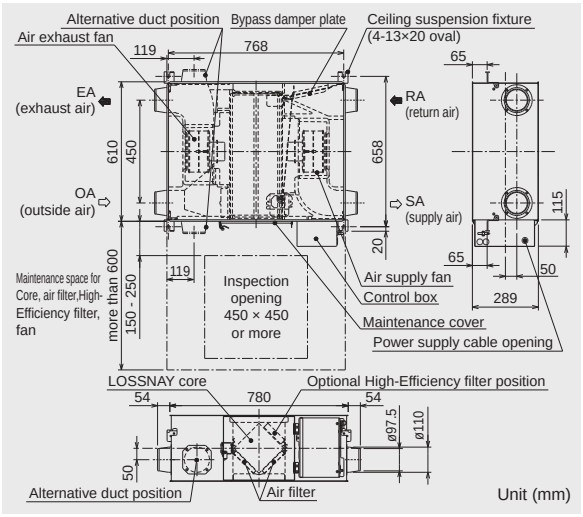
*Input power, efficiency, and noise are based on rated air volume, 230V/50Hz and horizontal installation.
*1 : Measured according to ISO 16494-1: 2022 *2 : A-weighted sound pressure level measured at 1.5m under the center of the unit in an anechoic chamber.
*3 : Measured according to EN308: 2022 / FS3

Characteristic Curve of the LGH-15RVX3-E



*The dotted lines of the fan curves are reference values.

Dimensions of the LGH-15RVX3-E



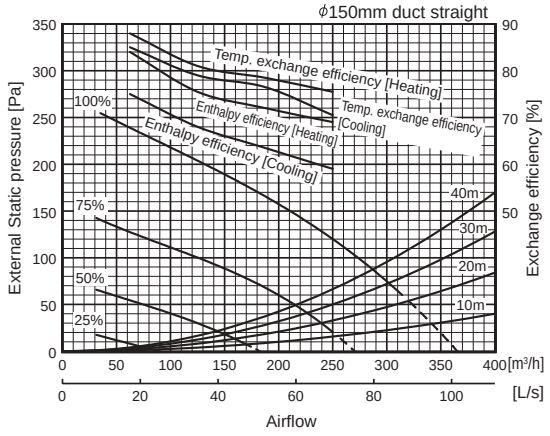
● Certain ratings and specifications may change due to product improvements or modifications. ● Refer to the product manual for safety precautions.

LGH-25/35RVX3-E

Model		LGH-25RVX3-E				LGH-35RVX3-E			
Electrical power supply		220-240V/50Hz, 220V/60Hz				220-240V/50Hz, 220V/60Hz			
Fan speed		4	3	2	1	4	3	2	1
Default Airflow setting		100%	75%	50%	25%	100%	75%	50%	25%
Input power (W)*1		75	42	21	11	120	61	29	15
Airflow*1	(m^3/h)	250	188	125	63	350	263	175	88
	(L/s)	69	52	35	17	97	73	49	24
Specific fan power [W/(L/s)]*1		1.08	0.81	0.60	0.63	1.23	0.84	0.60	0.62
External static pressure (Pa)*1		120	68	30	8	160	90	40	10
Temperature exchange efficiency (%)*1	Heating	75.5	78.5	81.0	88.0	75.0	77.0	79.0	82.0
	Cooling	70.5	76.5	79.0	85.0	66.5	71.0	74.0	79.0
Enthalpy exchange efficiency (%)*1	Heating	69.0	72.0	75.5	84.0	72.0	74.5	77.5	80.0
	Cooling	59.0	63.5	68.0	75.0	60.0	64.5	68.5	74.5
Noise (dB)*2		30.5	25.0	19.5	17.0	30.5	24.5	19.0	17.0
Exhaust air transfer ratio (%)*3		5				5			
Weight (kg)		22				30			

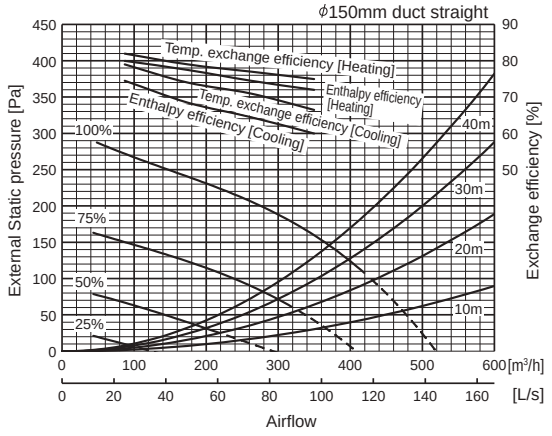
*Input power, efficiency, and noise are based on rated air volume, 230V/50Hz and horizontal installation.
*1 : Measured according to ISO 16494-1: 2022
*2 : A-weighted sound pressure level measured at 1.5m under the center of the unit in an anechoic chamber.
*3 : Measured according to EN308: 2022 / FS3

Characteristic Curve of the LGH-25RVX3-E



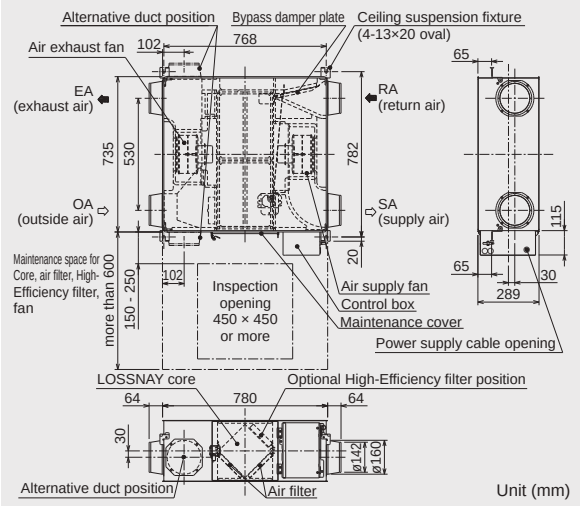
*The dotted lines of the fan curves are reference values.

Characteristic Curve of the LGH-35RVX3-E

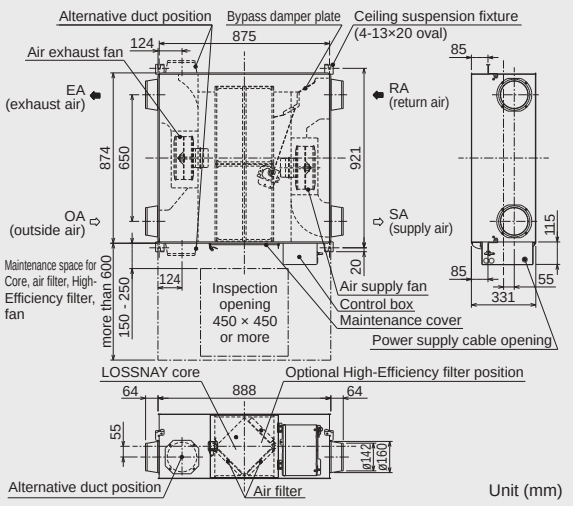


*The dotted lines of the fan curves are reference values.

Dimensions of the LGH-25RVX3-E



Dimensions of the LGH-35RVX3-E



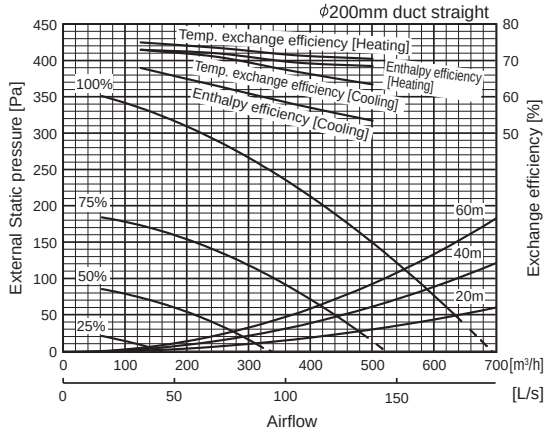
● Certain ratings and specifications may change due to product improvements or modifications. ● Refer to the product manual for safety precautions.

LGH-50/65RVX3-E

Model		LGH-50RVX3-E				LGH-65RVX3-E			
Electrical power supply		220-240V/50Hz, 220V/60Hz				220-240V/50Hz, 220V/60Hz			
Fan speed		4	3	2	1	4	3	2	1
Default Airflow setting		100%	75%	50%	25%	100%	75%	50%	25%
Input power (W)*1		185	81	34	15	245	120	51	20
Airflow*1	(m^3/h)	500	375	250	125	650	488	325	163
	(L/s)	139	104	69	35	181	135	90	45
Specific fan power [W/(L/s)]*1		1.33	0.78	0.49	0.43	1.36	0.89	0.56	0.44
External static pressure (Pa)*1		150	85	38	10	150	85	38	10
Temperature exchange efficiency (%)*2	Heating	70.5	71.5	73.5	75.0	72.5	75.0	78.5	82.0
	Cooling	63.5	67.0	71.0	73.0	65.0	70.0	74.5	80.0
Enthalpy exchange efficiency (%)*2	Heating	68.5	69.5	72.0	73.0	69.5	72.0	76.5	80.0
	Cooling	53.5	58.0	63.0	68.0	55.5	60.0	66.5	74.0
Noise (dB)*3		35.0	27.0	21.0	17.0	37.5	31.5	24.0	17.5
Exhaust air transfer ratio (%)*4		5				5			
Weight (kg)		33				41			

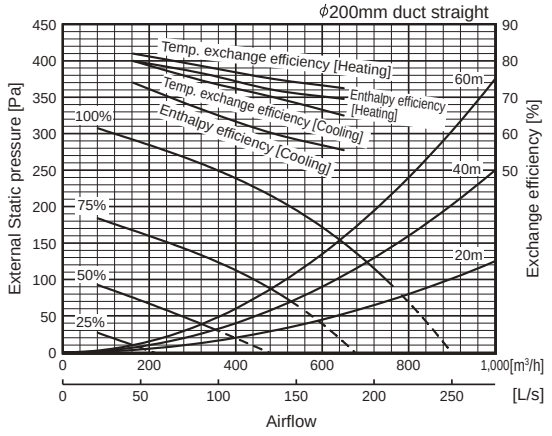
*Input power, efficiency, and noise are based on rated air volume, 230V/50Hz and horizontal installation.
*1 : Measured according to (LGH-50RVX3-E) ISO 16494-1: 2022, (LGH-65RVX3-E) EN13053: 2019
*2 : Measured according to (LGH-50RVX3-E) ISO 16494-1: 2022, (LGH-65RVX3-E) EN308: 2022
*3 : A-weighted sound pressure level measured at 1.5m under the center of the unit in an anechoic chamber.
*4 : Measured according to EN308: 2022 / FS3

Characteristic Curve of the LGH-50RVX3-E



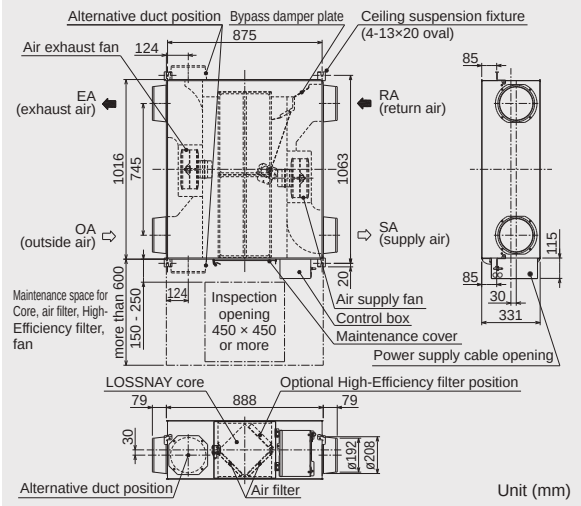
*The dotted lines of the fan curves are reference values.

Characteristic Curve of the LGH-65RVX3-E

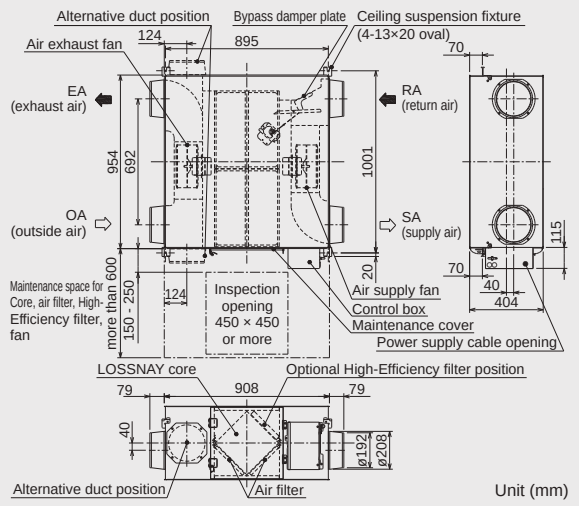


*The dotted lines of the fan curves are reference values.

Dimensions of the LGH-50RVX3-E



Dimensions of the LGH-65RVX3-E



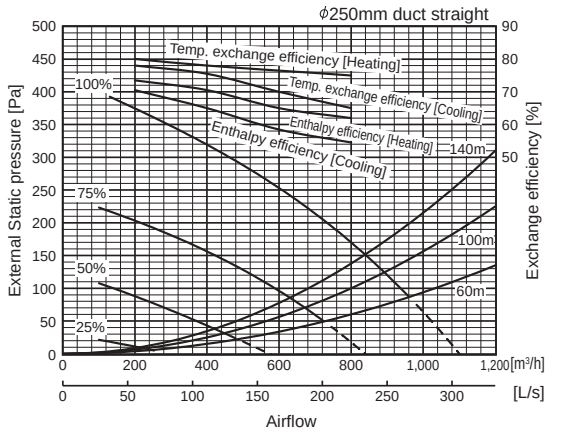
● Certain ratings and specifications may change due to product improvements or modifications. ● Refer to the product manual for safety precautions.

LGH-80/100RVX3-E

Model		LGH-80RVX3-E				LGH-100RVX3-E			
Electrical power supply		220-240V/50Hz, 220V/60Hz				220-240V/50Hz, 220V/60Hz			
Fan speed		4	3	2	1	4	3	2	1
Default Airflow setting		100%	75%	50%	25%	100%	75%	50%	25%
Input power (W)*1		343	160	64	23	438	210	83	27
Airflow*1	(m^3/h)	800	600	400	200	1000	750	500	250
	(L/s)	222	167	111	56	278	208	139	69
Specific fan power [W/(L/s)]*1		1.54	0.96	0.58	0.41	1.58	1.01	0.60	0.39
External static pressure (Pa)*1		170	96	43	11	190	107	48	12
Temperature exchange efficiency (%)*2	Heating	75.0	76.5	78.0	80.0	75.5	77.0	79.5	83.5
	Cooling	65.0	70.0	75.5	78.0	67.5	72.0	77.0	82.5
Enthalpy exchange efficiency (%)*2	Heating	62.0	65.0	70.5	73.5	60.5	63.0	68.5	75.5
	Cooling	54.5	58.5	65.0	70.5	55.5	61.0	66.0	73.5
Noise (dB)*3		39.0	33.5	25.0	18.0	40.0	35.0	27.0	18.5
Exhaust air transfer ratio (%)*4		5				5			
Weight (kg)		47				53			

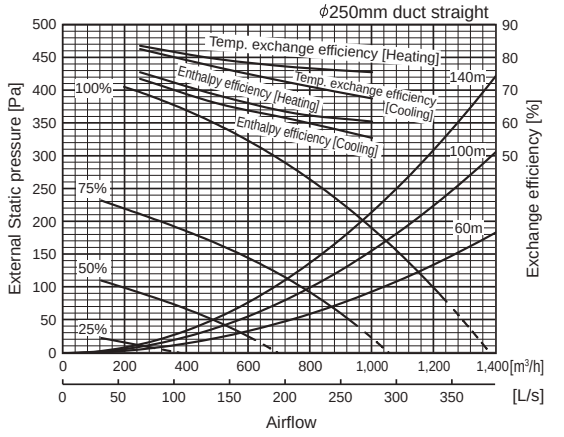
*Input power, efficiency, and noise are based on rated air volume, 230V/50Hz and horizontal installation.
*1 : Measured according to EN13053: 2019
*2 : Measured according to EN308: 2022
*3 : A-weighted sound pressure level measured at 1.5m under the center of the unit in an anechoic chamber.
*4 : Measured according to EN308: 2022 / FS3

Characteristic Curve of the LGH-80RVX3-E



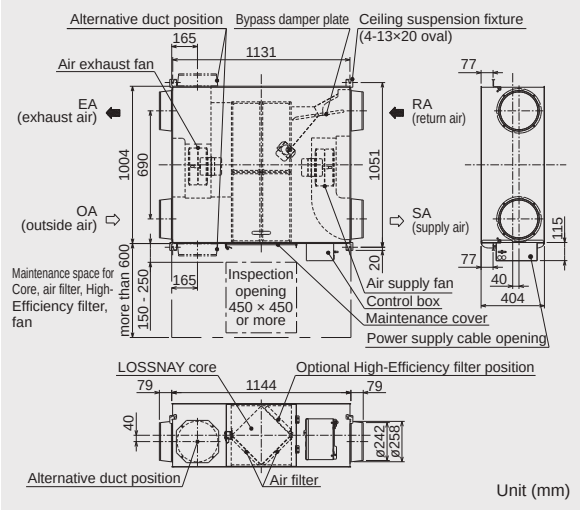
*The dotted lines of the fan curves are reference values.

Characteristic Curve of the LGH-100RVX3-E

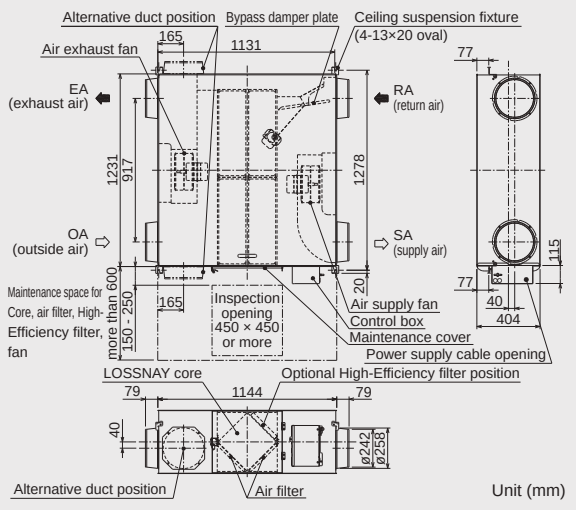


*The dotted lines of the fan curves are reference values.

Dimensions of the LGH-80RVX3-E



Dimensions of the LGH-100RVX3-E



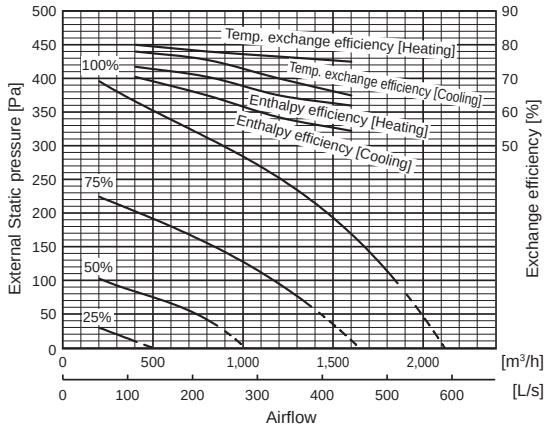
● Certain ratings and specifications may change due to product improvements or modifications. ● Refer to the product manual for safety precautions.

LGH-160/200RVX3-E

Model		LGH-160RVX3-E				LGH-200RVX3-E			
Electrical power supply		220-240V/50Hz, 220V/60Hz				220-240V/50Hz, 220V/60Hz			
Fan speed		4	3	2	1	4	3	2	1
Default Airflow setting		100%	75%	50%	25%	100%	75%	50%	25%
Input power (W)*1		687	324	128	45	855	416	163	57
Airflow*1	(m^3/h)	1600	1200	800	400	2000	1500	1000	500
	(L/s)	444	333	222	111	556	417	278	139
Specific fan power [W/(L/s)]*1		1.55	0.97	0.58	0.41	1.54	1.00	0.59	0.41
External static pressure (Pa)*1		170	96	43	11	170	96	43	11
Temperature exchange efficiency (%)*2	Heating	75.0	76.5	78.0	80.0	76.5	77.5	79.5	83.5
	Cooling	65.0	70.0	75.5	78.0	66.5	71.5	76.0	82.5
Enthalpy exchange efficiency (%)*2	Heating	62.0	65.0	70.5	73.5	60.5	64.0	67.5	76.0
	Cooling	54.5	58.5	65.0	70.5	57.0	60.0	65.0	71.0
Noise (dB)*3		41.0	35.0	26.0	18.0	41.5	36.0	27.5	18.0
Exhaust air transfer ratio (%)*4		5				5			
Weight (kg)		96				108			

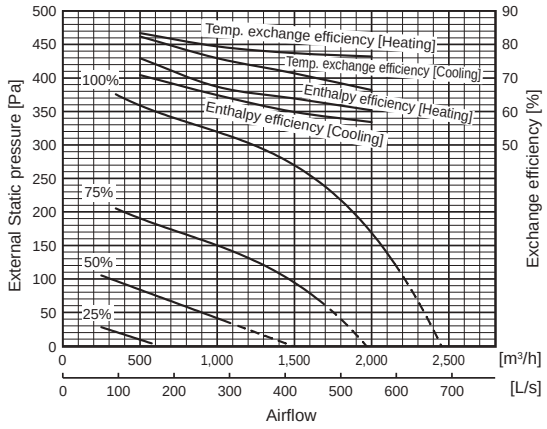
*Input power, efficiency, and noise are based on rated air volume, 230V/50Hz.
*1 : Measured according to EN13053: 2019
*2 : Measured according to EN308: 2022
*3 : A-weighted sound pressure level measured at 1.5m under the center of the unit in an anechoic chamber.
*4 : Measured according to EN308: 2022 / FS3

Characteristic Curve of the LGH-160RVX3-E



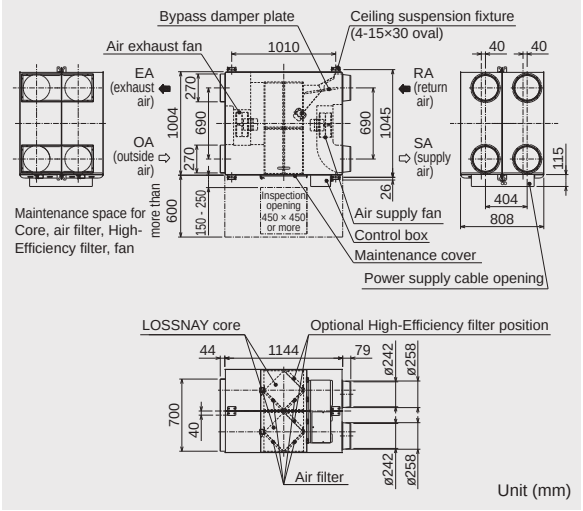
*The dotted lines of the fan curves are reference values.

Characteristic Curve of the LGH-200RVX3-E

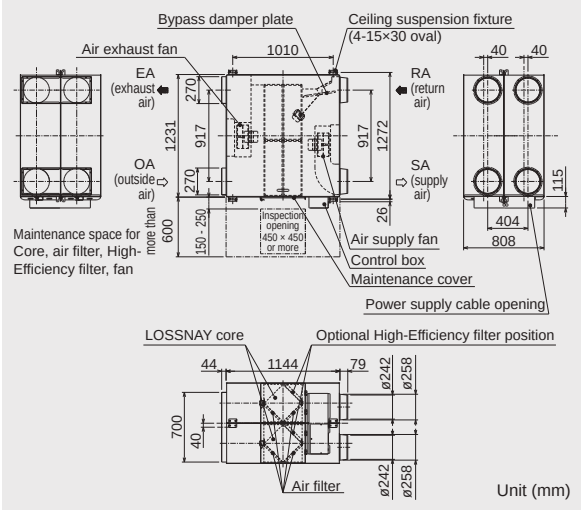


*The dotted lines of the fan curves are reference values.

Dimensions of the LGH-160RVX3-E



Dimensions of the LGH-200RVX3-E

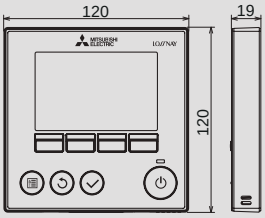
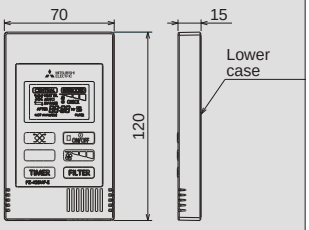


● Certain ratings and specifications may change due to product improvements or modifications. ● Refer to the product manual for safety precautions.

Optional Parts

Remote Controllers

■ Compatibility Table

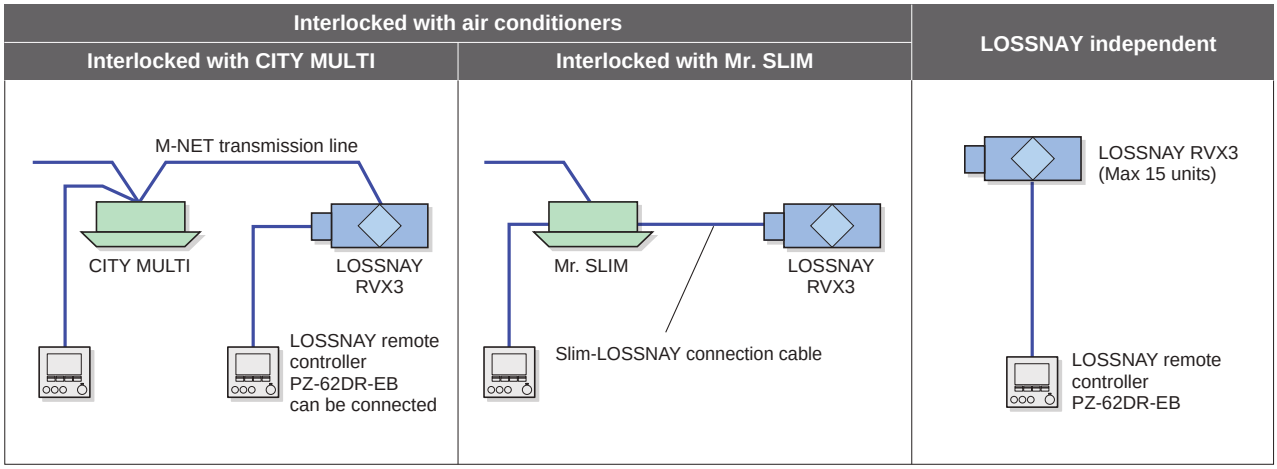
Model	PZ-62DR-EB	PZ-43SMF-E
Image		
Dimension	 Unit (mm)	 Unit (mm)
Fan speed selection	4 fan speeds and Auto (Auto is available when using a CO_2 sensor)	2 or 4 fan speeds
Control with a CO_2 sensor (Mitsubishi Electric)	Yes (Fan speed automatically changes from 25% to 100% depending on the CO_2 concentration*)	No
Control with a CO_2 sensor (field supply)	Yes (Fan speed automatically changes from 25% to 100% depending on the CO_2 concentration*)	No
Ventilation mode selection	Energy recovery/Bypass/Auto	Energy recovery/Bypass/Auto
Night-purge	Yes	No
Function setting from remote controller	Yes	No
Bypass temp. free setting	Yes	No
Flexible airflow setting	Yes (Both supply and exhaust fan speeds can be set separately from 25% to 100% in 5% pitches)	No
ON/OFF timer	Yes	Yes
Auto-off timer	Yes	No
Weekly timer	Yes	No
Fan speed timer	Yes	No
Operation restrictions (ON/OFF, ventilation mode, fan speed)	Yes	No
Operation restrictions (fan speed skip setting)	Yes	No
Screen contrast adjustment	Yes	No
Language selection	Yes (10 languages)	No (English only)
CO_2 concentration indication	Yes (Available when using a Mitsubishi Electric CO_2 sensor)	No
Filter cleaning sign	Yes (Maintenance interval can be changed)	Yes
LOSSNAY core cleaning sign	Yes	No
Error indication	Yes (Displays model name, serial number, contact information)	Yes
Error history	Yes	No
OA/RA/SA temp. display	Yes	No

*When using a CO_2 sensor, upper and lower limits may differ.

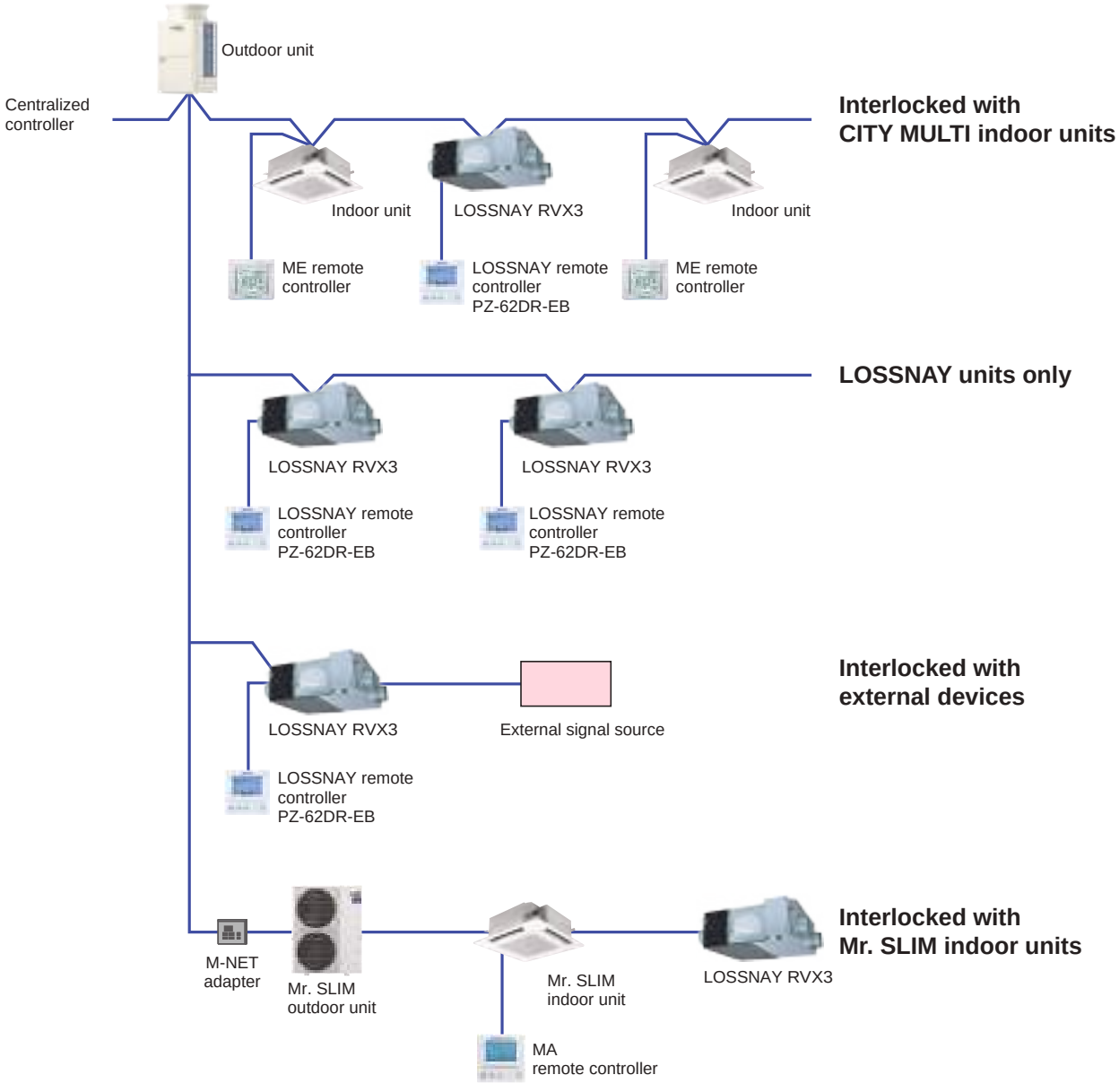
● Certain ratings and specifications may change due to product improvements or modifications.

■ Control

The new remote controller PZ-62DR-EB enables simple control setting



Centralized controller system



Optional Parts

Filters

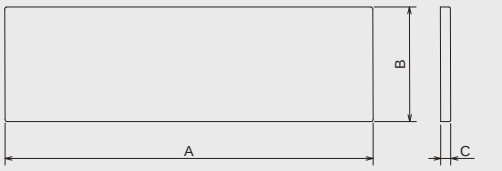
Two types of filters are available to ensure optimum indoor air quality. All filters are ISO certified, and can be easily installed in the units.

■ Performance

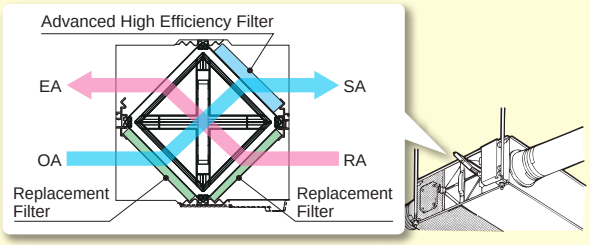
Model		PZ-RF3-E series	PZ-RFP3-E series
Name		Replacement Filter (Standard)	Advanced High Efficiency Filter **Optional**
Image			
Filter Material		Non-woven fabric	Synthetic fiber
Performance	ISO	Coarse 60% (ISO16890-2016)	ePM1 75%, ePM2.5 80%, ePM10 95% (ISO 16890-2016)
	ASHRAE	-	MERV16 (ASHRAE 52.2-2017)
	GB/T	-	YG class, 99.7% (GB/T 14295-2008) Collecting efficiency for particles 0.5μm or larger at rated airflow.

■ Specifications and Dimensions

■ Dimension



Unit (mm)



Filter					Number of Purchase		Installation		
Model	Dimension(mm)			Number of filters per set	Applicable model	Required set per unit	Total number of filters		
	A	B	C					OA	RA
PZ-15RF3-E	549	125	20	2	LGH-15RVX3-E	1	2	1	1
PZ-25RF3-E	654	151	15	2	LGH-25RVX3-E	1	2	1	1
PZ-35RF3-E	784	178	15	2	LGH-35RVX3-E	1	2	1	1
PZ-50RF3-E	926	178	15	2	LGH-50RVX3-E	1	2	1	1
PZ-65RF3-E	852	213	15	2	LGH-65RVX3-E	1	2	1	1
PZ-80RF3-E	890	238	15	2	LGH-80RVX3-E	1	2	1	1
PZ-100RF3-E	1117	238	15	2	LGH-160RVX3-E	2	4	2	2
					LGH-100RVX3-E	1	2	1	1
					LGH-200RVX3-E	2	4	2	2

Filter					Number of Purchase		Installation	
Model	Dimension(mm)			Number of filters per set	Applicable model	Required set per unit	Total number of filters	
	A	B	C					SA
PZ-15RFP3-E	542	104.5	25	1	LGH-15RVX3-E	1	1	1
PZ-25RFP3-E	322	128.5	25	2	LGH-25RVX3-E	1	2	2
PZ-35RFP3-E	390	158.5	25	2	LGH-35RVX3-E	1	2	2
PZ-50RFP3-E	461	158.5	25	2	LGH-50RVX3-E	1	2	2
PZ-65RFP3-E	423	197.5	25	2	LGH-65RVX3-E	1	2	2
PZ-80RFP3-E	442	215.5	25	2	LGH-80RVX3-E	1	2	2
PZ-100RFP3-E	554	215.5	25	2	LGH-160RVX3-E	2	4	4
					LGH-100RVX3-E	1	2	2
					LGH-200RVX3-E	2	4	4

• Certain ratings and specifications may change due to product improvements or modifications.

CO_2 Sensors

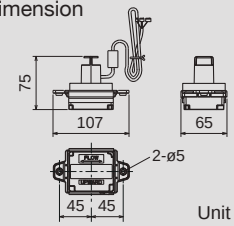
A CO_2 sensor connected directly to the LOSSNAY RVX3 unit optimizes the fan speed according to the level of CO_2 detected.

<Duct-mounted type> PZ-70CSD-E



Mounted in the duct with all the wiring hidden in the ceiling.

■ Dimension



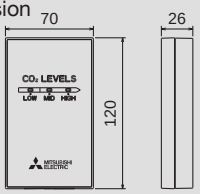
Unit (mm)

<Wall-mounted type> PZ-70CSW-E



Mounted on the wall. CO_2 is monitored in 3 levels.

■ Dimension



*A 10m cable is included as a connection accessory.

Unit (mm)

Vertical Installation Plates

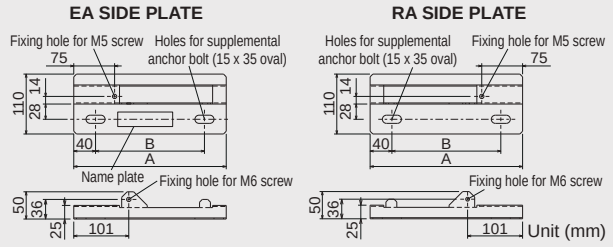
PZ-1VS-E, PZ-2VS-E



EA side plate RA side plate

Parts used to install RVX3 vertically.

■ Dimension



Unit (mm)

■Change dimension table (Unit:mm)

Model	A	B	Weight (kg)	Applicable model
PZ-1VS-E	280	200	1.2	LGH-15 to 50RVX3-E
PZ-2VS-E	380	300	1.6	LGH-65 to 100RVX3-E

*Not applicable to LGH-160/200RVX3-E

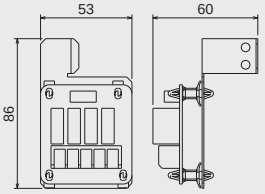
Signal Output Terminal

PZ-4GS-E



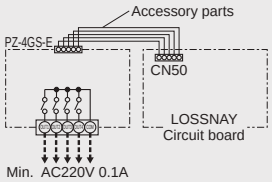
RVX3's PCB has only 1 output terminal. By using PZ-4GS-E, 4 more output terminals can be added to RVX3.

■ Dimension



Unit (mm)

■ Wiring diagram



Min. AC220V 0.1A
DC5V 0.1A
Max. AC240V 1A
DC24V 1A
(Common terminal is up to 1.5A)

*Wiring work must be performed by a qualified professional

Duct Silencer



The duct silencer connects to the LOSSNAY unit to reduce airflow noise.

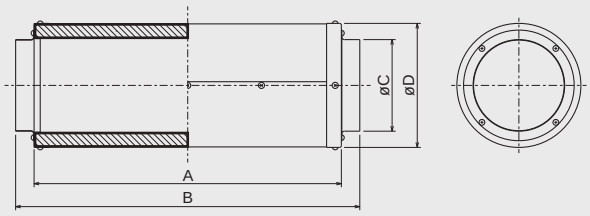
■Specifications

Model	Airflow (m^3/h)	Attenuation of sound power level [dB] for center frequency (discharge)							
		62.5Hz	125Hz	250Hz	500Hz	1000Hz	2000Hz	4000Hz	8000Hz
PZ-100SS-E	50	0	3	5	7	6	6	6	8
	150	0	3	6	7	7	7	7	9
PZ-150SS-E	250	0	1	5	8	15	21	20	14
	350	0	1	4	8	14	21	21	16
PZ-200SS-E	500	0	1	4	7	13	18	16	9
	650	0	1	3	8	12	17	14	6
PZ-250SS-E	800	0	2	4	12	22	21	14	13
	1000	0	1	4	12	22	20	14	13

1. Figures in the chart above are based on a comparison with a general steel duct of the same length.
2. The silencer is placed just before the outlet during the measurement.
3. When the airflow rate differs, the attenuation will also differ from the chart above.
4. Figures in the chart above are flat (not-weighted) values.

● Certain ratings and specifications may change due to product improvements or modifications.

■ Dimension



Unit (mm)

■Change dimension table (Unit:mm)

Model	A	B	C	D	Connectable Duct	Weight (kg)
PZ-100SS-E	400	450	99	152	ø100	1.9
PZ-150SS-E	500	560	149	202	ø150	3.5
PZ-200SS-E	600	660	199	252	ø200	5.3
PZ-250SS-E	600	660	249	332	ø250	8.9



Other Commercial Proposal



*For details, please consult the sales office.

R2-Series

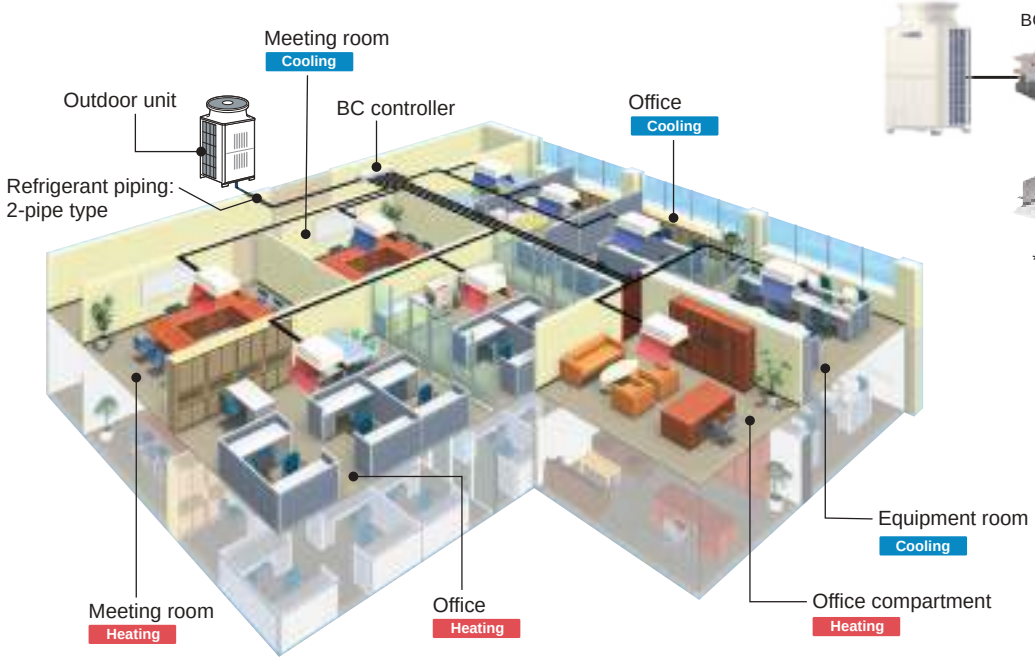
Simultaneous Cooling and Heating

The world's first* two-pipe system that Simultaneously Cools and Heats

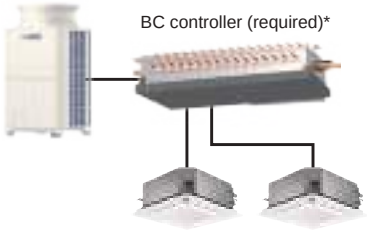
*As of 1992 (according to our own survey)

The CITY MULTI R2-Series offers the ultimate in freedom and flexibility. Cool one zone while heating another. Our exclusive BC controller makes two-pipe simultaneous cooling and heating possible. The BC controller is the technological heart of the CITY MULTI R2-Series. It houses a liquid and gas separator, allowing the outdoor unit to deliver a mixture of hot gas for heating and liquid for cooling, all through the same pipe.
This innovation results in virtually no energy wasted by being expelled outdoors. Depending on capacity, up to 50 indoor units can be connected with up to 150% connected capacity.

Installation image (R2-Series)



System example



*R2-Series systems require the use of BC controllers.

Air Cooled type
8-60HP



Water Cooled type
8-36HP

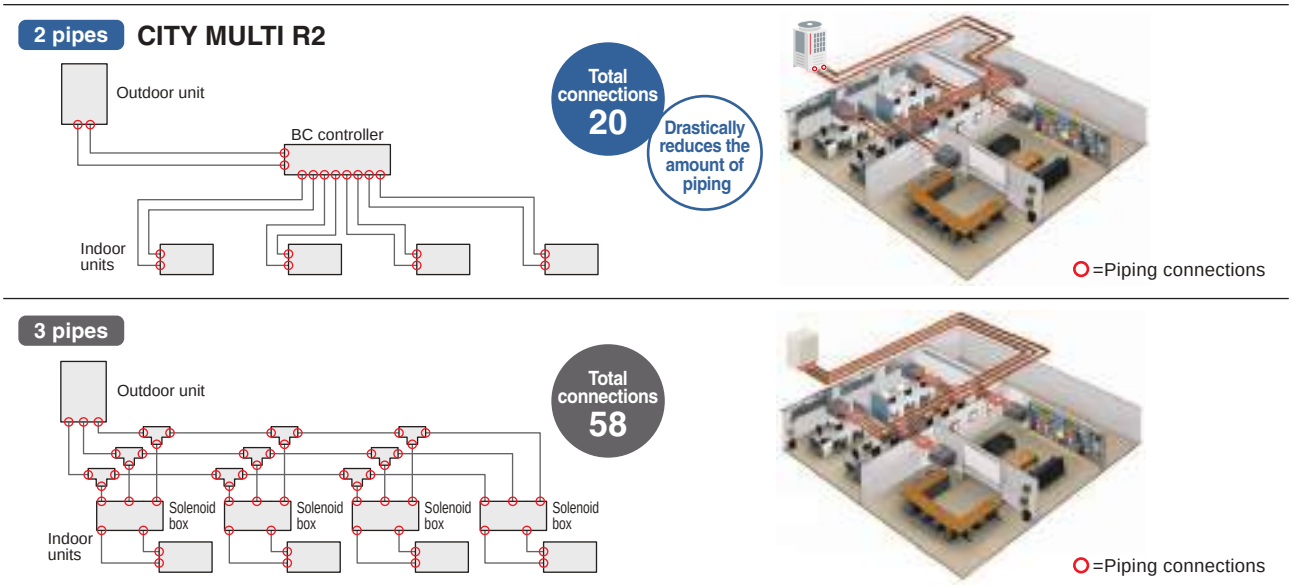


Benefits of R2 system

Unique to Mitsubishi Electric, our heat recovery technology uses just two pipes, as opposed to the market conventional three. Our R2 system, designed for effective simultaneous heating and cooling, offers substantial savings on installation and annual running costs.

Mitsubishi Electric 2-pipe R2 system: less piping/connections compared with 3-pipe

▶Comparison example of piping connections



Main mode of cooling/heating can be switched over without stopping operation

When Cooling/Heating mode switches

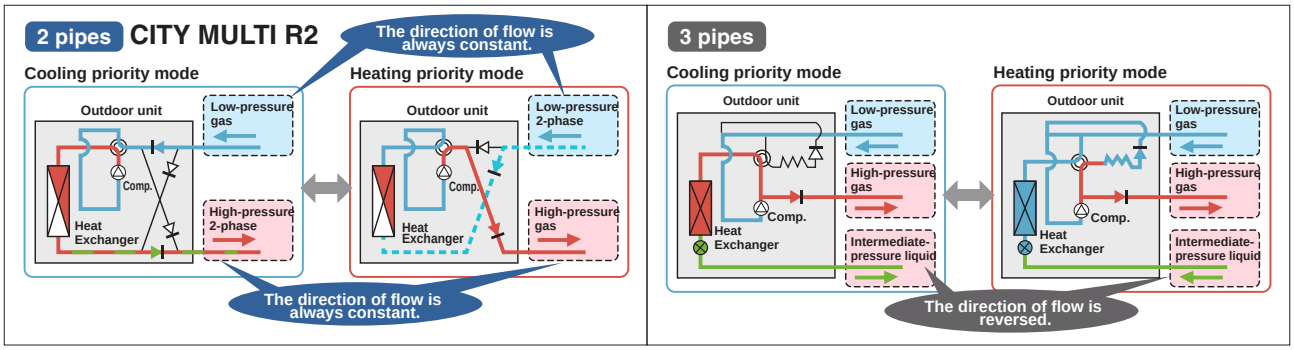
▶There is no need to stop the compressor.

▶Refrigerant noise generated when the refrigerant flow is switched can be lowered.

When Cooling/Heating mode switches

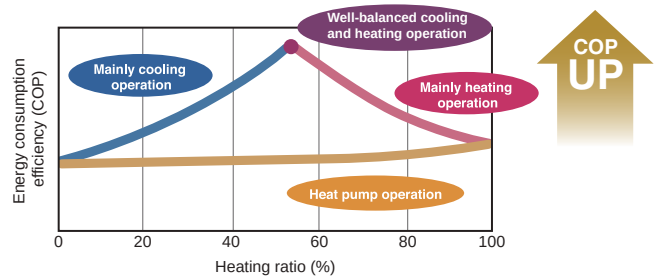
▶Compressor shuts down.

▶All indoor units stop for a few minutes.



Heat recovery operation for greater energy saving

▶COP in the heat recovery system



COP in the heat recovery system

The more frequently cooling and heating are performed simultaneously, the greater the energy saving effect.

*For details, please consult the sales office.

e-series Air-cooled Chiller

As a choice of HVAC system, chillers are widely used in versatile applications from commercial buildings to industrial use. With today's concerns on global warming and requirements to reduce energy use, building owners, as heavy energy users, are expected to choose energy efficient equipment.
Mitsubishi Electric's "e-series" chiller system is an air-cooled, inverter-driven and uniquely designed modular type of chiller with proven technology that offers comfort and energy conservation through daily operations.



Key Features

Energy efficiency

With DC inverter scroll compressors developed by Mitsubishi Electric and advanced inverter controls, the e-series ensures optimum operation according to the operation load and delivers high energy saving performance throughout the year.

Easy installation and space saving

The built-in header type is easy to install and requires less piping space.
Compared to a conventional chiller, e-series requires less installation space, which is an advantage especially with renewals where plant space tends to be limited.

Unique modular approach

Adds flexibility and unique aspects to the e-series.

Back-up

Emergency operation allows units to continue operating, and thereby reduces the backup requirement.

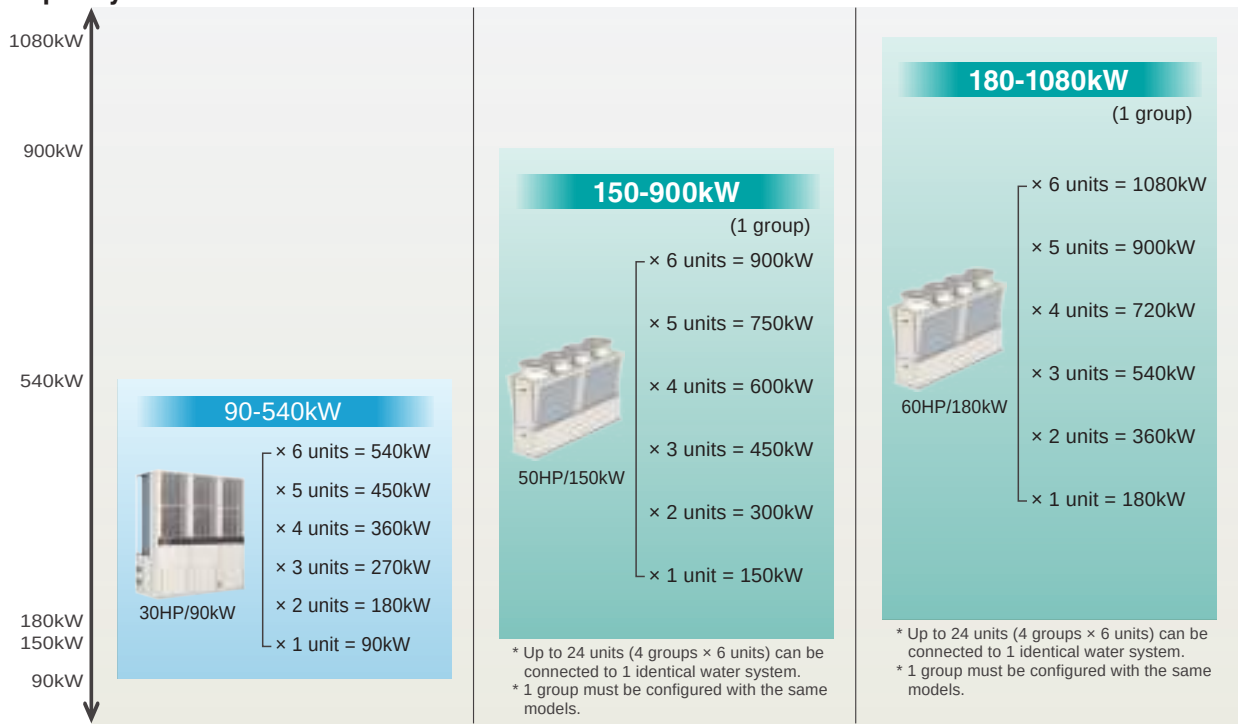
Scalability

Staged installations and future expansions can be realized to meet the building's requirements.

Module line-up

	30HP 90kW	50HP 150kW	60HP 180kW
Cooling Only			
Heat Pump			

Capacity

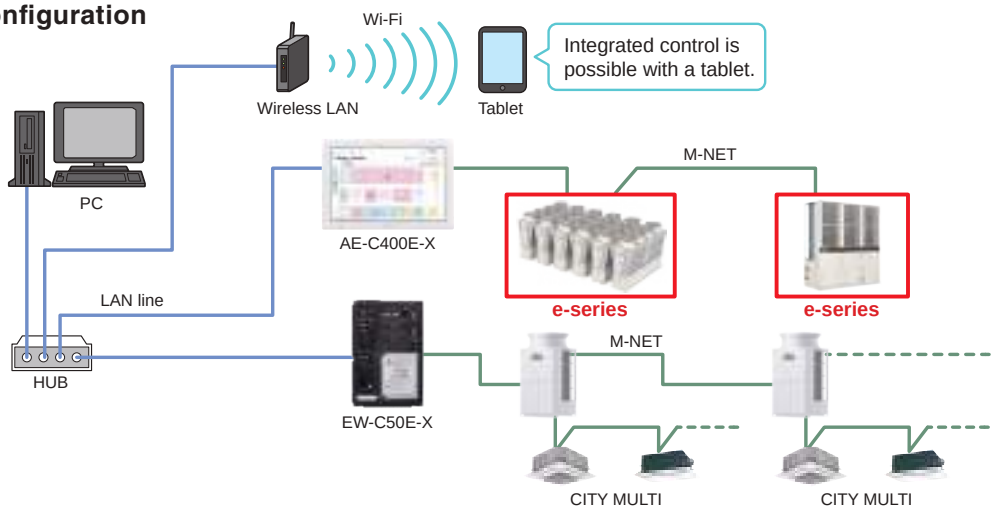


* Up to 24 units (4 groups × 6 units) can be connected to 1 identical water system.
* 1 group must be configured with the same models.

* Up to 24 units (4 groups × 6 units) can be connected to 1 identical water system.
* 1 group must be configured with the same models.

Combined management of CITY MULTI is also possible.

System configuration



*For details, please consult the sales office.

e-series Water-cooled Chiller



Easy Installation and Highly Efficient Operation

Its compactness contributes to easy carry-in with an elevator.

The use of low GWP refrigerant R32 achieves reduced impact on the environment.

The internal elements can be pulled out improving the ease of maintenance.

The unit can accomplish highly efficient operations (EER: 5.05/SEER: 7.66).

Compactness & Easy Installation

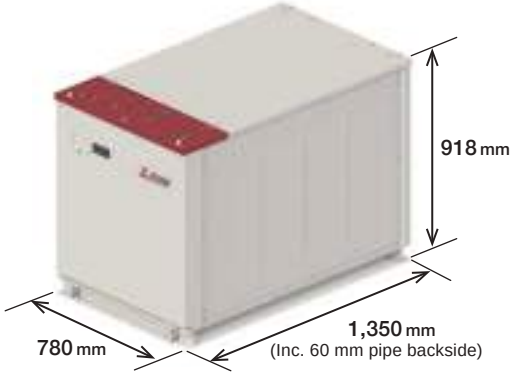
Thanks to its compact chassis, elevator carry-in is achievable, resulting in an easy installation and shorter construction period.

* Use an elevator that fulfills at least 800 mm for its door and 1,350 mm for its depth.
* A unit can be carried in through a 800 mm wide machine room door.



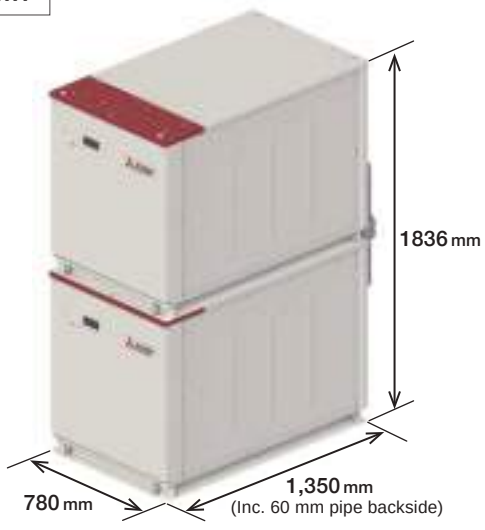
Single stack style

30HP 90kW



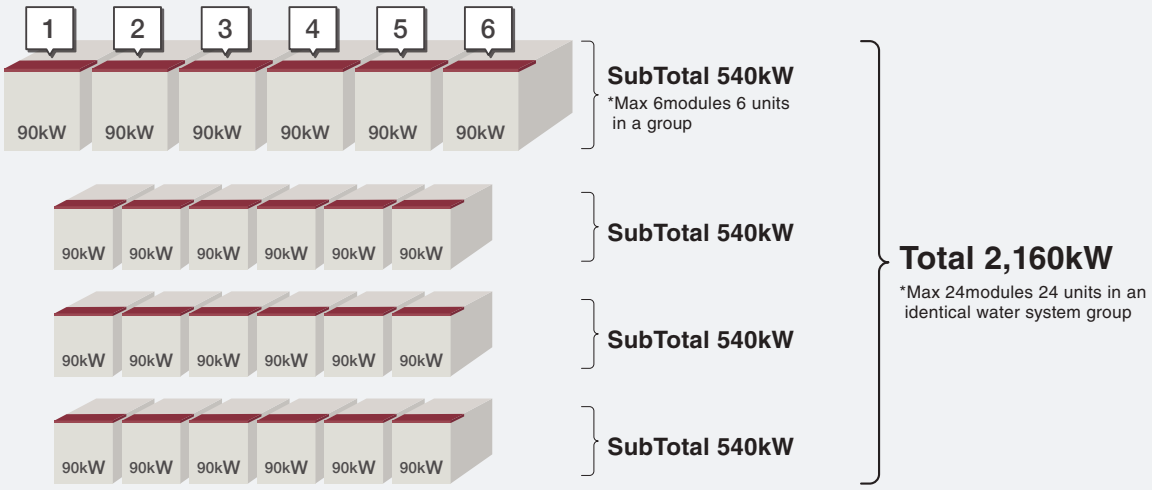
Double stack style

60HP 180kW

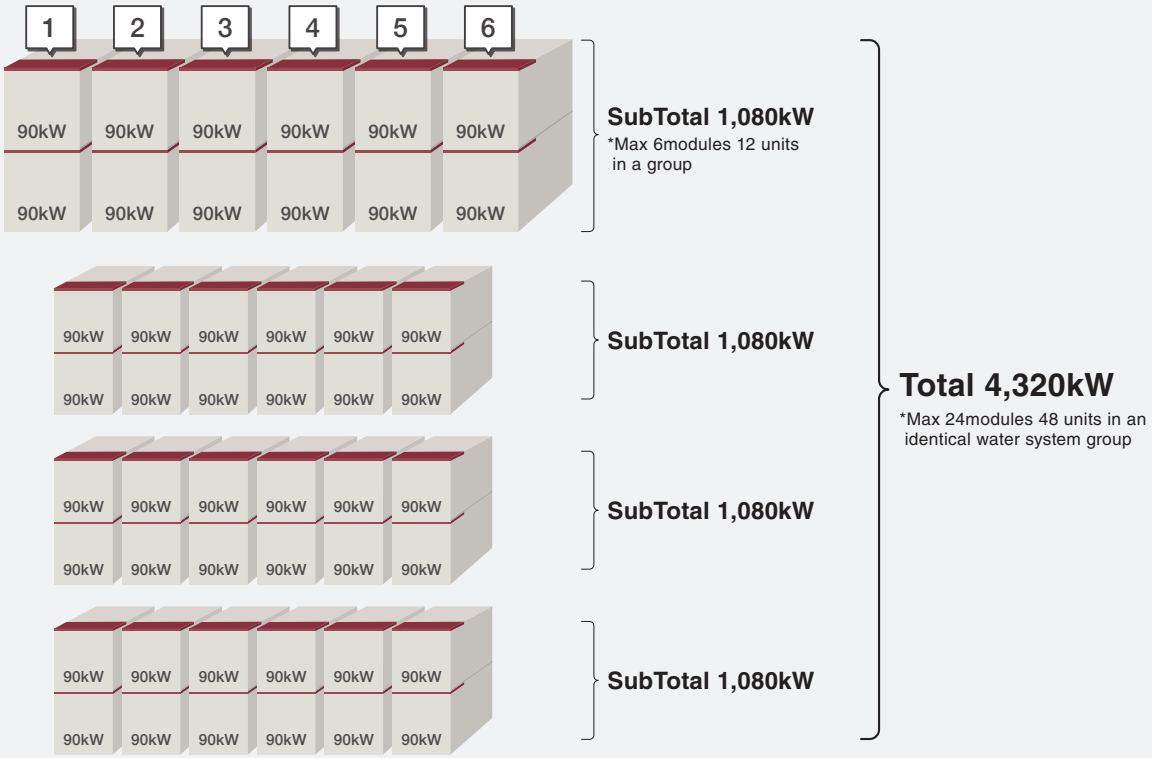


Capacity Combination

Single unit combination



Double stack



*For details, please consult the sales office.

CAHV & QAHV Hot Water Heat Pump

Mitsubishi Electric has been designing and manufacturing commercial hot water heat pumps since 1970. We were one of the first manufacturers in Japan to utilize heat pump technology to supply hot water. Our hot water heat pumps are used in Japan, Europe, Oceania, Asia, and many other regions.
As a pioneer in heat pump technology, we would continue to lead the industry.

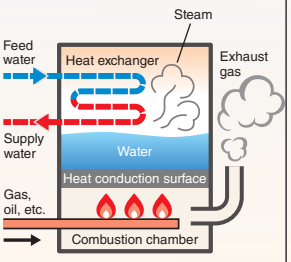
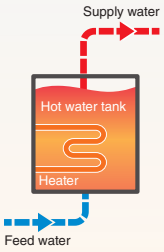
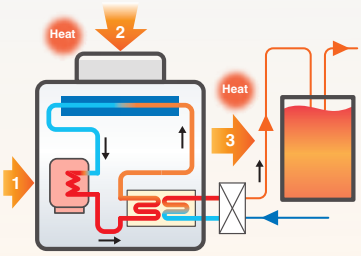
Strengths of each product

	CAHV	QAHV
	 R454C refrigerant	 CO_2 refrigerant
	✓ **Circulating**	✓ **Once-Through**
	✓ Heating water gradually ✓ Space / Floor heating	✓ Heating water quickly
	✓ Up to 70°C Hot water	✓ Up to 90°C Hot water
	✓ Swimming pool  ✓ Comfort heating 	✓ Shower  ✓ Water tap 

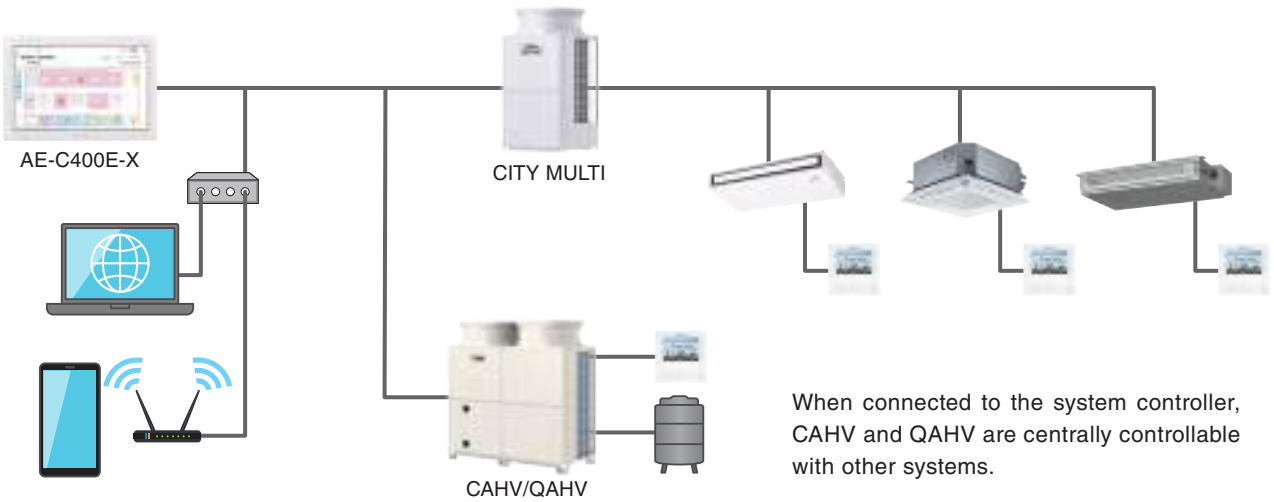
CAHV is a circulating hot water heat pump that provides high performance in keeping and raising hot water temperature. It is mostly utilized for heat retention/temperature rise and space/floor heating.
QAHV is a once-through hot water heat pump that demonstrates high performance when heating water quickly. It is often adopted in welfare facilities and hospitals, where people use showers and water faucets.

Benefits of Heat Pump

Compared to gas boilers and electric heaters, heat pumps are safer, more energy efficient, and eco-friendly thanks to the non-combustion system.

	Gas Boiler	Electric Water Heater	Heat Pump
			
Safety	–	✓	✓
Energy Efficiency	–	–	✓
Installation Costs	✓	✓	–
Running Costs	–	✓	✓
Service Maintenance	–	✓	✓
Eco-Friendliness	–	–	✓

✓ :Have advantage compared to other system.



When connected to the system controller, CAHV and QAHV are centrally controllable with other systems.

*For details, please consult the sales office.

Commercial Packaged Air-conditioner

With the comprehensive lineup of products, including the floor standing type and ceiling concealed type, it has been made easier for you to use them for offices, stores, factories, hotels and a variety of other applications.

Product Line Up Cooling Only series

50Hz

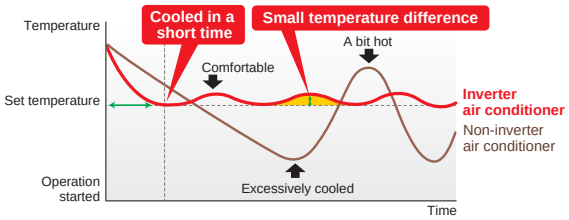
Type		8HP 23.5kW	10HP 29.3kW	16HP 46.9kW	20HP 56.0kW
Floor standing	Indoor unit				
	Outdoor unit				
Ceiling concealed	Indoor unit				
	Outdoor unit				

Key Features

High energy efficiency

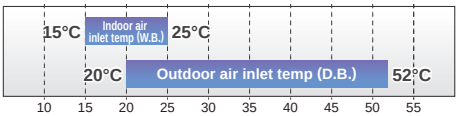
With the use of DC inverter scroll compressors developed by Mitsubishi Electric and advanced inverter controls, the coomercial packaged air-conditioner ensures optimum operation according to the operation load and delivers high energy saving performance throughout the year.

Comparison between inverter air conditioner and non-inverter air conditioner



Wide temperature range

Capable of running cooling operations in the outdoor temperature of up to 52°C.



Indoor units

Floor standing type

- Easy installation and maintenance
- Suitable for use in areas where duct installation is not possible (i.e., high ceiling or ceiling with crane rails)
- Satisfies large capacity air conditioning needs
- Adjustable air flow and static pressure

Celling concealed type

- Flexibly accommodates various types of duct designs
- Installable when no floor space is available
- Suitable for use in areas where air flow from floor-standing models would be interrupted by the equipment in the space
- Suitable for use in facilities such as food manufacturing plants where floor-standing models are not suitable because of cleaning requirements

APPLICATION

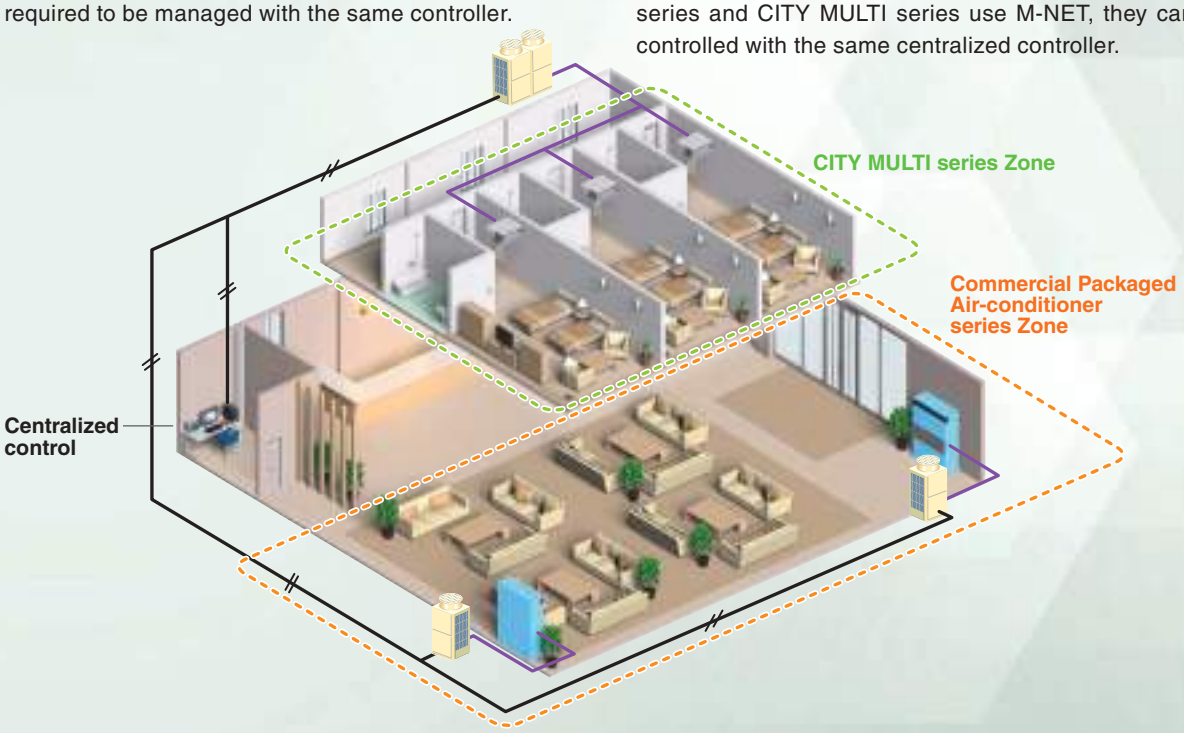
Example 1. Hotel

Requirements

Different series adopted to each optimum zone are required to be managed with the same controller.

Solution

Since both these Commercial Packaged Air-conditioner series and CITY MULTI series use M-NET, they can be controlled with the same centralized controller.



Example 2. Manufacturing plant

Requirements

Ducts cannot be installed in the ceiling with crane rails. High ceiling and heat generation from equipment need to be considered. ON/OFF control by external input (level-signal) is required in the system.

Solution

Cooling only floor standing series with plenum chamber.*1
External signal based start/stop control can be performed.*2



*1 For PFV-P200/250YM-A model, a plenum is embedded as standard accessory.
*2 Requires the remote ON/OFF adapter (PAC-SE55RA-E) and other parts (eg. Power supply of relay) need to be procured locally.

Installation information

＊Refer to the enclosed Installation Manual for details on installation. Arrange to have an expert install the system correctly.

1. General precautions

1-1. Usage

- The air-conditioning system described in this catalogue is designed for human comfort.
- This product is not designed to assist in the preservation of food, provide conditions to maintain plants or animals, or stabilize environments for the preservation of precision equipment or art objects. To prevent loss of quality, do not use the product for purposes other than those it is designed for.
- To reduce the risk of water leakage and electric shock, do not use the product for air-conditioning vehicles or vessels.

1-2. Installation environment

- Do not install any unit other than the dedicated unit in an area where the voltage changes significantly, large amounts of mineral oil (e.g., cutting oil) are present, cooking oil may splash, or a large quantity of steam can be generated, such as a kitchen.
- Do not install the unit in acidic or alkaline environments.
- Installation should not be performed in locations exposed to chlorine or other corrosive gases. Avoid installation near sewers.
- To reduce the risk of fire, do not install the unit in an area where flammable gas may leak or flammable material is present.
- This air-conditioning unit has a built-in microcomputer. The effects of noise should be taken into consideration when deciding on the installation position. It is recommended that the air-conditioning unit be installed in a position away from antennas or electronic devices.
- Install the unit on a solid foundation in accordance with local safety measures against typhoons, wind gusts, and earthquakes to prevent the unit from being damaged, toppling over, or falling.

1-3. Backup system

- In regions in which the malfunctioning of the air conditioner may have a critical effect, it is recommended to have two or more systems made up of single outdoor/heat source units and multiple indoor units.

1-4. Unit characteristics

- The heat pump efficiency of the outdoor unit depends on the outdoor temperature. In heating mode, performance drops as the outside air temperature drops. In cold climates, performance can be poor. Warm air will continue to be trapped near the ceiling and the floor level will remain cold. In such cases, heat pumps require a supplemental heating system or air circulator. Before purchasing, consult your local distributor for assistance in selecting the unit and system.
- When the outdoor temperature is low and the humidity is high, the heat exchanger on the outdoor/heat source unit side tends to collect frost, which reduces its heating performance. The Auto-defrost function will be activated in order to remove the frost, and the heating mode will temporarily stop for 3-10 minutes. Heating mode will automatically resume upon completion of the defrost process.
- An air conditioner with a heat pump requires time to warm up the whole room after the heating operation begins, because the system circulates warm air in order to warm up the whole room.
- Sound levels were obtained in an anechoic room. Sound levels during actual operation are usually higher than the simulated values due to ambient noise and echoes. Refer to the section on "SOUND LEVELS" in the DATA BOOK for the measurement location.
- Depending on the operating conditions, the unit generates noise caused by valve actuation, refrigerant flow, and pressure changes even when operating normally. Try to avoid positioning the air conditioner in locations where quietness is required.
  With regard to the BC controller, it is recommended that the unit be installed in areas such as corridor ceilings, restrooms and plant rooms.
- The total capacity of the connected indoor units can be greater than the capacity of the outdoor/heat source unit. However, when the connected indoor units operate simultaneously, each unit's capacity may become smaller than the rated capacity.

• When the unit is started up for the first time within 12 hours after the power comes on, i.e. after a power failure, it performs initial startup operation (capacity control operation) to prevent damage to the compressor. The initial startup operation requires a maximum of 90 minutes to complete, depending on the operating load.
• When the unit is operating out of the operation temperature range, the unit may stop to prevent malfunction.

1-5. Related equipment

• Use an earth leakage breaker (ELB) with medium sensitivity, and an activation speed of 0.1 second or less.
• Consult your local distributor or a qualified technician when installing an earth leakage breaker.
• If the unit is an inverter type, select an earth leakage breaker able to respond to high harmonic waves and surges.
• Leakage current is generated not only through the air-conditioning unit but also through the power wires. The leakage current of the main power supply is therefore greater than the total leakage current of each unit. Take the capacity of the earth leakage breaker or leakage alarm into consideration when installing one at the main power supply. To measure the leakage current simply on site, use a measurement tool equipped with a filter, and clamp all the four power wires together. The leakage current measured on the ground wire may not be accurate because the leakage current from other systems may be included in the measurement value.
• Do not install a phase-advancing capacitor on a unit connected to the same power system as an inverter-type unit and its related equipment.
• If a large current flows due to the malfunctioning of the product or faulty wiring, both the earth leakage breaker on the product side and the upstream overcurrent breaker may trip almost at the same time. Separate the power system or coordinate all the breakers depending on the system's priority level.

1-6. Unit installation

• Your local distributor or a qualified technician must read the Installation Manual that is provided with each unit carefully before performing installation work.
• Consult your local distributor or a qualified technician when installing the unit. Improper installation by an unqualified person may result in water leakage, electric shock, or fire.
• Ensure that there is enough space around each unit.

1-7. Optional accessories

• Only use accessories recommended by Mitsubishi Electric. Consult your local distributor or a qualified technician when installing them. Improper installation by an unqualified person may result in water leakage, power leakage, system breakdown, or fire.
• Some optional accessories may not be compatible for use with the air-conditioning unit or may not be suitable for the installation conditions. Check the compatibility when considering any accessories.
• Note that some optional accessories may affect the air conditioner's external form, appearance, weight, operating sound, and other characteristics.

1-8. Operation/Maintenance

• Read the Instruction Book that is provided with each unit carefully prior to use.
• Maintenance or cleaning of each unit may be risky and require expertise. Read the Instruction Book to ensure safety. Consult your local distributor or a qualified technician when special expertise is required, such as when the indoor unit needs to be cleaned.

2. Precautions for Indoor unit

2-1. Operating environment

- The refrigerant (R410A) used in the air conditioner is non-toxic and nonflammable. However, if the refrigerant leaks, the oxygen level may drop to harmful levels. If the air conditioner is installed in a small room, measures must be taken to prevent the refrigerant concentration from exceeding the safety limit even if the refrigerant leaks.
- If the units operate in cooling mode at a humidity above 80%, condensation may collect and drip from the indoor units.
- Regular checking and cleaning of the drain drainage paths, such as the drain pan or the drain pump, is recommended to prevent clogging. The neglect of a clogged drain pump may trigger the water-leakage protection function which stops operation of the entire system.

2-2. Unit characteristics

- The return air temperature display on the remote controller may differ from the displays on the other thermometers.
- The clock on the remote controller may be displayed with a time lag of approximately one minute every month.
- The temperature measured by the built-in temperature sensor on the remote controller may differ from the actual room temperature due to the effect of the wall temperature.
- Use the built-in thermostat on the remote controller or a separately-sold thermostat when indoor units installed on or in the ceiling operate the automatic cooling/heating switchover.
- The room temperature may rise drastically due to Thermo OFF in areas where the air-conditioning load is large, such as computer rooms.
- Be sure to use a regular filter. If an irregular filter is installed, the unit may not operate properly, and operating noise may increase.
- The room temperature may increase above the preset temperature in environments in which the heating or air-conditioning load is small.

2-3. Unit installation

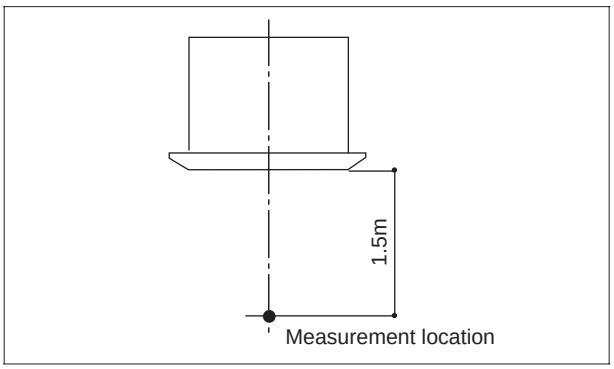
- Do not have any branching points on the downstream of the refrigerant pipe header.
- When a field-supplied external thermistor is installed or when a device for demand control is used, the unit may stop abnormally or damage may occur to the electromagnetic contactor. Consult your local distributor for details.
- When indoor units employ fresh air intake, install a filter in the duct (locally procured) to remove dust from the air.
- The 4-way or 2-way Airflow Ceiling Cassette Type units that have an outside air inlet can be connected to the duct, but need a booster fan to be installed at site. Refer to the chapter "Indoor Unit" in the DATA BOOK for the available range for fresh air intake volume.
- Employing fresh air intake for the indoor unit may increase the sound pressure level.
- When installing the ceiling concealed type, secure enough access space to allow for the maintenance according to the installation manual.
- Do not install the unit above the cooking or food processing area.

2-4. Noise level (Sound pressure level)

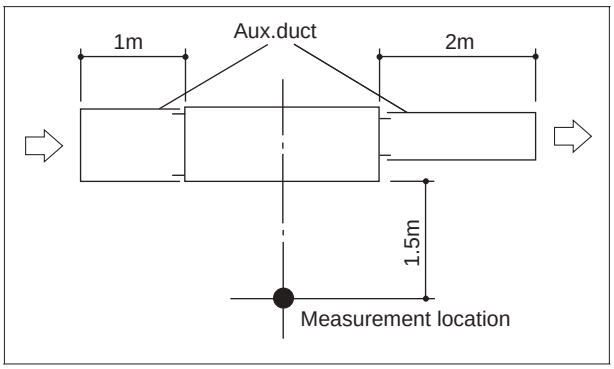
- The sound pressure level is a value measured in an anechoic room in accordance with the conventional method in JIS standard. The sound pressure level actually measured at the installation site is usually higher than the value indicated in this catalogue due to the influence of ambient noise and echoes.

<Measurement location>

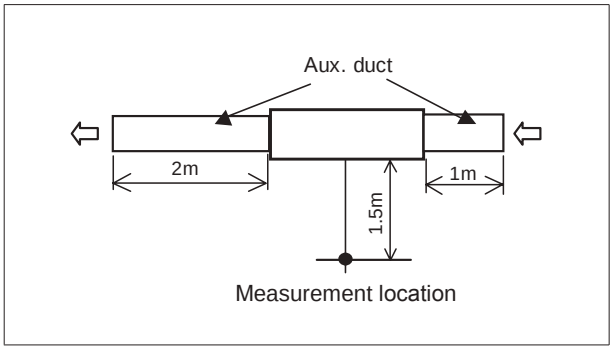
■ PLFY-P-VHM-PA, PLFY-EP-VEM-E, PLFY-P-VFM-E1, PLFY-P-VMMD-E, PMFY-P-VBM-E, PMFY-P-VFM-PA



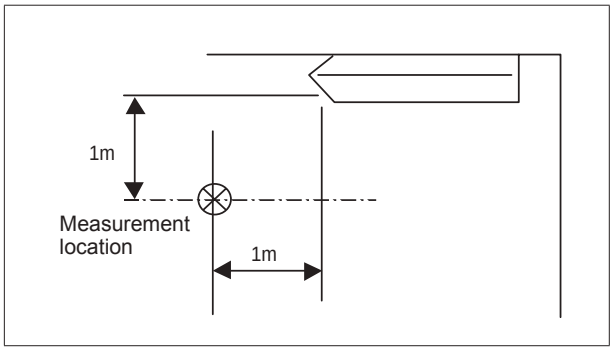
■ PEFY-P-VMR-E-L/R, PEFY-P-VMS1(L)-E, PEFY-P-VMH(S)-E, PEFY-P-VMH(S)-E-F



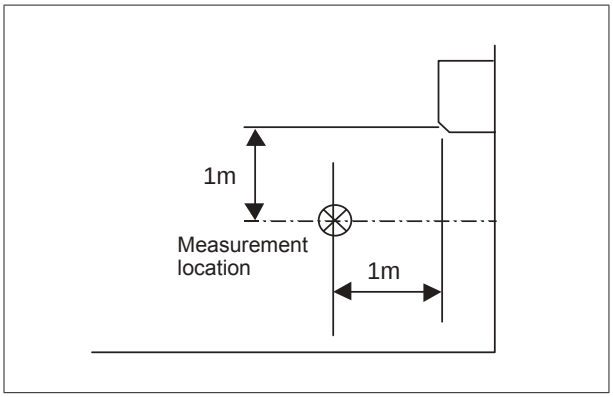
■ PEFY-P-VMA(L)-E4, PEFY-P-VMA4-E, PEFY-P-VMA3-E



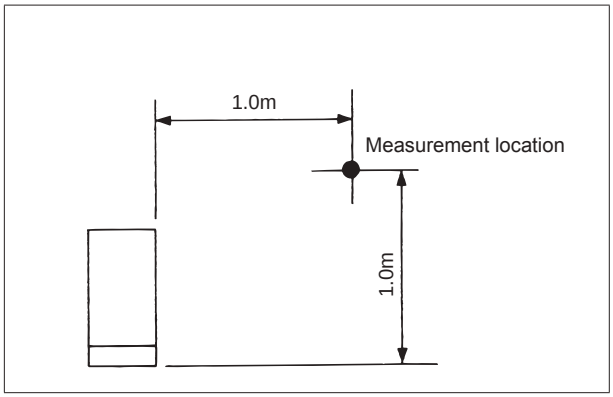
■ PCFY-P-VKM-E



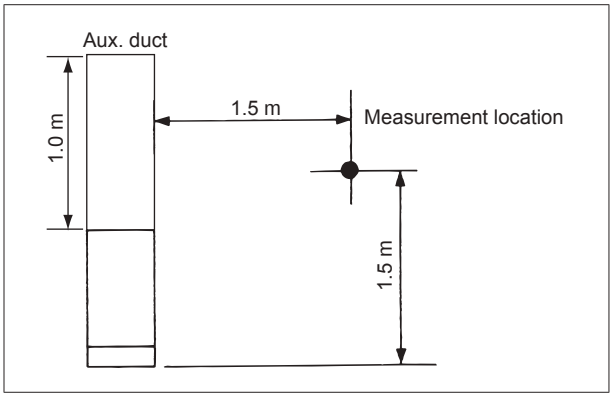
■ PKFY-P-VLM-E, PKFY-P-VKM-PA



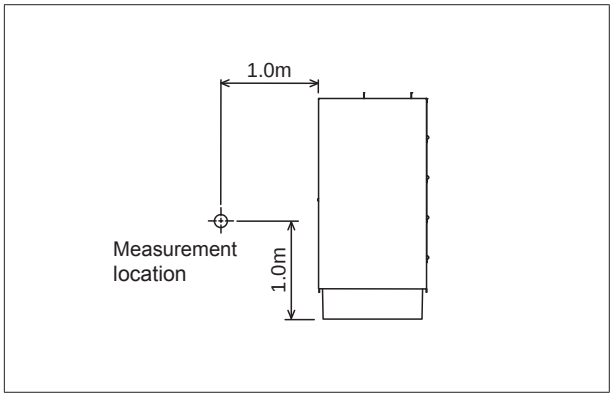
■ PFFY-P-VKM-E2, PFFY-P-VEM-E



■ PFFY-P-VCM-E



■ PFFY-P-YM(H)-E, PFFY-P-YM-E-F



3. Precautions for Outdoor unit/Heat source unit

3-1. Installation environment

- The outdoor unit with the salt-resistant specification is recommended for use in an area in which it will be exposed to salt air.
- Even when the unit with the salt-resistant specification is used, it is not completely protected against corrosion. Be sure to follow the directions or precautions described in the Instruction Book and Installation Manual for installation and maintenance. The salt-resistant specification is referred to in the guidelines published by JRAIA (JRA9002).
- Install the unit in an area where the flow of discharge air is not obstructed. If the flow of discharge air is obstructed, short-cycling of discharge air may occur.
- Provide proper drainage around the base of the units; condensation may collect and drip from outdoor units. Provide water-proofing protection to the floor when installing the unit on the rooftop.
- In regions where snowfall can be expected, install the unit so that the outlet faces away from the direction of the wind, and install a snow guard to protect the unit from snow. Install the unit on a base approximately 50 cm higher than the expected snowfall. Close the openings for pipes and wiring, because the ingress of water and small animals may cause equipment damage. If a SUS snow guard is used, refer to the Installation Manual that comes with the snow guard and be careful with the installation to avoid the risk of corrosion.
- When the unit is expected to operate continuously for a long period of time at outside air temperatures of below 0ºC, take appropriate measures, such as the use of a unit base heater, to prevent ice forming on the unit base. (Not applicable to the PUMY-Series)
- Install the snow guard so that the outlet/inlet faces away from the direction of the wind.
- When approximately 50 cm or more of snow accumulates on the snow guard, remove the snow from the guard. Install a roof that is strong enough to withstand loads caused by snow in areas where snow accumulates.
- Provide proper protection around the outdoor units in places such as schools to avoid the risk of injury.
- A cooling tower and heat source water circuit should be a closed circuit so that water is not exposed to the atmosphere. When a tank is installed to ensure that the circuit has enough water, minimize the contact with outside air to ensure that the oxygen dissolved in the water is 1 mg/L or less.
- Install a strainer (50 mesh or more recommended) on the water pipe inlet on the heat source unit.
- Interlock the heat source unit and water circuit pump.
- Note the following to prevent the freezing and bursting of pipes when the heat source unit is installed in an area where the ambient temperature can be 0ºC or below.
  - ♦ Keep the water circulating to prevent it from freezing when the ambient temperature is 0ºC or below.
  - ♦ Before a long period of non-use, be sure to purge the water from the unit.
- The salt-resistant unit is resistant to salt corrosion, but not salt-proof.
  Please note the following when installing and maintaining outdoor units in a marine environment.
  1. Install the salt-resistant unit in an area in which it is not directly exposed to sea breezes, and minimize exposure to salt water mist.
  2. Avoid installing a sun shade over the outdoor unit, so that rain will wash away salt deposits off the unit.
  3. Install the unit horizontally to ensure proper water drainage from the base of the unit. Accumulation of water in the base of the outdoor unit will significantly accelerate corrosion.
  4. Periodically wash salt deposits off the unit, especially when the unit is installed in a coastal area.
  5. Repair all noticeable scratches after installation and during maintenance.
  6. Periodically check the unit, and apply an anti-rust agent and replace corroded parts as necessary.
  7. Do not install the units in a place where iron or copper powders fly around, in an acidic or alkaline atmosphere, or where a large amount of sand containing saline particles accumulates because these factors can corrode the aluminum pipes.
  8. Because all-aluminum heat exchangers can become corroded by debris contained in water, do not splash water on them.

3-2. Circulating water

- Regularly check the quality of the water in the heat source unit, following the guidelines published by JRAIA (JRA-GL02-1994).
- A cooling tower and heat source water circuit should be a closed circuit so that water is not exposed to the atmosphere. When a tank is installed to ensure that the circuit has enough water, minimize the contact with outside air to ensure that the oxygen dissolved in the water is 1 mg/L or less.

3-3. Unit characteristics

- When the Thermo ON and OFF is frequently repeated on the indoor unit, the operating status of outdoor/heat source units may become unstable.

3-4. Related equipment

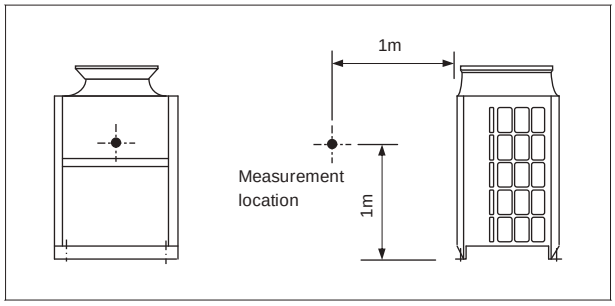
- Provide grounding in accordance with the local regulations.

3-5. Noise level (Sound pressure level)

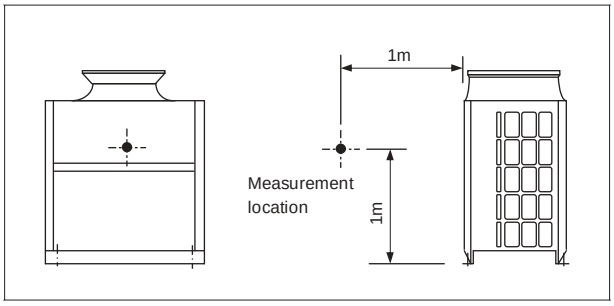
- The sound pressure level is a value measured in an anechoic room in accordance with the conventional method in JIS standard. The sound pressure level actually measured at the installation site is usually higher than the indicated value in this catalogue due to the influence of ambient noise and echoes.
  Valve operation noise and refrigerant flow noise may occur from inside the outdoor unit/heat-source unit.

<Measurement location>

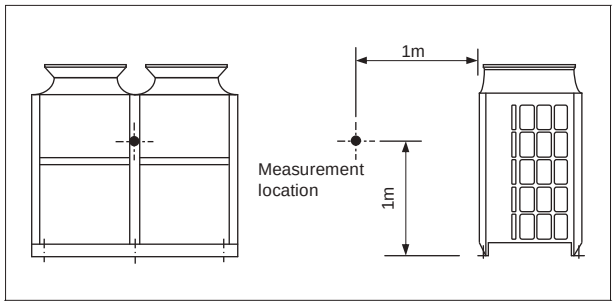
PUCY-P200, 250, 300YKE(-BS)
PUCY-EP200, 250YKE(-BS)
PUHY-P200, 250, 300YKD(-BS)



PUCY-P350, 400, 450YKE(-BS)
PUHY-P350, 400, 450YKD(-BS)



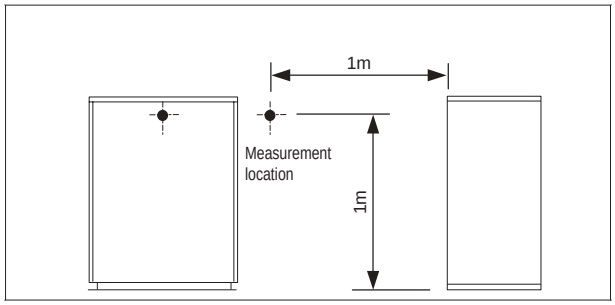
PUCY-P500YKE(-BS)
PUCY-EP300, 350, 400, 450, 500YKE(-BS)
PUHY-P500YKD(-BS)



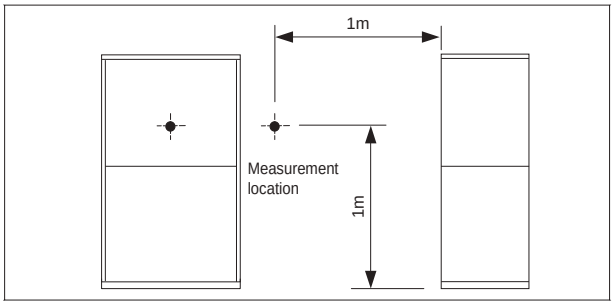
*See the DATA BOOK for information on the combination models.

■ PQHY-(E)P-Y(S)LM-A1

PQHY-P200, 250, 300YLM-A1



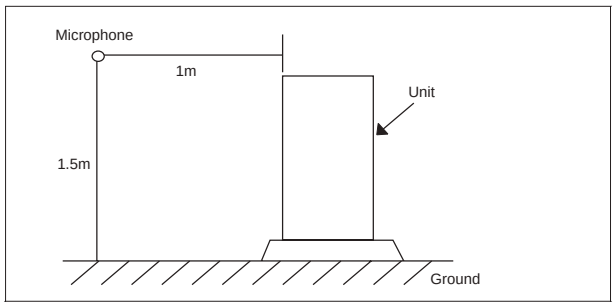
PQHY-P350, 400, 450, 500, 550, 600YLM-A1



*See the DATA BOOK for information on the combination models.

■ PUMY-CP-VKM2(-BS), PUMY-CP-YKM2(-BS), PUMY-SP-VKM2(-BS), PUMY-SP-YKM2(-BS), PUMY-P-YKM3(-BS), PUMY-(C)P-YBM2(-BS)

PUMY-CP100, 125, 140VKM2(-BS)
PUMY-CP100, 125, 140, 175, 200, 225YKM2(-BS)
PUMY-CP250, 300YBM2(-BS)
PUMY-SP100, 125, 140VKM2(-BS)
PUMY-SP100, 125, 140YKM2(-BS)
PUMY-P175, 200, 225YKM3(-BS)
PUMY-P250, 300YBM2(-BS)



4. Precautions for control-related items

4-1. Product specification

- To introduce the MELANS system, a consultation with us is required in advance. Especially to introduce the electricity charge-apportioning function or energy save function, further detailed consultation is required.
  Consult your local distributor for details.
- Billing calculation for AE-C400E-X/EW-C50E-X, or the billing calculation unit is unique and based on our original method. (Backup operation is included.) It is not based on the metering method, and do not use it for official business purposes. It is not the method that the amount of electric power consumption (input) by air conditioner is calculated. Note that the electric power consumption by air conditioner is apportioned by using the ratio corresponding to the operation status (output) for each air conditioner (indoor unit) in this method.
- In the apportioned billing function for AE-C400E-X and EW-C50E-X, separate watt-hour meters should be used for A-control units, K-control units, and CITY MULTI packaged air conditioners. It is recommended that an individual watt-hour meter should be used for large-capacity indoor units (with two or more addresses).
- When using the peak cut function on the AE-C400E-X or EW-C50E-X, note that the control is performed once every minute and it takes time to obtain the effect of the control. Take appropriate measures such as lowering the criterion value. Power consumption may exceed the limits if the AE-C400E-X or EW-C50E-X malfunctions or stops. Provide a back-up remedy as necessary.
- The controllers cannot operate while the indoor unit is OFF. (No error)
  Turn ON the power to the indoor unit when operating the controllers.
- When using the interlocked control function on the AE-C400E-X/EW-C50E-X/PAC-YG66DCA or PAC-YG63MCA, do not use the control for fire prevention or security. (This function should never be used in a way that would put people's lives at risk.) Employ any methods or circuits that allow ON/OFF operation using an external switch in case of failure.

4-2. Installation environment

- Surge protection may be required for the transmission line in areas where lightning strikes occur frequently.
- The receiver for a wireless remote controller may not work properly due to the effect of general lighting. Leave a space of at least 1 m between the general lighting and the receiver.
- When the auto-elevating panel is used and the system is operated using a wired remote controller, install the wired remote controller in a place where all the air conditioners being controlled (at least the bottom part of them) can be seen from the wired remote controller. If not, the descending panel may cause damage or injury; be sure to use a wireless remote controller designed for use with the elevating panel (sold separately).
- Install the wired remote controller (switch box) in a place where the following conditions are met.
  - ♦ Where the installation surface is flat
  - ♦ Where the remote controller can detect an accurate room temperature
    The temperature sensors that detect the room temperature are installed both in the remote controller and in the indoor unit.
    When the room temperature is detected using the sensor in the remote controller, the main remote controller is used to detect the room temperature. In this case, follow the instructions below.
    > Install the controller in a place where it is not affected by a heat source.
    (If the remote controller faces direct sunlight or the direction of the supply air flow, the remote controller cannot detect the accurate room temperature.)
    > Install the controller in a place where the average room temperature can be detected.
    > Install the controller in a place where no other wires are present around the temperature sensor.
    (If other wires are present, the remote controller cannot detect an accurate room temperature.)
- To prevent unauthorized access, always use a security device such as a VPN router when connecting the AE-C400E-X or EW-C50E-X to the Internet.

Maintenance Equipment

Maintenance cycle
[Note that maintenance cycle does not mean guarantee period.]

The following tables are applicable when using equipment under the conditions below.

- Normal use without frequent START/STOPs (The number of START/STOPs is assumed to be less than 6 times per hour in normal use.)
- Operating hours are assumed to be 10 hours per day/2500 hours per year.

When the equipment is used under the following conditions, the "maintenance cycle" and "replacement intervals" may be shortened.

- When equipment is used in an environment where temperature and humidity are high or change dramatically
- When equipment is used in an environment where power supply fluctuations (the distortion of voltage, frequency, and waveform) are large (Only within the allowable range)
- When equipment is used in an environment where the unit may receive vibration or mechanical shock
- When equipment is used in an environment where dust, salt, toxic gases such as sulfur dioxide and hydrogen sulfide, and oil mist are present
- When equipment starts/stops frequently and operates for long periods (24-hour air-conditioning operation)

Table 1. Maintenance cycle

Major components	Checking cycle	Maintenance cycle
Compressor	1 year	20,000 hours
Motor (Fan, louver, drain pump)		20,000 hours
Bearings		15,000 hours
Electric board		25,000 hours
Heat exchanger		5 years

Major components	Checking cycle	Maintenance cycle
Expansion valve	1 year	20,000 hours
Valve (solenoid valve, four-way valve)		20,000 hours
Sensor (thermistor, pressure sensor)		5 years
Drain pan		8 years

Note1 This table shows major components. Refer to the maintenance contract for details.
Note2 This maintenance cycle shows a period in which products are expected to require no maintenance. Use this cycle for planning maintenance (budgeting the maintenance expense etc.) The Checking/ Maintenance cycle may be shorter than the one shown on this table depending on the contents of the maintenance check contract.

- Sudden unpredictable accidents may occur even if check-ups are performed.

Replacement cycle for consumable components
[Note that replacement cycle does not mean guarantee period.]

Table 2. Replacement cycle

Major components	Checking cycle	Replacement cycle
Long-life filter	1 year	5 years
High-performance filter		1 year
Fan belt		5,000 hours
Smoothing capacitor		10 years
Fuse		10 years
Crank case heater		8 years

Note1 This table shows major components. Refer to the maintenance contract for details.
Note2 This replacement cycle shows a period in which products are expected to require no replacement. Use this cycle for planning maintenance (budgeting expenses for replacing equipment, etc.)

MEMO

MEMO

⚠Warning

■Do not use refrigerant other than the type indicated in the manuals provided with the unit and on the nameplate.
- Doing so may cause the unit or pipes to burst, or result in explosion or fire during use, during repair, or at the time of disposal of the unit.
- It may also be in violation of applicable laws.
- MITSUBISHI ELECTRIC CORPORATION cannot be held responsible for malfunctions or accidents resulting from the use of the wrong type of refrigerant.

■Our air-conditioning equipments and heat pumps contain a fluorinated greenhouse gas, R410A.

MITSUBISHI ELECTRIC CORPORATION

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