

HEAT PUMPS AIR CONDITIONING



Mr.SUM (RATION)



Comfort takes on new meaning with the power of technology

Our technologically advanced Mr. Slim Power Inverter systems improve comfort, operate with significantly less noise, and provide increased energy savings.

MISUM NEW REFRIGERANT Our air conditioners use R410A, HFC refrigerant.



01 - 02**Advanced Power Inverter**

Advanced Power Inverter

Mitsubishi Electric's new Power Inverter systems drastically reduce power consumption

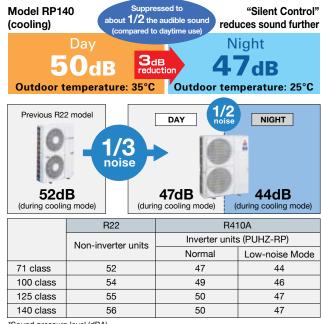
To better meet the needs of shops and offices, our outdoor units are now offered in single-phase models. Select the model to best match your needs from our expanded model range.



Outdoor Line-up (PUHZ-RP series)							
	71	100	125	140	170	200	250
Single-phase	•	•	•	•	•		
Three-phase						•	•

Silent Control

Fan speed during cooling operation is automatically reduced when the outdoor temperature drops, resulting in quiet, low-noise operation. Operating noise is reduced by 3dB, to half of the audible sound.



*Sound pressure level (dBA)

Side-flow Outdoor Units

Operating capacities up to 20kW have been unified to the side-flow. All operating capacities have been unified to the side-flow configuration. Even for locations requiring large capacities, the small footprint of these outdoor units enable them to be used anywhere.





PUHZ-RP71

PUHZ-RP100/125/140/170/200

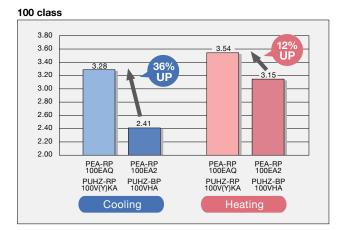
Longer Maximum Piping Length

As a result of increasing the volume of refrigerant, piping length has been increased to a maximum of 75m, expanding the range of layout possibilities for unit installation.

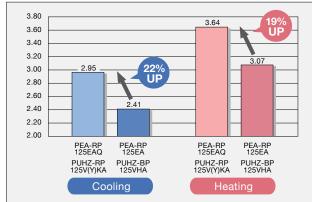
Max. piping length can be stretched to 75m						
	Max. height difference Max. piping length					
PUHZ-RP71	30m	50m				
PUHZ-RP 100/125/140/ 170/200/250	30m	75m				

High Energy Efficiency

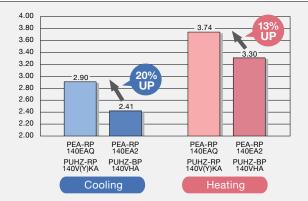
With the latest inverter technology, energy efficiency is improved in cooling operation and heating operation from previous models. This contributes to further reductions in product power consumption.

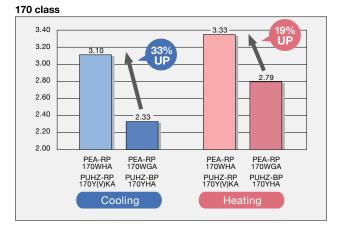


125 class

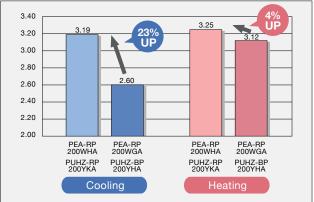


140 class

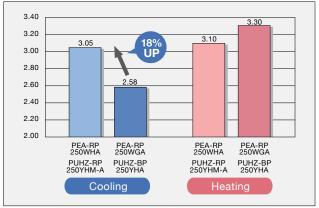




200 class



250 class

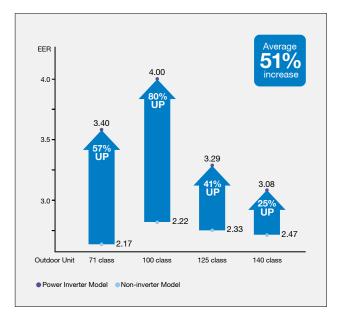


Advanced Power Inverter

03-04

Comparison of EER (cooling mode)

Comparison of EER between non-inverter and Power Inverter (4-way cassette) models.



High Power

More Power for Faster Cooling/Heating

Improved Cooling/Heating Performance

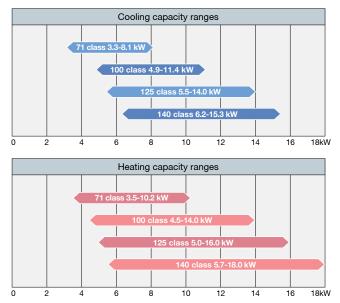
The maximum operating speed and cooling/heating capacity of the new Mr. Slim Power Inverter units have been improved by as much as 33% (compared to conventional non-inverter models) when operating in either low or high outdoor temperatures.

Cooling capacity 4-way casset						
	R22 Non-inverter					
71	7.7	8.1	105%			
100	9.7	11.4	118%			
125	12.4	14.0	113%			
140	14.0	15.3	109%			

Heating capacity 4-way case						
	R22 Non-inverter	R410A Power inverter max. (PUHZ-F				
71	8.4	10.2	121%			
100	10.4	14.0	135%			
125	14.0	16.0	114%			
140	16.1	18.0	112%			

Wider Performance Range

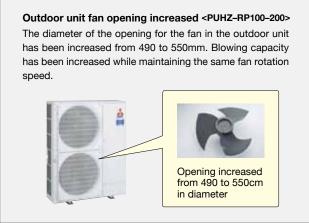
Operation is now possible at lower speeds, thus cutting energy losses produced by the repeated On/Off operation of non-inverter models. Comfort is improved while power consumption is reduced.



Advanced Energy Saving Technologies

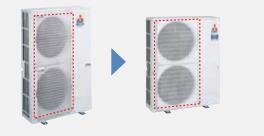
Highly efficient fan and grille for outdoor unit

The shapes of the fan and grille of the outdoor unit were redesigned, realising an increase in blowing capacity and more efficient heat exchange while maintaining the same operating noise level.



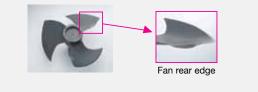
Grille shape changed <PUHZ-RP71-200>

The shape of the air outlet grille has been changed to reduce pressure loss. This has helped improve heat exchange performance.



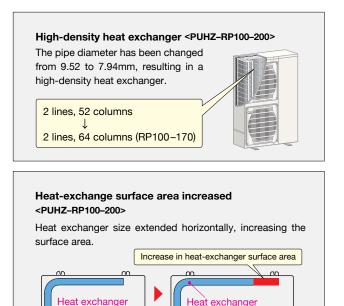
Inflexed fan <PUHZ-RP100-200>

Adoption of a fan with improved ventilation characteristics and a newly designed rear edge that suppresses wind turbulence raises fan operation efficiency.



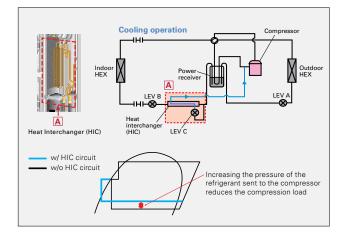
Highly efficient heat exchanger

A high density and increase in surface area have improved the heat-exchange efficiency of the heat exchanger.



Heat Interchanger (HIC) Added <RP140>

An HIC circuit has been added to improve energy efficiency during cooling operation. Liquid refrigerant is rerouted, transformed into a gas state and injected back into the system to increase overall pressure of the refrigerant being sent to the compressor, thereby reducing the load on the compressor and raising efficiency.

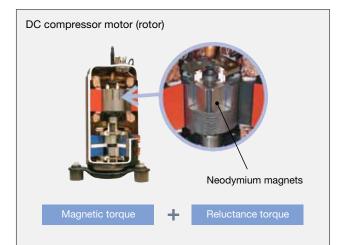


Advanced Technology for High Efficiency

Numerous Leading-edge Technologies Assure High Efficiency

Reluctance DC Rotary Compressor (PUHZ-RP71)

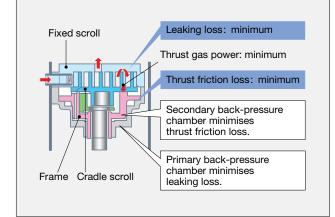
The reluctance DC motor has a rotor equipped with powerful neodymium magnets. The magnetic torque produced by the neodymium magnets and reluctance torque results in more efficient operation.



Highly Efficient Scroll Compressor (PUHZ-RP100/125/140/170/200)

Higher efficiency has been achieved by adding a frame compliance mechanism to the DC scroll compressor. The mechanism allows movement in the axial direction of the frame supporting the cradle scroll, thereby greatly reducing the leakage and friction loss, and ensuring extremely high efficiency at all speeds.





DC Fan Motor (PUHZ-RP71/100/125/140/170/200)

A highly efficient DC motor has been installed to drive the fan of outdoor units, realising up to 60% higher efficiency when compared to an equivalent AC motor.

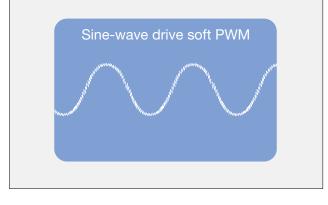
Vector-Wave Eco Inverter

This inverter monitors the varying compressor motor frequency and creates the most efficient waveform for the motor speed. As a result, operating efficiency in all speed ranges is improved, less power is used and annual electricity costs are reduced.

Smooth AC wave pattern

The inverter has been made more compact by inserting the circuitry inside a synthetic resin molding.

To ensure quiet operation, soft PWM control is used to prevent the metallic whine associated with conventional inverters.

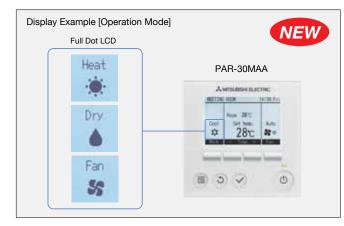


Power Receiver and Twin LEV Control (PUHZ-RP71/100/125/140/170/200)

Mitsubishi Electric has developed a power receiver and twin linear expansion valves (LEVs) that optimise the performance of the compressor. By ensuring optimum control in response to the operating waveform and outdoor temperature, this technology is tailored to the characteristics of the new refrigerant to enhance operating efficiency.

Full Dot Liquid Crystal Display Adopted

Easier to read thanks to use of a full dot liquid-crystal display with backlight, and easier to use owing to adopting a menu format that has reduced the number of operating buttons.



Energy-efficient Control

Operation Control Functions



Precise control of power consumption <PUHZ-RP71-200>

The amount of power consumed in each time period is managed so that the demand value is not exceeded. The demand control function can be set to start and finish in 5-minute units. Additionally, the level can be adjusted to 0, 50, 60, 70, 80 or 90% of maximum capacity, and up to 4 patterns can be set per day. Air conditioning operation is automatically controlled to ensure that electricity in excess of the contracted volume is not consumed.

Setting pattern example

Start time		Finish time	Capacity savings
8:15	\rightarrow	12:00	80%
12:00	\rightarrow	13:00	50%
13:00	\rightarrow	17:00	90%
17:00	\rightarrow	21:00	50%

Auto-return

Prevents wasteful operation by automatically returning to the preset temperature after specified operating time

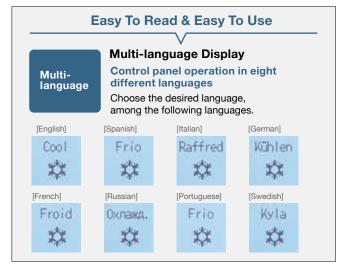
After adjusting the temperature for initial heating in winter or cooling on a hot summer day, it is easy to forget to return the temperature setting to its original value. The Auto-return function automatically resets the temperature back to the original setting after a specified period of time, thereby preventing overheating/overcooling. The Auto-return activation time can be set in 10-minute units, in a range between 30 and 120 minutes.

*Auto-return cannot be used when Temperature Range Restrictions is in use.



Keep desired room temperatures automatically

This function monitors the room temperature and automatically activates the heating mode when the temperature drops below the preset minimal temperature setting. It has the same function for cooling, automatically activating the cooling mode when the temperature rises above the preset maximum temperature setting.



Temperature Range Restriction

Temperature Range Restriction prevents overheating/overcooling

Using a temperature that is 1°C lower/higher for heating/cooling results in a 10% reduction in power consumption.* Temperature Range Restriction limits the maximum and minimum temperature settings, contributing to the prevention of overheating/overcooling. *In-house calculations

(Setting example of minimum temp. in 25°C) 19(°C) 30(°C) Possible temperature range setting 30(°C) 25(°C) Lower temperature limit Lower temperatures cannot be selected To prevent excessive cooling Office Restaurant Recommended for Turns heating/cooling off Auto-off automatically after preset time Timer elapses When using Auto-off Timer, even if one forgets to turn off the unit, operation stops automatically after the preset time elapses, thereby preventing wasteful operation. Auto-off Timer can be set in 10-minute units, in a range between 30 minutes and 4 hours. Eliminates all anxiety about forgetting to turn off the unit. Recommended for Meeting room Changing room Operation **Fixed temperature setting promotes** Lock energy savings

In addition to operation start/stop, the operation mode, temperature setting and airflow direction can be locked. Unwanted adjustment of temperature settings is prevented and an appropriate temperature is constantly maintained, leading to energy savings. This feature is also useful in preventing erroneous operation or tampering.

Recommended for Office

Office School Public hall Hospital Computer server facility

Weekly Timer

Set up to 8 patterns per day including temperature control

The Weekly Timer enables the setting of operation start and finish times and adjusting the temperature as standard features. Up to 8 patterns per day can be set, providing operation that matches the varying conditions of each period, such as the number of customers in the store.

*Weekly Timer cannot be used when On/Off Timer is in use.



*Based on in-house calculations

Installation/Maintenance Support Functions



Outdoor unit data accessed immediately, enabling fast maintenance <PUHZ-RP71-200>

Using the Stable Operation Control (fixed frequency) of the Smooth Maintenance function, the operating status of the inverter can be checked easily via the screen on the remote controller.

Smooth Maintenance Function Operating Procedure



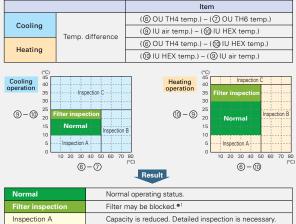
Display information (11 items)

	Compressor	6 OU TH4 temp. (°C)		
1	COMP. current (A)	0	OU TH6 temp. (°C)	
2	COMP. run time (Hr)	8	OU TH7 temp. (°C)	
3	COMP. ON/OFF (times)		Indoor Unit	
4	COMP. frequency (Hz)	9	IU air temp. (°C)	
	Outdoor Unit	10	IU HEX temp. (°C)	
5	Sub cool (°C)	1	IU filter operating time* (Hr)	
	and the state of the			

*IU filter operating time is the time elapsed since filter was reset.

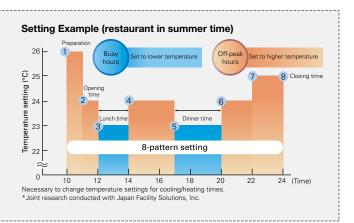
Inspection Guidelines

The computed temperature difference is plotted as in the graph below and operating status is determined.



inter mapeetion	The hay be blocked.
Inspection A	Capacity is reduced. Detailed inspection is necessary.
Inspection B	Refrigerant level is low.
Inspection C	Filter or indoor unit heat exchanger is blocked.

To be to indoor and outdoor temperatures, "Filter inspection" may be displayed even if the filter is not blocked.
 The above graphs are based on trial data. Results may vary depending on installation/temperature conditions.
 Stable operation may not be possible under the following temperature conditions:
 a) In cooling mode when the outdoor induction temperature is over 40°C or the indoor induction temperature is beel vary 32°C.
 b) In heating mode when the outdoor induction temperature is over 20°C or when the indoor induction temperature is over 25°C.
 If the above temperature conditions do not apply and stable operation is not achieved after 30 minutes has passed, please inspect the units.
 The operating status may change due to frost on the outdoor heat exchanger.



Manual Vane Angle Setting (4-way ceiling cassette)

Direction of vertical airflow for each vane can be set

Setting the vertical airflow direction for each individual vane can be performed simply via illustrated display. Seasonal settings such as switching between cooling and heating are easily changed as well.



Easily raise/lower panels using the remote controller

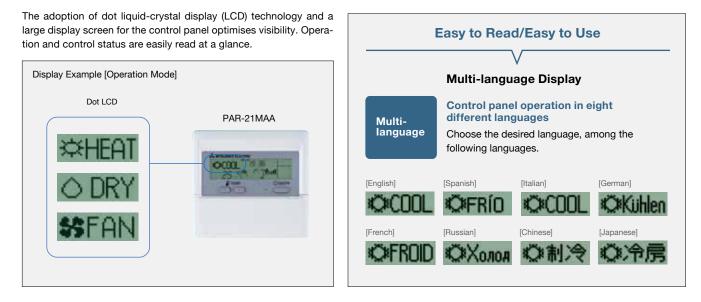
Auto-descending panel operation is available as an option. Panels can be lowered/raised using a button on the wired remote controller. Filter cleaning can be performed easily.

Reassuring Troubleshooting Navigation Function

Contact Details Displayed When Abnormality Occurs Easily contact a service company when there is a problem.

The telephone number of a service company and other information can be input and stored in advance. When a problem occurs, the contact details are displayed automatically, and a call for help can be made without delay.

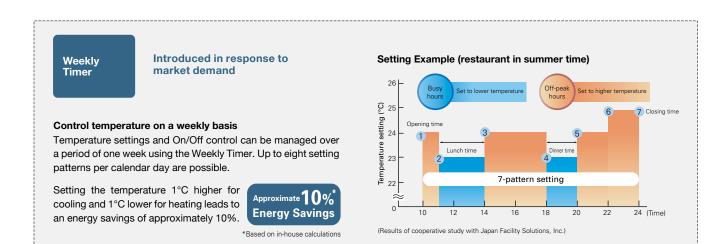
Dot Liquid Crystal Display Adopted



Energy-efficient Control

Operation Control Functions

Temperature Range Restriction	Air conditioner operation restricted to within a specified operating range	19(°C)	temperature range setting	in 25°C) 30 (°c) 30 (°c)		
••	lower limits for the temperature range during /e heating or cooling is prevented, leading to avings.	Lower temperature limit Lower temperatures cannot be selected Recommended for Offic	To prevent excessive	cooling		
Auto-off Timer	Automatically turns off air conditioner	The "Simple Timer"—starts/stops in units of 1 hour in a 72-hour period — is set at the time of shipment from the factory. It can be changed to the "Auto-off Timer" function using the remote controller. Recommended for Meeting room Changing room				
	e air conditioner to turn off automatically. The the range from 30 minutes up to 4 hours in					
Operation Lock	Prevent operation settings from being changed	Only the administrator can tion Lock mode. Recommended for Offic Hospi	ce School Public	hall		
When "Operation I commands are not in the specified (Ic	that the operation mode cannot be changed. Lock" is activated, new temperature setting accepted, thereby ensuring that the unit runs locked in) temperature range. This promotes I prevents erroneous/ mischievous operation.					

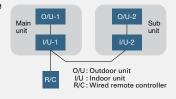


Rotation, Back-up and 2nd Stage Cut-in Functions (PAR-30MAA and PAR-21MAA)

(1) Rotation and Back-up Functions

- **Function Outline**
- Main and sub units take turns operating according to a rotation interval setting.
- If one unit malfunctions, the other unit automatically begins operation (Back-up function)

System Image



(2) 2nd Stage Cut-in Function

Function Outline

- Number of units operating is based on room temperature and predetermined settings.
- When room temperature rises above the desired setting, the standby unit starts (2-unit operation).
- When the room temperature falls 4°C below the predetermined setting, the standby unit stops (1-unit operation).

System Constraint

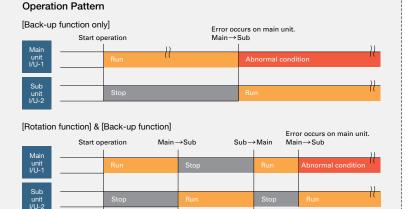
• This function is only available for rotation operation and when the back-up function is in cooling mode.

Easy Maintenance Function (Mr. Slim Power Inverter only)

- Nearly maintenance-free operation
- Monitor operation data of the indoor and outdoor units via the remote controller.
 Remote controller also lets you set the operating frequency, allowing easier inspection.

Fasy Maintenance Information

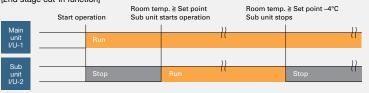
Compressor		Outdoor Unit			Indoor Unit
1	Accumulated operating time (×10hr)	4	Heat exchanger temperature (°C)	1	Intake-air temperature (°C)
2	Number of ON/OFF times (×100 times)	5	Discharge temperature (°C)	8	Heat exchanger temperature (°C)
3	Operating current (A)	6	Outdoor-air temperature (°C)	9	Filter operating time* (hr)



(Ex: When the request code is "313", each unit operates alternately in daily cycle.)

Operation Pattern

[2nd stage cut-in function]



Refrigerant Leakage Check (Mr. Slim Power Inverter only)

The Mr. Slim Power Inverter units come equipped with a useful new "Refrigerant Leakage Check" function. Using a wired remote controller, it is easy to check if refrigerant has been lost over a long period of use. This reduces service time and gives an added sense of safety.



Product Line-up	2.5kW	3.5kW	5.0kW	6.0kW
4-way ceiling cassette SLZ Compact cassette	SLZ-KA25VAQ(L)	SLZ-KA35VAQ(L)	SLZ-KA50VAQ(L)	
Image: state stat				PLA-RP60BA
Compact bulkhead SEZ		SEZ-KD35VAQ	SEZ-KD50VAQ	SEZ-KD60VAQ
Ceiling concealed PEA				
Ceiling suspended PCA			PCA-RP50KAQ	PCA-RP60KAQ
Wall mounted PKA				
Outdoor unit	SUZ-KA25VA2	SUZ-KA35VA2	SUZ-KA50VA2	SUZ-KA60VA2

Product Line-up of Mr.SLM Inverter Units 11-12



SERIES

e Sensor: optional)

PLA-RP60/71 100/125/140BA



Advancements in PLA Series improve style and performance for ensured indoor comfort

Wide Airflow

Wide-angle outlets distribute airflow to all corners of the room, ensuring the room is sufficiently cooled/heated. Horizontal airflow and a fan speed reduced by 20% compared to conventional models also contribute to increased comfort for occupants.



Less Cold Draft

The "Horizontal Airflow" function prevents cold drafts from striking the body directly, thereby keeping the body from becoming over-chilled.



Horizontal Airflow prevents drafty feeling

Using wired remote controller,

et airflow direction for each van (manual setting also possible)

Fixed

Independent Vane Direction Setting

Use the wired remote controller to set the airflow pattern of each vane independently. Easily adjust airflow to the interior layout and seasonal conditions, and ensure an even temperature distribution all the time.

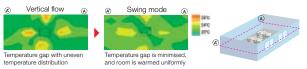
> Settings can be changed anytime using a wired remote controller

Wave Airflow Mode for Heating

The airflow direction at . "Wave Airflow" operation image each outlet changes intermittently, providing a consistent temperature throughout the room.



Wave control effect thermograph



Specifications: 4-way ceiling cassette (PLA)							
Indoor unit			PLA-RP60BA		PLA-RP71BA		
Outdoor unit			SUZ-KA	A60VA2	SUZ-K/	A71VA2	
Function		Cooling	Heating	Cooling	Heating		
Capacity (minmax	Capacity (minmax.) (kW)		6.1 (1.1-6.3)	6.9 (0.9-8.0)	7.1 (0.9-8.1)	8.0 (0.9-10.2)	
Input	out (kW)		1.87	1.97	2.07	2.19	
Rated EER/COP			3.26	3.50	3.50 3.43 3.65		
Rated AEER/ACOF	Rated AEER/ACOP		3.21	3.45	3.38	3.60	
Indoor unit			PLA-R	P60BA	PLA-RP71BA		
Power supply							
Airflow (Lo-Mi2-Mi	а LII)	CMM	12-14-16-18		14-16-18-21		
AITTOW (LO-IVII2-IVII	u-mi)	L/S	200-233-267-300		233-267-300-350		
Sound pressure lev	/el	(dB)	28-29	-31-32	28-30-	-32-34	
	Height	(mm)	Unit: 258, Panel: 35				
Dimensions	Width	(mm)		Unit: 840,	Panel: 950		
	Depth	(mm)		Unit: 840,	Panel: 950		
Weight		(kg)		Unit: 23,	Panel: 6		

Auto Fan Speed Mode

The fan speed is adjusted automatically, thereby maintaining a comfortable room environment at all times. At the start of operation, a high fan speed realises quick heating/cooling of the room. Once the desired temperature is reached, the fan speed is reduced for stable heating/cooling and greater comfort.

Fan speed setting by remote controller (four levels)



Special setting is required for wireless remote controlle

Quiet Operation



An improved airflow path and powerful highcapacity flow fan contribute to the realisation of quieter operation.

Power flow fan

1.2m

2.0m

2.4m

2.8m

3.2m 3.6m

"Pure White" Colour

Stylish, pure white-coloured panels and wired remote controller express a clean, streamlined image that is a suitable match for any interior.

Other Features

- · Stylish indoor-unit vane covers (when unit is turned off)
- Maximum upward draining of 850mm
- Wireless remote controller available
- Duct flange for Fresh-air Intake
- Branch duct

Automatic Grille Lowering Function (Option)

Easy to use/Simple maintenance

An automatic grille lowering function capable of stopping at eight different heights is available to simplify filter maintenance.



A receiver on the elevated panel detects commands from . the wireless remote controller

Cooling

7.1 (3.3-8.

2.09

PLA-RP71BA PLA-RP100BA		PLA-RP125BA		PLA-RP140BA			
PUHZ-RF	HZ-RP71VHA4 PUHZ-RP100VKA PU		PUHZ-RF	125VKA	PUHZ-RP140VKA		
Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating
(3.3-8.1)	8.0 (3.5-10.2)	10.0 (4.9-11.4)	11.2 (4.5-14.0)	12.5 (5.5-14.0)	14.0 (5.0-16.0)	14.0 (6.2-15.3)	16.0 (5.7-18.0)
2.09	2.17	2.50	2.95	3.80	3.71	4.55	4.43

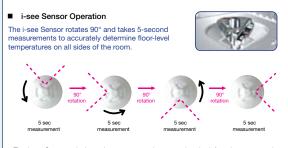
3.40	3.69	4.00	3.80	3.29	3.77	3.08	3.61				
3.22	3.51	3.67	3.54	3.10	3.57	2.93	3.41				
PLA-R	P71BA	PLA-RF	2100BA	PLA-RF	2125BA	PLA-RP140BA					
Single-phase, 50Hz, 230V											
14-16-	-18-21	20-23-	26-30	22-25-	28-31	24-26-29-32					
233-267-	-300-350	334-384-	434-501	367-417-	467-517	400-434-	-484-534				
28-30-	-32-34	32-34-	-37-40	34-36-	-39-41	36-39-	-42-44				
				Unit: 298,	Panel: 35						
Unit: 840, Panel: 950											
Unit: 25, Panel: 6							Panel: 6				

4-way cassettes can be equipped with the i-see Sensor, a radiation-based sensor that monitors floor-level temperatures throughout the room to ensure room comfort.

i-see Sensor works to ensure even temperature distribution and save energy (requires optional corner panel)



i-see Sensor improves energy efficiency and enhances room comfort The i-see Sensor is an innovative Mitsubishi Electric technology that uses a radiation-based sensor to monitor temperature throughout the entire room. When connected to the air conditioner control panel, i-see Sensor works to maximise room comfort through 360° sensing that covers the whole floor space.



• The i-see Sensor calculates the temperature by measuring the infrared rays emanating

The value and floors, and measuring the floor-level temperature.
The sensor rotates 360-degrees once every two minutes when there is significant temperature disparity and once every five minutes when a stable, even temperature has been reached.

"I Feel" Temperature Control

The sensory temperature is calculated by measuring the air-intake temperature and the floor temperature. This technology makes it possible to avoid overcooling or overheating.

Without i-see Sensor

Only intake-air temperature at the ceiling is measured, resulting in uneven temperature distribution.

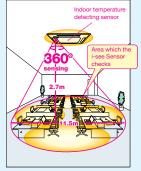


Heating Set temperature: 23°C without i-see Senso



With i-see Sensor

Both floor-level and intake-air temperatures are measured, providing operation that creates a comfortable room environment from ceiling to floor.



Heating Set temperature: 20°C with i-see Sensor + Auto Fan Speed



SERIES



PEA-RP71/100EAQ

PEA-RP125/140EAQ



PEA-RP170/ 200/250WHA



For elegance and style, the PEA Series compliments the room environment with aesthetically pleasing ceiling installation and a vast line-up of performance functions.

Freedom in Installation

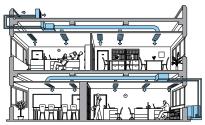
Versatile and easy installation is possible; for example, it is possible to adjust the distance between the air-intake and air-outlet vents to create the optimal airflow configuration.



Flexible Duct Design Enables Use of High-pressure Static Fan

A flexible duct design and 150Pa external static high-pressure are incorporated. The increased variation in airflow options ensures

operation that best matches virtually all room layouts.



Easier Handling

The new ducted fan coil unit (PEA-RP170/200/250WHA) now has a two-piece construction. This allows separation of the indoor unit heat exchanger and the fan deck assembly for easier handling into the roof space.



Computerised Dehumidification

The fan speed is controlled electronically in dehumidifying mode, increasing the range and efficiency of dehumidification.

	Specification	ns: Ceilin	g-cond	ealed (PEA)													
	Indoor unit			PEA-RF	71EAQ	PEA-RP	100EAQ	PEA-RP	125EAQ	PEA-RP	140EAQ	PEA-RP1	70WHA *4	PEA-RP20	00WHA *4	PEA-RP2	50WHA *4
	Outdoor unit			PUHZ-RF	P71VHA4	PUHZ-RF	P100VKA	PUHZ-RF	125VKA	PUHZ-RF	140VKA	PUHZ-RP170VKA		PUHZ-RP200YKA		PUHZ-RP250YHM-A	
	Function			Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating
	Capacity (mir	nmax.)	(kW)	7.1 (3.3-8.1)	8.4 (3.5-10.2)	10.0 (4.9-11.4)	11.2 (4.5-14.0)	12.5 (5.5-14.0)	14.0 (5.0-16.0)	14.0 (6.2-15.3)	16.0 (5.7-18.0)	17.0 (9.0-20.0)	20.0 (9.5-22.4)	18.9 (9.0-22.4)	22.4 (9.5-25.0)	22.0 (11.2-27.0)	25.0 (12.5-29.0)
	Input		(kW)	2.48	2.51	3.05	3.16	4.24	3.85	4.83	4.28	5.48	6.00	5.92	6.89	7.21	8.06
	Rated EER/C	OP * 1		2.86	3.35	3.28	3.54	2.95	3.64	2.90	3.74	3.10	3.33	3.19	3.25	3.05	3.10
	Rated AEER/	ACOP		2.75	3.20	3.05	3.32	2.80	3.45	2.77	3.56	2.93	3.17	2.90	2.99	3.01	3.07
	AEER/ACOP	(part-load	d %) ^{≉2}													3.16 (98)	
	Indoor unit PEA-RP71EAQ				PEA-RP	100EAQ	PEA-RP125EAQ PEA-RP140EAQ			140EAQ	PEA-RP170WHA PEA-RP200WHA		200WHA	PEA-RP	250WHA		
	Power supply Single-phase, 50					, 50Hz, 230V						Three-phase	, 50Hz, 400V)				
			CMM	22-27 ((Lo-Hi)	27-34	(Lo-Hi)		48-60	(Lo-Hi) 50-61-72 (Lo-Mid-Hi)				58-71-84 (Lo-Mid-Hi)		
	Airflow		L/S	367-450) (Lo-Hi)	450-567	' (Lo-Hi)		800-100	0 (Lo-Hi)		833-1017-1200 (Lo-Mid-Hi) 967-118			967-1183-140	00 (Lo-Mid-Hi)	
	External stati	c pressur	re Pa				12	25				60-75-100-150					
	Sound pressu	re level ^{®3}	(dB)	52-	55	54-	-58		51	-55			38-4	1-44		40-4	3-46
		Height	(mm)				42	28						47	70		
-	Dimensions	nensions Width (mm) 785 1,055 1,415							1,3	370							
		Depth	(mm)			1	69	0					1,1	20			
1	Weight (kg) 46 59 76				6				1(08							
日日日	a († 11)		-11			2		SIF		@2 ME	PS compliant	at part load	0/200/250WH				at ESP 150 Pa.

- Sound pressure level for PEA-RP170/200/250WHA are measured in anechoic chamber 4 PEA-RP170/200/250WHA come equipped with a wired remote controller PAR-21MAA.

PCA SERIES



PCA-RP71/125HAQ



High performance, easy-to-maintain stainless steel units perfect for use in kitchens and modern shops

Tough on Oily Smoke

A durable stainless steel casing that is resistant to oil and grease is provided to protect the surface of the body. Grimy dirt and stains are removed easily, enabling the unit to be kept clean at all times.

High Performance Oil Mist Filter

A high performance heavy duty oil mist filter is included as standard equipment. The filtering system is 1.5-times more efficient than conventional filters, thereby effectively reducing the oily

smoke entering the air conditioner. The filter is disposable to further simplify trouble free cleaning and maintenance.





Pull the handle to easily slide the filter out

Easy Maintenance – Even for Cleaning the Fan

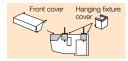
A separate fan casing that can be disassembled in sections is adopted to ensure easy fan cleaning. Drain pan cleaning onsite is also easy owing to the use of a pipe connector that can be quickly removed.

Bring in Outside Air for Fresher Air Conditioning (Option)

The rear panel has a knock-out opening that can be used to bring fresh air into the unit. This helps to improve ventilation in the kitchen for more comfort.

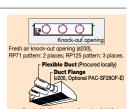
Cosmetic Front and Hanging Fixture Covers (Option)

Cosmetic covers are available to prevent the collection of dust and grime on the main body and hanging fixture sections.



Fresh Outside Air Intake

There is a knock-out opening on the rear panel of the unit that can be used to bring fresh air into the unit. This helps to improve ventilation and make the kitchen comfortable.



A fresh-air duct flange is required (sold separately)
 All fresh Outdoor-air Intake option is not available.

Specifications: Ceiling-suspended (PC)									
Indoor unit			PCA-RF	P71HAQ	PCA-RP	125HAQ			
Outdoor unit			PUHZ-RF	P71VHA4	PUHZ-RP125VKA				
Function			Cooling Heating		Cooling	Heating			
Capacity (mir	nmax.)	(kW)	7.1 (3.3-8.1)	7.1 (3.3-8.1) 7.6 (3.5-10.2)		13.8 (5.0-16.0)			
Input		(kW)	2.21	2.23	3.88	4.05			
Rated EER/C	OP		3.21	3.41	3.22	3.41			
Rated AEER/ACOP			3.02	3.02 3.25		3.24			
Indoor unit			PCA-RF	71HAQ	PCA-RP	125HAQ			
Power supply	/		Single-phase, 50Hz, 230V						
Airflow (Lo-H	:)	CMM	17-	-19	30-38				
AITIOW (LO-H	1)	L/S	283-	-317	500-633				
Sound press	ure level	(dB)	34-	-38	44-	-50			
	Height (mm)			28	30				
Dimensions Width (m		(mm)	1,1	36	1,5	20			
Depth (mm)			6	50	0				
Weight (kg)			41			56			

PCA-RP50/60/71/100/125/140KAQ

PCA SERIES

A stylish indoor unit design and airflow settings for both high- and low-ceiling interiors expand installation possibilities

Stylish Indoor Unit Design

A stylish square-like design is adopted for the indoor units of all models. As a result, the units blend in better with the ceiling.



Optional Drain Pump for Full-capacity Models

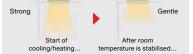
The pumping height of the optional drain pump has been increased from 400mm to 600mm, expanding flexibility in choosing unit location during installation work.



Equipped with Automatic Air-speed Adjustment

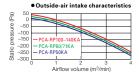
In addition to the conventional 4-speed setting, units are now equipped with an automatic air-speed adjustment mode. This setting automatically adjusts the air-speed to conditions that match the room environment. At the start of heating/cooling operation, the airflow is set to high-speed to quickly heat/cool the room. When the room temperature reaches the desired setting, the airflow speed is de-

creased automatically for stable comfortable heating/cooling operation.



Fresh Outside-air Intake

Units are equipped with a knockout hole that enables the induction of fresh outside-air.



Equipped with High /Low-ceiling Modes

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

Capacity	High ceiling	Standard ceiling	Low ceiling
50	3.5m	2.7m	2.5m
60	3.5m	2.7m	2.5m
71	3.5m	2.7m	2.5m
100	4.2m	3.0m	2.6m
125	4.2m	3.0m	2.6m
140	4.2m	3.0m	2.6m

1	Specification	is: Ceiling-su	spende	ed (PCA)						-							
	Indoor unit			PCA-RF	P50KAQ	PCA-RF	P60KAQ	PCA-RF	P71KAQ	PCA-RI	P71KAQ	PCA-RP	100KAQ	PCA-RP125KAQ		PCA-RP	140KAQ
1	Outdoor unit SUZ-KA50VA2		450VA2	SUZ-KA60VA2 SUZ-KA71VA2		PUHZ-RP71VHA4		PUHZ-RF	100VKA	PUHZ-RP125VKA		PUHZ-RP140VKA					
1	Function			Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating
	Capacity (min	ımax.)	(kW)	5.0 (1.1-5.6)	5.5 (0.9-6.6)	5.7 (1.1-6.3)	6.9 (0.9-8.0)	7.1 (0.9-8.1)	7.9 (0.9-10.2)	7.1 (3.3-8.1)	8.0 (3.5-10.2)	10.0 (4.9-11.4)	11.2 (4.5-14.0)	12.5 (5.5-14.0)	14.0 (5.0-16.0)	14.0 (6.2-15.3)	16.0 (5.7-18.0)
	Input		(kW)	1.66	1.71	1.77	2.02	2.06	1.96	1.96	2.21	2.63	3.02	3.88	3.88	4.36	4.43
	Rated EER/C	OP		3.01	3.22	3.22	3.42	3.45	4.03	3.62	3.62	3.80	3.71	3.22	3.61	3.21	3.61
-	Rated AEER/	ACOP		2.96	3.17	3.17	3.36	3.40	3.97	3.42	3.45	3.50	3.46	3.04	3.42	2.99	3.41
1	Indoor unit PCA-RP50KAQ PCA-RP60KAQ PCA-RP71KAQ PCA-RP71KAQ					PCA-RP	100KAQ	PCA-RP	125KAQ	PCA-RP	140KAQ						
	Power supply Single-phase, 50Hz, 230V																
	Airflow (Lo-M	(11 1-14 0)	CMM	10-11	-13-15	15-16	-17-19		16-17	-18-20		22-24-26-28		23-25	-27-29	24-26-29-32	
	AITIOW (LO-IVI	12-11/10-11/	L/S	167-183	-217-250	250-267	-283-317		267-283-	300-333		367-400-433-467		383-417-450-483		400-433-483-533	
	Sound pressu	ure level	(dB)	32-34	-37-40	33-35	-37-40		35-37-	39-41		37-39	41-43	39-41-43-45		41-43-45-48	
		Height	(mm)							2	30						
2	Dimensions	Width	(mm)	96	60		1,280							1,6	600		
22		Depth	(mm)				680										
	Weight		(kg)	2	5			32			3	6	3	8	3	9	
1	1																

PKA SERIES



PKA-RP71/100KAL





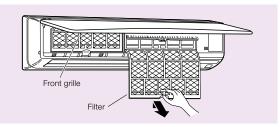
Elegant design and compact dimensions are ideal for offices, stores and residential-use

Auto-flap Shutter Enhances Good Looks

The Intake Grille Filter Can be Completely Removed Allowing Easy Cleaning

(Can be washed in water)

Filter slides out



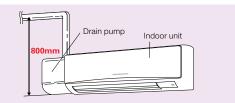
4-way Piping Provides More Flexibility in Selecting Installation Sites

Wired Remote Controller Available (Option)

A separately sold wired remote controller and a terminal block are available to suit various installation sites.

Drain Pump Option Available with All Models

Installation of the drain pump enables a drain outlet as high as 800mm above the base of the indoor unit. Drain water can be discharged easily even if the surface where the wall-mounted unit does not have direct access outside, increasing the degree of freedom for installation.



Specifications: Wall-mounted (PKA)									
Indoor unit			PKA-RI	P71KAL	PKA-RP	100KAL			
Outdoor unit			PUHZ-RF	P71VHA4	PUHZ-RP100VKA				
Function			Cooling Heating		Cooling	Heating			
Capacity (mir	nmax.)	(kW)	7.1 (3.3-8.1)	8.0 (3.5-10.2)	10.0 (4.9-11.4)	11.2 (4.5-14.0)			
Input		(kW)	1.96	2.13	2.90	3.10			
Rated EER/C	OP		3.62	3.76	3.45	3.61			
Rated AEER/	ACOP		3.42	3.57	3.20	3.31			
Indoor unit			PKA-RP7	IKAL	PKA-RP	100KAL			
Power supply	/		Single-phase, 50Hz, 230V						
A:=======(l = A)		CMM	18-2	0-22	20-23-26				
Airflow (Lo-M	iid-Hi)	L/S	300-33	33-367	333-283-433				
Sound press	ure level	(dB)	39-4	2-45	41-4	5-49			
	Height	(mm)		36	35				
Dimensions Width (mm)				1,1	70				
	Depth	(mm)	295						
Weight		(kg)	21						

Compact 4-way Cassette **Compact Bulkhead**





(For SLZ)

SEZ-KD35/50/ 60/71VAQ

> Specifications: Compact 4-way cassette/Compact bulkhead (SLZ, SEZ) Indoor unit SLZ-KA25VAQ (L) SLZ-KA35VAQ (L) SLZ-KA50VAQ (L) Outdoor unit SUZ-KA25VA2 SUZ-KA35VA2 SUZ-KA50VA2 Function Cooling Heating Cooling Heating Coolina Heating Capacity (min.-max.) (kW) 5 (0.9-3.2) 3.2 (0.9-4.5) 3.5 (1.0-3.9) 4.0 (0.9-5.0 4.6 (1.1-5.2) 5.0 (0.9-6.5 Input (kW) 0.68 0.85 1.04 1.09 1.53 1.55 Rated EER/COP 3.68 3.76 3.37 3.67 3.01 3.22 Rated AEER/ACOF 3.53 3.65 3.28 3.58 2.95 3.17 AEER/ACOP (part-load %)* 4.10 (53) SLZ-KA50VAQ (L) Indoor unit SLZ-KA25VAQ(L) SLZ-KA35VAQ (L) Power supply ngle-phase, 50Hz, 230\ 8-9-10 CMN 8-9-11 Airflow (Lo-Mid-Hi) L/S 133-150-167 133-150-183 External static pressure Pa 28-31-37 30-34-39 Sound pressure level (dB) 29-33-38 Height (mm) Unit: 208, Panel: 20 Dimensions Width (mm) Unit: 570. Panel: 650 Depth (mm) Unit: 570, Panel: 650 Weight (kg) Unit: 16.5. Panel: 3

Compact, ultra-quiet concealed indoor units equipped with cutting-edge control technologies for enhanced comfort

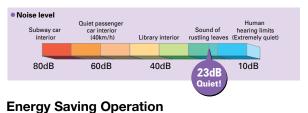
Compact Designs

Models with capacity ranges for any room size. The dimensions of the SLZ are perfect for 2-metre-square installations, and the SEZ unit is a slim 200mm in height, making it ideal for tight installation spaces.



Impressively Quiet

S Series units offer whisper quiet operation at a hushed noise level of 23dB (SEZ-KD35), ensuring a calm and comfortable environment. They're so quiet that you'll find yourself checking to see if they're on.



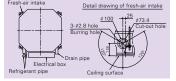
Boasting low electricity consumption, SLZ/SEZ Series air conditioners are the key to fresh, cost-effective room comfort.

Air Cleaning Filter

This built-in filter removes dust and other particulates, keeping the air clean all the time. Maintenance is as simple as vacuuming. The long-life filter in SLZ Series air conditioners can be used for approximately 2,500 hours before requiring replacement.

Fresh Air Intake

A duct hole is provided in the main body, making it possible to intake fresh air from outside.



SEZ-KD	035VAQ	SEZ-KD	050VAQ	SEZ-KE	060VAQ	SEZ-KI	D71VAQ	
SUZ-KA	A35VA2	SUZ-KA	450VA2	SUZ-KA	A60VA2	SUZ-KA71VA2		
Cooling	Heating	Cooling	Heating	Cooling	Heating	Cooling	Heating	
3.7 (1.0-3.9)	4.2 (0.9-5.0)) 5.1 (1.1-5.6) 6.4 (1.1-7.2)		5.6 (1.1-6.3)	7.4 (0.9-8.0)	7.1 (0.9-8.3)	8.1 (0.9-10.4)	
1.09 1.13		1.64	1.81	1.86	2.11	2.36	2.18	
3.39	3.72	3.11	3.54	3.01	3.51	3.01	3.72	
3.31	3.63	3.06	3.48	2.96	3.46	2.97	3.66	
SEZ-KD	035VAQ	SEZ-KD	050VAQ	SEZ-KE	060VAQ	SEZ-KI	D71VAQ	
7-9	-11	10-12	2.5-15	12-1	5-18	12-16-20		
117-15	60-183	167-20	08-250	200-25	50-300	200-267-333		
			5-15-	35-50				
23-2	8-33	30-3	4-37	30-3	4-38	30-3	5-40	
	20	00			20	00		
	99	90		1,190				
	70	00		700				
2	1	2	3		2	7		

The SLZ-KA VAL comes equipped with a wireless remote controller. The SLZ-KA VAQ and SEZ-KD VAQ do not include neither wired nor wireless remote controller. MEPS compliant at part load

Main features of Mr. Slim Inverter Units

	Indoor unit	SLZ-VAQ	SLZ-VAL	SEZ-VAQ	PL	A	PE	EA	PKA	PCA-	KAQ	PCA-HAQ
Combination	Outdoor unit	SUZ	SUZ	SUZ	PUHZ	SUZ	PUHZ-HA PUHZ-KA	PUHZ-HM	PUHZ	PUHZ	SUZ	PUHZ
Energy Saving	Felt Temperature Control (i-see Sensor)	_	_	_	Opt	Opt	_	_	_	_	—	-
	Pure White	٠	•	—	٠	•	-	-	•	٠	٠	-
Attractive	Auto Vane	٠	٠	—	٠	٠	-	-	٠	٠	٠	-
	Fresh Air Intake	٠	٠	—	٠	•	-	-	_	٠	٠	•
	High Efficiency Filter	_	-	—	Opt	Opt	—	_	_	Opt	Opt	-
Air Quality	Oil Mist Filter	—	_	-	—	-	-	-	—	-	—	•
	Long Life filter	٠	٠	-	•	٠	-	-	—	•	•	-
	Filter Check Signal	٠	_	-	•	٠	-	-	Opt	•	•	•
	Horizontal Fin (Auto Swing)	٠	٠	-	•	٠	-	-	٠	٠	٠	-
Air Distribution	High Ceiling Mode	—	_	-	•	٠	-	-	—	•	•	-
	Auto Fan Speed Mode	—	—	•	•	٠	-	-	٠	٠	٠	-
	On/Off Operation Timer	٠	٠	•	•	٠	•	•	٠	•	•	•
	Auto Change Over *1	٠	٠	•	•	٠	•	•	٠	•	٠	•
	Auto Restart	٠	•	•	•	•	•	● *3	٠	•	٠	•
Convenience	Low Temperature Cooling	٠	٠	•	•	٠	٠	•	٠	•	٠	•
	Low Noise Operation (Outdoor Unit)	-	-	—	٠	—	٠	•	•	٠	_	•
	Rotation, Back-up and 2nd Stage Cut-in Function	_	-	_	•	—	_	_	Opt	٠	_	•
	PAR-21MAA Control *2	Opt	Opt	Opt	Opt	Opt	Opt	● *6	Opt	Opt	Opt	Opt
	PAR-30MAA Control *2	Opt	Opt	Opt	Opt	Opt	Opt	Opt	Opt	Opt	Opt	Opt
System Control	Centralised On/Off Control *2	Opt	Opt	Opt	Opt	Opt	Opt	Opt	Opt	Opt	Opt	Opt
	System Group Control *2	Opt	Opt	Opt	•	Opt	٠	● *4	Opt	٠	Opt	•
	M-NET Connection *2	Opt	Opt	Opt	Opt	Opt	Opt	•	Opt	Opt	Opt	Opt
	Reuse of Existing Wiring	_	—	-	Opt	—	_	-	Opt	Opt	—	Opt
Installation	Drain Pump	٠	•	Opt	•	•	-	-	Opt	Opt	Opt	-
Installation	Pump Down Switch	_	_	_	٠	_	٠	•	•	•	_	•
	Flare Connection	٠	•	•	•	•	●*5	—	•	•	٠	•
Maintenance	Self-Diagnosis Function (Check Code Display)	٠	•	•	٠	•	٠	•	•	•	٠	•
- Wantenance	Failure Recall Function	٠	٠	•	٠	٠	٠	•	٠	٠	٠	•

*1 When multiple indoor units connected to an MXZ outdoor unit are running at the same time, simultaneous cooling and heating is not possible.
*2 Please refer "System Control" on page 21 for details.
*3 Indoor unit DIP SW1-9 must be "ON".

*4 Only available between PUHZ-HM models.
*5 Not available with PEA-RP170/200WHA models.
*6 PEA-RP170/200/250WHA come equipped with a wired remote controller PAR-21MAA.

20

System Controls (SUZ and Mr. Slim Power Inverter only) Versatile system controls can be realised by using optional parts, relay circuits, control panels, etc.

	System e	examples	Details	Major optional parts required
	Wired remote controller	Wireless remote controller	Details	major optional parts required
A Single-remote controller control standard system	PAR-30MAA PAR-21MAA (Example of 1 : 1 system)		Either wired or wireless remote controller can be used	None
B Dual Remote Controllers Two remote controllers, one each or local and remote control of the system	PAR-30MAA/PAR-21MAA * Set Wain* and *Sub* remote controllers. (Example of 1 : 1 system)		 Up to two remote controllers can be connected to one group PAR-30MAA can be used as only main remote controller Both wired and wireless remote controllers can be used in combination 	Wired remote controller PAR-30MAA/PAR-21MAA Terminal block for wired remote controller for PKA PAC-SH29TC-E Wireless remote controller PAR-SL97A-E Wireless remote controller kit for PCA PAR-SL99B-E
C Group control Dne remote controller can control nultiple air conditioners simulta- neously using the same setting. The setting of the refrigerant address is required for outdoor unit.	(Example of 1 : 1 systemx2)		 One remote controller can control up to 16 refrigerant systems Outdoor unit can be started/ stopped (thermostat On/Off) individually. Up to two remote controllers can be connected 	 MAC-397 IF-E is required for each indoor unit if the outdoor unit is SUZ or MXZ (if the outdoor unit is P Series no optional parts are required)
D Operation Control by level signal (12VDC) Turn on/off unit from a remote ocation, prohibit/permit operation using a local remote controller	Relay box (to be purchased locally)	Remote control panel (Example of 1 : 1 systemx2)	Operation other than On/Off (adjustment of temperature, fan speed, and air direction, for example) can be performed even when remote controller operation is prohibited Timer control is possible with an external timer	 Adapter for remote On/Off PAC-SE55RA-E Relay box (to be purchased locally) Remote control panel (to be purchased locally)
E Operation control by pulse signal	Relay box (to be purchased locally)	Remote control panel (Example of 1 : 1 system×2)	 The pulse signal can be turned On/Off. Operation/Fault signal can be received at a remote location (12VDC signal) 	Connector cable for remote display PAC-SA88HA-E/PAC-725AD (10 pcs.x PAC-SA88HA-E) Relay box (to be purchased locally) Remote control panel (to be purchased locally)
E Remote display of operating status Deperating status can be displayed at a remote location.	Remote operation adapter/ connector cable for remote display + rely box Remote ganel (Example of 1 : 1 system)		• Operation/Fault signal can be received at a remote location (when channeled through the PAC-SF40RM \rightarrow no-voltage signal, when channeled through the PAC-SA88HA-E \rightarrow 12VDC signal)	Remote display panel (to be purchased locally) Connector cable for remote display PAC-SA88HA-E/PAC-725AD (10 pcs. x PAC-SA88HA-E) Relay box (to be purchased locally) Remote operation adapter PAC-SF40RM "cannot be used with wireless remote controller Remote display panel (to be purchased locally)
G Timer Operation Dn/Off timer enabled For the control by external timer, refer to ① operation control by level signal.	PAR-30MAA PAR-21MAA (Example of 1 : 1 system)		Weekly Timer: On/Off and up to eight pattern temperatures can be set for each calendar day (initial setting) Simple Timer: Unit can be set to turn on/off one time each in a 72hr period; setting intervals of 1hr Auto-off Timer: Unit turns on/off after a specified time elapses. Can be set in the range from 30min to 4hr at intervals of 30min. "Simple Timer and Auto-off Timer cannot be used at the same time. "See page 7-8 for the function of PAR-30MAA	Standard functions of PAR-30MAA/PAR-21MAA
Centralised control (for Power Inverter only) Centralised control of dispersed air conditioning equipment allows effective nonitoring/controlling.	Power supply unit Centralised remote controller G-50, etc.	M-NET system)	 Mounting the adapter for M-NET connection to the outdoor unit allows MELANS (M-NET system) connection Allows centralised control by MELANS 	PAC-SF81MA-E
Centralised On/Off control for All Outdoor Units) Jp to eight indoor units can be witched On/Off with one emote controller.	MAC Indoor unit	-821SC-E	 Centralised remote controller can be connected to each indoor unit via interface. Units can be turned on/off independently or simultaneously using a centralised controller On/Off statues of each unit can be confirmed viewing the LED display of the centralised controller 	MAC-397IF-E (Interface) MAC-821SC-E (Centralised remote controller)
Interlocking with Lossnay Lossnay can be controlled with a remote controller.	Lossnay operation cable		Lossnay can be connected to the indoor unit	Slim-Lossnay connection cable

Specifications: Outdoor Unit

Outdoor unit					C	0				
			SUZ-KA25VA2	SUZ-KA35VA2	SUZ-KA50VA2	SUZ-KA71VA2				
External finish			Munsell 3.0Y 7.8/1.1							
Power supply					Single-phase, 50Hz, 230V					
Compressor output		(kW)	0.55	0.65	0.8	5	1.2			
Airflow (cooling/heat	ting) CN	/IM (L/S)	34 (568)/32 (534)	33 (551)	49 (818)		50 (835)/48 (800)			
Sound pressure	Cooling mode		46	47	53		55			
level (dB)	Heating me	ode	46	48	55		55			
Sound level		(dB)	59	61	68		69			
	Height	(mm)	55	i0	85	880				
Dimensions	Width	(mm)	80	0	84	840				
	Depth	(mm)	28	5	330		330			
Weight (kg)		(kg)	33	37	53	3	53			
Chargeless piping length (m)		(m)			7					
Max. piping length (m)		(m)	20	0	30					
Breaker size		(A)	10)		20				

*Above specifications are for outdoor units only.

Outdo	oor unit										
			PUHZ-RP71VHA4	PUHZ-RP100VKA	PUHZ-RP125VKA	PUHZ-RP140VKA					
External finish				Munsell 3.	0Y 7.8/1.1						
Power supply				Single-phase, 50Hz, 230V							
Compressor output		(kW)	1.6	1.9	2.4	2.9					
Airflow (cooling/hea	ting) CN	MM (L/S)	60 (1,000)	110 (1,830)	120 (2	2,000)					
	Cooling m	ode	47	49	50	50					
Sound pressure level (dB)	Silent mode		44	46	47	47					
	Heating m	ode	48	51	52	52					
Sound level		(dB)	66	69 70		70					
	Height	(mm)	943	1,338							
Dimensions	Width	(mm)	950		1,050						
	Depth	(mm)		33	0						
Weight		(kg)	67	11	8	120					
Chargeless piping le	ength	(m)	30		30						
Max. piping length		(m)	50		75						
Protection device				Discharge then	mo, HP switch						
Rated running curre (cooling/heating)	nt	(A)	9.50/9.64	12.64/13.58	16.90/16.99	19.68/19.23					
Breaker size		(A)	25	32	2	40					

Specifications: Outdoor Unit

Outdoor unit					
		PUHZ-RP170VKA/YKA	PUHZ-RP200YKA	PUHZ-RP250YHM-A	
External finish			Munsell 3.0Y 7.8/1.1		
Power supply		V: Single-phase, 50Hz, 230V	Three-phase, 50Hz, 400V		
Compressor output (kW)		3.0	3.6	6.7	
Airflow (cooling/heating)	CMM (L/S)	140 (2	185 (3,083)		
Cooling	mode	5	58		
Sound pressure level (dB) Silent m	ode	5	6	-	
Heating	mode	5	9	58	
Sound level	(dB)	70	-		
Height	(mm)	1,3	1,650		
Dimensions Width	(mm)	1,0	920		
Depth	(mm)	33	760		
Weight	(kg)	V: 127 Y: 131	136	200	
Chargeless piping length	(m)	3	0	7.5	
Max. piping length	(m)	7:	5	75	
Protection device					
Rated running current (A) (cooling/heating)		V: 23.8/24.8 Y: 8.0/8.8	8.7/10.2	10.54/11.80	
Breaker size (A)		V: 40 Y: 32	32	32	

*Above specifications are for outdoor units only.

Notes for All Specifications

Rating conditions (AS/NZS 3823) Cooling - Indoor: 27°C (80°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 Refrigerant piping length (one-way): 5m (16ft.) Total input based on the indicated voltage (indoor/outdoor)

	Indoor	Outdoor
50Hz	Single-phase, 230V	Single-phase, 230V/Three-phase, 400V

Guaranteed Operating Range

		SUZ	-KA	PUHZ	PUHZ
		25/35	50/60/71	71/100/125/140/170/200	250
Cooling	Upper limit (DB)	46°C	43°C	46°C	43°C
Cooling	Lower limit (DB)	-10°C	–15°C	−5°C (−15°C*)	–5°C
Heating	Upper limit (DB)	24°C	24°C	21°C	21°C
	Lower limit (DB)	15°C	-15°C	-20°C	-11°C

 \star With the optional air outlet guide, the operation at –15°C outdoor temperature is possible.

Sound Pressure Level

• Sound pressure measurements were conducted in an anechoic chamber.

• The actual noise level depends on the distance from the unit and the acoustic environment.

Optional Parts

Part name	Model name	Application name	Part name	Model name	Application name
	PAC-SG59SG-E	PUHZ-RP71			PCA-RP50KAQ
Air outlet guide	PAC-SH96SG-E	PUHZ-100/125/140/170/200	High efficiency filter	PAC-SH89KF-E PAC-SH90KF-E	PCA-RP60/71KAQ PCA-RP100/125/140KAQ
Air outlet shutter plate	PAC-SH51SP-E	PLA-RP	High efficiency filter element	PAC-SH59KF-E	PLA-RP
	PAC-SH63AG-E	PUHZ-RP71	i-see Sensor corner panel	PAC-SA1ME-E	PLA-RP
Air protection guide	PAC-SH95AG-E	PUHZ-RP100/125/140/170/200	Joint pipe $\begin{array}{c} \emptyset 9.52 \rightarrow \emptyset 12.7\\ \emptyset 15.88 \rightarrow \emptyset 19.05 \end{array}$	PAC-SG73RJ-E PAC-SG75RJ-E	PUHZ-RP71/100/125/140/170/200 PUHZ-RP71/100/125/140
Built-in wireless remote control receiver kit	PAR-SA9FA-E	PLA-RP	L-shape connection pipe	PAC-SC84PI-E PAC-SC86PI-E	PKA-RP71 PKA-RP100
Control / service tool	PAC-SK52ST-E	PUHZ-RP71/100/125/140/170/200	M-NET adapter	PAC-SF81MA-E	PUHZ-RP71/100/125/140/170/200
	PAC-SF81KC-E	PCA-RP71HAQ	Multi-function casement	PAC-SH53TM-E	PLA-RP
Decoration cover	PAC-SF82KC-E	PCA-RP125HAQ	Oil mist filter element	PAC-SG38KF-E	PCA-RP71/125HAQ
	PAC-SG64DP-E	PUHZ-RP71	Power supply terminal kit	PAC-SG96HR-E	PUHZ-RP71/100/125/140/170/200
Drain pan	PAC-SH97DP-E	PUHZ-RP100/125/140/170/200	Program timer	PAC-SC32PTA	All indoor units (excluding PEA-RP250WHA)
	PAC-SE90DM-E	PKA-RP		PAC-SA89TA-EP	PEA-RP250WHA
Ducia aurora	PAC-SH83DM-E	PCA-RP50KAQ	Remote On/Off adapter	PAC-SE55RA-E	All indoor units
Drain pump	PAC-SH84DM-E	PCA-RP71/100/125/140KAQ	Remote operation adapter	PAC-SF40RM-E	All indoor units (excluding PEA-RP250WHA)
	PAC-SH85DM-E	PCA-RP60KAQ	Remote sensor	PAC-SE55RA-E	All indoor units
	PAC-SG61DS-E	E PUHZ-RP71/100/125/140/170/200	Space panel	PAC-SH48AS-E	PLA-RP
Drain socket	MAC-851DS MAC-811DS	SUZ-KA25/35 SUZ-KA50/60/71	Terminal block	PAC-SH29TC-E	PKA-RP for wired remote controller
Duct flange for fresh air	PAC-SF28OF-E	PCA-RP71/125HAQ	Wired remote controller	PAR-21MAA PAR-30MAA	All indoor units (excluding PEA-RP170/200/250WHA)
Filter dryer ø 9.52 (liquid)	PAC-SG82DR-E	PCA-RP71/125HAQ	Wireless remote controller kit	PAR-SL94B-E	PCA-RP
Flange for Fresh-air Intake	PAC-SH65OF-E	PLA-RP	Wiring replace kit	PAC-SH52HR-E	PLA-RP

Refrigerant Piping

0	Between indoor & outdoor units				
Capacity	Max. height difference (m) Max. piping length (m)		Pipe size OD (mm) (in.)	Thickness (mm)	
SUZ-KA25	12	20	Liquid: ø6.35	t 0.8	
30Z-KA20	12	20	Gas: ø9.52	t 0.8	
SUZ-KA35	12	20	Liquid: ø6.35	t 0.8	
00210100	1L	20	Gas: ø9.52	t 0.8	
SUZ-KA50	30	30	Liquid: ø6.35	t 0.8	
302-NA30	50	30	Gas: ø12.7	t 0.8	
SUZ-KA60	30	30	Liquid: ø6.35	t 0.8	
00210100			Gas: ø15.88	t 1.0	
SUZ-KA71	30	30	Liquid: ø9.52	t 0.8	
SOZ-NAT I	50	50	Gas: ø15.88	t 1.0	
PUHZ-RP71	30	50	Liquid: ø9.52	t 0.8	
r Onz-nir / i	30	30	Gas: ø15.88	t 1.0	
PUHZ-RP100/125/140	30	75	Liquid: ø9.52	t 0.8	
1012111100/120/140	00	15	Gas: ø15.88	t 1.0	
PUHZ-RP170/200	30	75	Liquid: ø9.52	t 0.8	
FURZ-RF170/200	30		Gas: ø25.4	t 1.0	
PUHZ-RP250	30	75	Liquid: ø9.52	t 0.8	
10112-11-200		10	Gas: ø22.2	t 1.0	

Amount of Necessary Refrigerant (R410A: kg)

25

Piping length	Factory charged	Additional charged					Calculation
riping length	7m	10m	15m	20m	25m	30m	Galculation
SUZ-KA25	0.9	0.15	0.3	0.45	-	-	Va. 20a/mu/lanath 5\m
SUZ-KA35	1.05	0.15	0.3	0.45	-	-	Xg=30g/m×(length-5)m
SUZ-KA50	1.6	0.06	0.16	0.26	0.36	0.46	Ya 20a/mu (lapath 7)m
SUZ-KA60	1.8	0.06	0.16	0.26	0.36	0.46	Xg=20g/m×(length-7)m
SUZ-KA71	2.0	0.165	0.44	0.715	0.99	1.265	Xg=55g/m×(length-7)m

Piping length	Factory charged	Additional charged				
	10 - 30m	31 - 40m	41 - 50m	51 - 60m	61 - 75m	
PUHZ-RP71	3.5	0.6	1.2	-	-	
PUHZ-RP100/125/140	5.5	0.6	1.2	1.8	2.4	

Piping length	Factory charged	Additional charged				
	10 - 30m	31 - 40m	41 - 50m	51 - 60m	61 - 70m	
PUHZ-RP170/200	10.5	0.9	1.8	2.7	3.6	
tThe should value approximate a state and the same of 1.1 comparisons						

*The above values apply in the case of 1:1 connections. *Please refer to the service manual for PUHZ-RP250.

▲ NOTICE

Air conditioners in this brochure contain and operate with refrigerant R410A and synthetic oils. Before attempting any installation work you must read the installation instructions. New tools, materials and procedures are required to install these products. Under New Zealand Law, only persons suitably licensed are permitted to install and service air conditioning units. Refer to Country, Commonwealth, State or Territory legislation, regulations and industry codes of practice, before installation of these products.
Becovery and disposal of waste material must comply with Council guidelines.
Do not install indoor units in areas (e.g., mobile phone base stations) where the emission of VOCs such as phthalate compounds and formaldehyde is known to be high as this may result in a chemical reaction.
When installing or relocating or servicing the air conditioners, use only the specified refrigerant (R410A) to charge the refrigerant lines. Do not mix it with any other refrigerant and do not allow air to remain in the lines. If air is mixed with the refrigerant, then it can be the cause of abnormal high pressure in the refrigerant lines, and may result in an explosion and other hazards. The use of any refrigerant other than that specified for the system will cause mechanical failure or system malfunction or

The use of any refrigerant other than that specified for the system will cause mechanical failure or system malfunction or unit breakdown. In the worst case, this could lead to a serious impediment to securing product safety.

Constant warmth in winter and cool comfort in summer is only a phone call or click away.

Simply contact your nearest Mitsubishi Electric Specialist today and you can find out all there is to know about how to enhance your living environment. Our specialists are fully qualified to give you all the right advice on which Mitsubishi Electric Air Conditioning System is right for you.

To locate your nearest Mitsubishi Electric Specialist go to our website

http://www.mitsubishi-electric.co.nz

They will determine whether a Compact Inverter System or a Power Inverter System best suits your needs, both in comfort and efficiency. You can either visit one of our Specialist's Showrooms, or they will happily arrange for one of their consultants to come to your home.

All Mitsubishi Electric Compact and Power Inverter Systems are MEPS (Minimum Efficiency Performance Standard) Compliant, so you can be sure that they will give you the performance and efficiency that they were designed to deliver.

Products in this brochure contain R410A refrigerant. Please refer to installation instructions before installation or servicing of these products. Only licensed persons and companies qualified and experienced in the installation, service and repair of products containing refrigerants should be permitted to do so. The buyer must ensure that the person and/or company who is to install, service or repair the air conditioner has the necessary licences, qualifications and experience to perform the work. Suitable access for warranty and service is required. Refer to conditions of warranty on the Mitsubishi Electric website. For future improvement, specifications, designs of product and availability are subject to change without notice. Please check with your dealer.



Mitsubishi Electric Shizuoka Works acquired ISO9001 certification under Series 9000 of the International Standard Organization (ISO) based on a review of Quality warranties for the production of air conditioning equipment. The plant also acquired environmental management system standard ISO 14001 certification.



AUCKLAND

Unit 1, 4 Walls Road, Penrose PO Box 12726, Penrose, Auckland 1061 Phone (09) 526 9347, Fax (09) 526 9369

Black Diamond Technologies Ltd

WELLINGTON (HEAD OFFICE) 1 Parliament Street, Lower Hutt PO Box 30772, Lower Hutt 5040 Phone (04) 560 9147, Fax (04) 560 9133

Distributed by B D T

CHRISTCHURCH

44 Halwyn Drive, Hornby PO Box 16904, Hornby, Christchurch 8441 Phone (03) 341 2837, Fax (03) 341 2838

www.mitsubishi-electric.co.nz

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