

Read This First

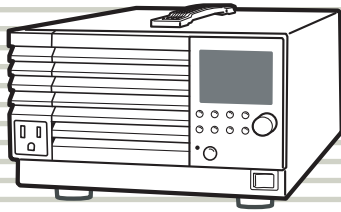
AC Power Supply PCR-M Series

PCR500M

PCR1000M

PCR2000M

PCR4000M



The PCR-M is a compact AC power supply that inherits the high quality and high performance features of the PCR-LA/W Series. The PCR-M can be readily used on the desktop or by the desk. It is equipped with the functionality and performance required of a test instrument for the design, development, and quality assurance of DC/DC converters for devices and onboard power supplies.

Features

The PCR-M Series is equipped with the following features.

- **Wide range of output voltage and frequency**

The output voltage and frequency can be set over a wide range. Nominal voltage of various countries (single-phase) can be supported. The PCR-M can be used to test power supplies that are to be placed on airplanes, ships, etc.

- **DC output**

DC output is possible. The DC voltage can be superimposed on the AC voltage if the optional interface board is used.

- **Compact and light**

The reduction in size and weight can be enabled by using a PWM inverter method. PCR500M is approximately 1/5th in volume and 1/4th in weight with respect to Kikusui's linear amplifier type AC power supplies.

- **Memory function**

Up to three presets can be stored. Presets can be recalled in the middle of the output operation to test drastic changes in voltage or frequency.

- **Measurement function**

Voltage, current, and power of AC and DC output can be monitored. The true rms value and average value (DC) of the output voltage as well as the true rms value, peak value, and average value (DC) of the output current can be displayed.

- **Maximum peak current**

A maximum peak current that is three times the maximum rated current (rms value) can be output to a capacitor-input rectifying load.

Checking the Package Contents

When you receive the product, check that all accessories are included and that the product and accessories have not been damaged during transportation. If any of the accessories are damaged or missing, contact your Kikusui agent or distributor. We recommend that all packing materials be saved, in case the product needs to be transported at a later date.

Accessories

for PCR500M (1 pc., Length: approx. 2.5 m)



Rated voltage: 125 Vac
PLUG: NEMA5-15
[85-10-0740]

Rated voltage: 250 Vac
PLUG: CEE7/7
[85-AA-0005]

Rated voltage: 250 Vac
PLUG: GB1002
[85-10-0790]

for PCR1000M (1 pc.)

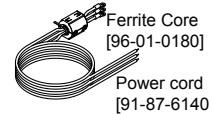


Length: approx. 3m
Nominal cross-sectional area: 3.5 mm²
[85-10-0630]

PLUG: NEMA5-15
Length: approx. 2.8m
Nominal cross-sectional area: 2 mm²
[85-10-0650]

This power cord with the plug can be used for the input voltage of 114 Vac to 125 Vac. It can not be used except for those specified range.

for PCR2000M
(1 set, Length: approx. 3 m,
Nominal cross-sectional area: 5.5 mm²)



Ferrite Core
[96-01-0180]

Power cord
[91-87-6140]

Power cord
The power cord that is provided varies depending on the destination for the product at the factory-shipment.

for PCR4000M
(1 set, Length: approx. 3 m
Nominal cross-sectional area: 14 mm²)



[91-87-6151]

Cable Tie
(Only PCR2000M) (1 pc.)
[P4-200-001]

Ferrite Core
(Only PCR2000M) (1 pc.)
[96-01-0180]

Heavy object warning label
If necessary, attach to the product.
(Only PCR4000M)

Read This First (1 pc.)

Quick Reference
English (1 pc.), Japanese (1 pc.)

Safety Information (1 pc.)

CD-ROM (1 pc.)

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WEBSITE

<http://www.kikusui.co.jp/en>

The newest version of the operation manual can be downloaded from Download service of Kikusui website.

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About the PCR-M Documentation

These manuals are intended for users of the PCR-M Series AC Power Supply and their instructors.

Explanations are given under the presumption that the reader has knowledge related to electric safety tests.

Adobe Reader 6.0 or later is required to view the PDF files.

An ePub reader is required to view the ePub files.

Microsoft Internet Explorer 6 or later is required to view the HTML files.

Every effort has been made to ensure the accuracy of this manual. However, if you have any questions or find any errors or omissions, please contact your Kikusui agent or distributor.

If you find any misplaced or missing pages in this manual, it will be replaced. If the manual gets lost or soiled, a new copy can be provided for a fee. To replace or purchase a manual, please contact your Kikusui agent or distributor. At that time, inform your agent or distributor of the "Part No." written on the front cover of this manual.

After you have finished reading this manual, store it so that you can use it for reference at any time.

- Tips -

How to view ePub files on a tablet

To view an ePub file on a tablet, an ePub reader (e.g., iBooks, Himawari Reader) must be installed in the tablet. You can download ePub readers for free.

There are several ways to copy ePub files to your tablet, but we recommend that you download them from the Kikusui Electronics Corporation website.

1. Using a browser on your tablet, visit Kikusui Electronics Corporation website's Operation Manual Database (<http://www.kikusui.co.jp/en/download/>), and search for your PCR-M series.



2. Tap the appropriate ePub file to download it.

When an ePub file is downloaded to your tablet, you can view it even when the tablet is not connected to the Web.

Contents of the Included CD-ROM

Put the included CD-ROM into the CD-ROM drive. In a few moments, a start window will appear. If the start window does not appear, open the CD-ROM folder in Windows Explorer, and then double-click index.html to display the start window.

■ Application software

This application Kikusui Easy Controller for PCR-M is an interactive virtual front panel program, which remote-controls your PCR-M.

The following programs are also installed automatically along with the software application.

PCR-M IVI-COM driver (includes sample programs)

IVI Shared Components

For details, see "ReleaseNote" in the accompanying CD-ROM.

■ KI-VISA

A VISA library is required to use the PCR-M IVI-COM and the software application. The VISA library (any one of NI-VISA, AgilentVISA, and KI-VISA) must be installed in the controller (Windows).

KI-VISA is Kikusui's original VISA library that supports VXIplug&play VISA Specifications. KI-VISA is not required if NI-VISA or Agilent VISA is already installed.

■ IVI-COM

An IVI-COM multi-environment instrument driver compliant with the IVI specifications.

■ Manual

Click the "See the Manual" to move to the Operation Manual page.

The PCR-M Series manual comprises the following documentation.

The PCR-M Series manual comprises the following documentation.

- Installation and Preparation
- Operation
- Specifications
- Appendix

Communication Interface Manual

This manual contains details about remote control.

Interface manual is written for readers with sufficient basic knowledge of how to control instruments using a personal computer.

Read This First (This manual)

This manual gives an overview of the product.

Quick Reference

The quick reference briefly explains the panel description and the basic operation of the product.

Safety information

This document contains general safety precautions for this product. Keep them in mind and make sure to observe them.

PCR-M Series models

The PCR-M Series generates single-phase output. The following models are available

Model	Rated output capacity	Maximum output current	
		100 V output	200 V output
PCR500M	500 VA	5 A	2.5 A
PCR1000M	1 kVA	10 A	5 A
PCR2000M	2 kVA	20 A	10 A
PCR4000M	4 kVA	40 A	20 A

Precautions for Installation

When installing this product, be sure to observe the precautions provided in "Precautions Concerning Installation Location" in the Safety information manual. Items specific to this product are given below.

- Avoid locations where the product is exposed to high temperature or direct sunlight.
Do not install the product near a heater or in areas subject to drastic temperature changes.
Operating temperature range: 0 °C to 40 °C (32 °F to 104 °F)
Storage temperature range: -10 °C to 60 °C (14 °F to 140 °F)
- Avoid humid environments.
Do not install the product in high-humidity locations--near a boiler, humidifier, or water supply.
Operating humidity range: 20 %rh to 80 %rh (no condensation)
Storage humidity range: 90 %rh or less (no condensation)
Condensation may occur even within the operating humidity range. In such cases, do not use the PCR-M until the condensation dries up completely.
- Do not use the product where ventilation is poor.
Secure adequate space around the product so that air can circulate around it.
Allow at least 20 cm of space between the air inlet/outlet and the wall (or obstacles).
- Do not use the foot on the side panel for standing the product in upright position.
It may cause injury to the operator or the damage to the product when it falls down.

Moving the product

When installing this product, be sure to observe the precautions provided in "Precautions Concerning Installation Location" in the Safety information manual. Items specific to this product are given below.

- Do not move the product by yourself. (PCR4000M only)
Be sure to have two or more people move the product. Exercise special care when carrying the product over a slope or across steps.
Hold the product from underneath.
Check the product's weight before you transport it. The weight is displayed in the bottom of the rear panel.
If you are using a forklift, be sure to slide the forks under the bottom of the product, check that the product is stable, and then raise the product.
If you are using a band or similar item to raise the product with a crane, be sure to slide the band under the bottom of the product, check that the product is stable, and then raise the product.

环境保护使用期限

Environment-friendly Use Period

该标记为适用于在中华人民共和国销售的电子信息产品的环境保护使用期限。

只要遵守有关该产品的安全及使用注意事项，从制造年月起计算，在该年度内，就不会对环境污染、人身、财产产生重大的影响。

产品的废弃请遵守有关规定。

产品的制造年月可以在以下网址中确认。

<http://www.kikusui.co.jp/pi/>

毒有害物质或元素名称及含有标示

Name of hazardous materials and symbol of element in the equipment and quantity

部件名称 Name of part	有毒有害物质或元素 Hazardous material and symbol of element					
	铅 Pb	汞 Hg	镉 Cd	六价铬 Cr(VI)	多溴联苯 PBB	多溴二苯醚 PBDE
印刷电路板组装机 Printed circuit board assemblies	×	○	×	×	○	○
内部接线 Internal wirings	×	○	×	×	○	○
外壳 Enclosure	×	○	○	○	○	○
底盘组装机 Chassis assembly	×	○	×	×	○	○
辅助设备 Accessories	○	○	○	○	○	○

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The specifications of this product and the contents of this manual are subject to change without prior notice.