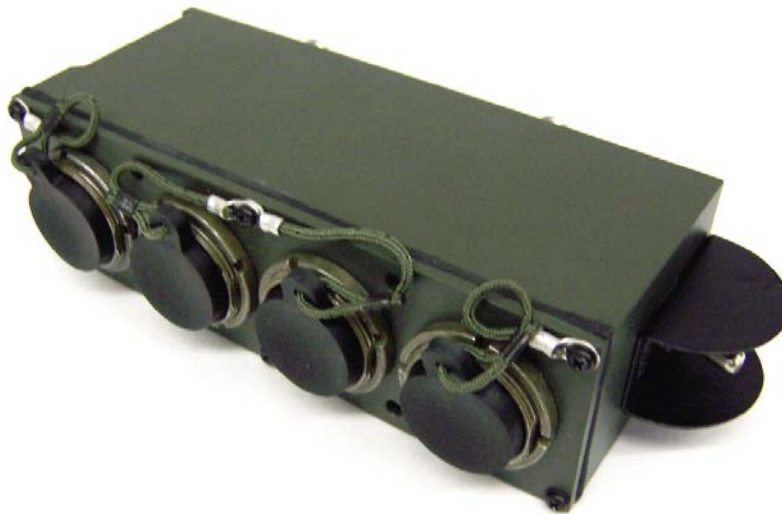


MRC-167

50 AMP DC POWER SUPPLY



Operation Manual

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Table of Contents

<i>Section</i>	<i><u>Chapter 1 Introduction</u></i>	<i>Page</i>
1.1	Scope	2
1.2	Introduction	2
1.3	Important Safety Instructions	2
1.4	Serviceable Parts and Repair	3
1.5	Physical Description	3
1.5.1	Physical Parameters	3
1.6	Equipment Provided	3
1.7	External Components	3
	 <i><u>Chapter 2 Operation</u></i>	
2.1	Operating Procedures	4
2.2	Start Up	4
2.3	Controls and Indicators	5
	 <i><u>Chapter 3 Maintenance</u></i>	
3.1	Preventative Maintenance	5
3.2	Dirt and Dust	5
3.3	Oils and Grease	5
3.4	Warranty Maintenance	6
3.5	Contact Information	6

Chapter 1 - General Information

1.1 Scope

This manual has been prepared by McDowell Research, an Ultralife Company for the purpose of providing the user information necessary to understand and maintain the MRC-167 50 Amp DC Power Supply.

- **Chapter 1 – General Information**
 - This chapter provides safety and important information about the MRC-167.
- **Chapter 2 – Operation**
 - This chapter provides information necessary for operating the MRC-167, and theory of operating procedures describing how the MRC-167 accomplishes its intended purpose.
- **Chapter 3 – Maintenance and Warranty Information**
 - This chapter provides information regarding MRC-167 preventive care and corrective maintenance procedures. The section also includes the statement of warranty, RMA process and contact information.

1.2 Introduction

- The MRC-167 is a self-contained power system is compatible with up to four other items of equipment depending on the current draw of the equipment.

1.3 Important Safety Instructions

- A. This manual contains important safety and operating instructions for the MRC-167 50 Amp DC Power Supply.
- B. Before using the MRC-167, read all instructions and cautionary markings on the Amplifier.
- C. Use of an attachment not recommended or sold by McDowell Research may result in risk of fire, electric shock, or personal injury.
- D. Make sure cords are positioned so that they will not be stepped on, tripped over, or otherwise subjected to damage or stress.
- E. Do not operate the system with damaged cable or connector - replace it immediately.

1.4 Serviceable Parts and Repair

The MRC-167 has **NO** user serviceable parts. Units requiring repair should be sent to a qualified service depot for repair or follow instructions in the maintenance chapter of this manual.

1.5 Physical Description

1.5.1 Parameters

- **Length:** 3.25 inches
- **Width:** 7.875 inches
- **Height:** 2 inches
- **Weight:** 2 lbs.

1.6 Equipment Provided

Equipment	Quantity
MRC-167 Operational Manual	1
MRC-167 50 Amp DC Power Supply	1

1.7 External Components

- 1 Switch
- 4 four socket output connectors
- 1 four pin input connector

Chapter 2 - Operation

2.1 Operating Procedures

The subsequent sections will list in chronological order how to operate the MRC-167 safely and efficiently.

2.2 Start Up

- Connect a power supply to the input of the MRC-167.
- Toggle the switch to the on position.
- The subsequent information outlines the pin-out of the connectors.
 - The 4 socket input connector pin-out is as follows.
 - C and A = Ground
 - D and B = +



Figure 1 Input Connector

- The 4 four socket output connector's pin-outs are as follows.
 - C and A = Ground
 - B and D = +

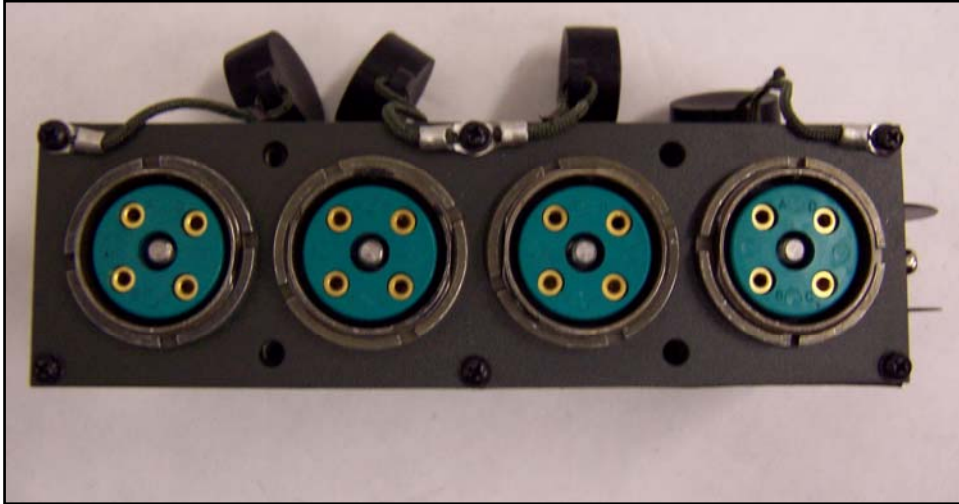


Figure 2 MRC-167 Four Socket Output Connectors

2.3 Controls and Indicators

- The MRC-167 has one switch that controls on or off status.
 - The switch is labeled to indicate the position of the on or off status.

Chapter 3 – Maintenance and Warranty Information

3.1 Preventative Maintenance

All maintenance procedures should be in the subsequent sections.

3.2 Dirt and Dust

All external components to the MRC-167 can be cleaned with a water dampened non-abrasive cloth and allowed to air dry or wipe dry with a clean dry non-abrasive cloth.

3.3 Oils and Grease

All external components of the MRC-167 can be cleaned with a mild soap/water solution dampened non-abrasive cloth. Rinse with water dampened non-abrasive cloth and allowed to

3.4 Warranty Information:

Warranty Statement

**4 years for equipment shipped after May 1, 2004
3 years for equipment shipped prior to May 1, 2004**

McDowell Research warrants to its customers that the products it manufactures and sells will be free from defects in materials and workmanship for a period of four (4) years for equipment shipped after May 1, 2004.

This warranty shall not apply to any defect, failure or damage caused by improper use or inadequate maintenance and care. McDowell shall not be obligated to provide service under this warranty to repair, service, or modify these products.

In order to obtain service under this warranty, customers must return a failed unit to McDowell with a description of the failure, contact information (in case questions arise and to speed up processing of guarantee claims) and finally a return shipping address. McDowell will return any failed unit at McDowell's cost.

NOTE: THIS WARRANTY DOES NOT APPLY TO BATTERIES SUPPLIED BY MCDOWELL RESEARCH. ALL BATTERIES SUPPLIED BY MCDOWELL RESEARCH ARE WARRANTIED FOR 90 DAYS FROM SHIPMENT.

3.5 Contact Information:

Please call (254) 752-1411 to obtain an RMA number prior to returning any failed unit(s) to:

**McDowell Research, an Ultralife Company
300 South 8th Street
Waco, Texas 76701
Phone: (254) 752-1411
Fax: (254) 752-1812**

**Online RMA requests can be located and submitted at:
<http://www.mcdowellresearch.com/shop/RMArequest.asp> or
service@mcdowellresearch.com**

Description of Change	Revision	Date
Initial release	A	04-27-2006