AEC-VPMS-200

Power Management Kit

for BOXER Series

DC 12V Input and Output

AEC-VPMS-200 Manual 2nd Ed June 2008

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Packing List

Before you begin installing your card, please make sure that the following materials have been shipped:

- 1 AEC-VPMS-200
- 1 Power Cord to Controller
- 1 Power Cord to Battery
- 1 Power Cord to ACC
- 1 CD-ROM for manual (in PDF format)

If any of these items should be missing or damaged, please contact your distributor or sales representative immediately.

Attention

- 1. This vehicle use POWER MANAGEMENT UNIT has the function of detecting input voltage automatically
- 2. If the POWER MANAGEMENT UNIT cannot be turned on, please check the situations below:
 - check if the vehicle starts.
 - check if the battery voltage is too low.
 - check if the connector part for wiring is abnormal. If all parts is normal, please hand it over to AAEON dealer to solve the problem.
- 3. The POWER MANAGEMENT UNIT activates the function of low voltage protection and it will stop the output.
- 4. If the POWER MANAGEMENT UNIT has fume, please disconnect the connectors to the charger and battery immediately, and contact with AAEON responsible sales to solve the problem.
- 5. The unit is intended to install in a temperature-controlled, indoor area free of conductive contaminants.
- 6. A battery can present a risk of electric shock and high short circuit current. The following precaution should be observed when working on batteries:
 - Remove watches, rings or other metal objects
 - Use tools with insulated handles
 - Wear rubber gloves and boots
 - Do not lay tools or metal parts on the tope of batteries
 - Disconnect charging source prior to connect or disconnect battery terminals
- 7. If you find outer covering of the POWER MANAGEMENT

UNIT has unusual high-temperature phenomenon, please hand it over to the dealer.

8. If there is any questions, please contact with AAEON dealer or service center.

Procedures of turning on the POWER MANAGEMENT UNIT:

- First of all, connecting the recharged connector of the POWER MANAGEMENT UNIT to charger in vehicle.
- Connecting battery connector of the POWER MANAGEMENT UNIT to vehicle battery, and the POWER MANAGEMENT UNIT will be turned on automatically.
- The POWER MANAGEMENT UNIT begins to output voltage and LED indicators will be illuminated in green 10 seconds later.

<u>Note</u>: the delay time of output voltage is adjustable and the default is 10 seconds.

 If the green LED of the POWER MANAGEMENT UNIT does not illuminated in 10 seconds, it means that the POWER MANAGEMENT UNIT works abnormally. Please refer to the bullet 2 of Attention for troubleshooting.

Function explanation:

 Before you start up the POWER MANAGEMENT UNIT, you have to connect the vehicle battery and generator first. Make sure all cables have been connected properly. The POWER MANAGEMENT UNIT will be turned on automatically and output $12V \pm 3V$ voltage.

- Green LED illuminated steady and it means the POWER MANAGEMENT UNIT operates normally. If the green LED flashes, it shows the POWER MANAGEMENT UNIT is in battery supply mode.
- If the loading exceeds 133% of nominal value for 3 seconds, the overload protection will be activated to stop output.

Safety & Warranty

- 1. Read these safety instructions carefully.
- 2. Keep this user's manual for later reference.
- Disconnect this equipment from any AC outlet before cleaning. Do not use liquid or spray detergents for cleaning. Use a damp cloth.
- 4. For pluggable equipment, the power outlet must be installed near the equipment and must be easily accessible.
- 5. Keep this equipment away from humidity.
- Put this equipment on a reliable surface during installation.
 Dropping it or letting it fall could cause damage.
- The openings on the enclosure are for air convection. Protect the equipment from overheating. DO NOT COVER THE OPENINGS.
- Make sure the voltage of the power source is correct before connecting the equipment to the power outlet.
- Position the power cord so that people cannot step on it. Do not place anything over the power cord.
- 10. All cautions and warnings on the equipment should be noted.
- If the equipment is not used for a long time, disconnect it from the power source to avoid damage by transient over-voltage.
- 12. Never pour any liquid into an opening. This could cause fire or electrical shock.
- 13. Never open the equipment. For safety reasons, only qualified

service personnel should open the equipment.

- 14. If any of the following situations arises, get the equipment checked by service personnel:
 - The power cord or plug is damaged.
 - Liquid has penetrated into the equipment.
 - The equipment has been exposed to moisture.
 - The equipment does not work well, or you cannot get it to work according to the users manual.
 - The equipment has been dropped and damaged.
 - The equipment has obvious signs of breakage.
- DO NOT LEAVE THIS EQUIPMENT IN AN ENVIRONMENT WHERE THE STORAGE TEMPERATURE IS BELOW -20° C (-4°F) OR ABOVE 60° C (140° F). IT MAY DAMAGE THE EQUIPMENT.

FCC



This device complies with Part 15 FCC Rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received including interference that may cause undesired operation.

Caution:

It may cause danger of explosion if battery is incorrectly replaced. Replace only with the same or equivalent type recommended by the manufacturer. Dispose of used batteries according to the manufacturer's instructions.

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Below Table for China RoHS Requirements 产品中有毒有害物质或元素名称及含量

AAEON Boxer/ Industrial System

	有毒有害物质或元素					
部件名称	铅	汞	镉	六价铬	多溴联苯	多溴二苯醚
	(Pb)	(Hg)	(Cd)	(Cr(VI))	(PBB)	(PBDE)
印刷电路板	×	0	0	0	0	0
及其电子组件	^	0	0	0	0	0
外部信号	×	0	0	0	0	0
连接器及线材	~	0	0	0	0	0
外壳	×	0	0	0	0	0
中央处理器	×	0	0	0	0	0
与内存	~	0	0	0	0	0
硬盘	×	0	0	0	0	0
电源	×	0	0	0	0	0
O: 表示该有毒有害物质在该部件所有均质材料中的含量均在						

O: 表示该有每有害物质在该部件所有均质材料中的含重均。 SJ/T 11363-2006 标准规定的限量要求以下。

X:表示该有毒有害物质至少在该部件的某一均质材料中的含量超出 SJ/T 11363-2006 标准规定的限量要求。

备注:

一、此产品所标示之环保使用期限,系指在一般正常使用状况下。

二、上述部件物质中央处理器、内存、硬盘、电源为选购品。

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Chapter

General Information

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1.1 Introduction

AEC-VPMS-200 is an intelligent 12V DC Vehicle Power Management Unit designed for car, boat, and electric cart, etc applications such as mobile DVR. It will prevent system damage from power surges and eliminate battery drain AEC-VPMS-200 provides the following features:

- Input Range 12V DC
- 12V DC outputs for 72W (12V/8A; Input 12V DC)
- Low Battery Protection (Battery Voltage under 83% (DC 10V) of output)

Delay On/Off Time setting (1sec – 30 mins, Adjustable by on-board jumper)

1.3 Specifications

System

•	Watt	72W
•	Input Voltage	DC 12V

Mechanical and Environmental

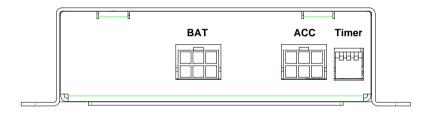
•	Construction	Aluminum Alloy Chassis
•	Color	Black
•	Mounting	Wallmount (Default)
•	Dimension	5.24"(W) x 4.07"(L) x
		1.38"(H) (133mm x 103.4mm x
		34mm)
•	Net weight	0.374 lb (170g)
•	Gross weight	1.1 lb (500g)
•	Operating Temperature	5°F~140°F (-15℃~60℃)
•	Operating Humidity	5~90%@40°C, non-condensing
•	EMC	CE/FCC Class A

1.4 I/O

Front



Back

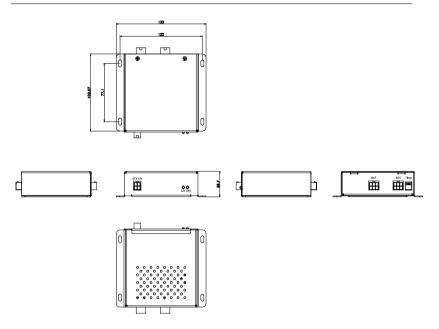




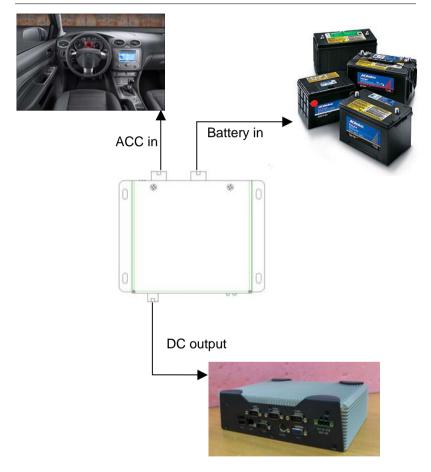
Quick Installation Guide

Chapter 2 Quick Installation Guide 2-1

2.1 Dimension



2.2 System Connection Diagram



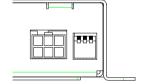
2.3 Delay Timer Setting

Never

Never

5 mins

5 min



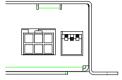
10 mins

10 min



20 mins

20 min



30 mins



30 min