DSC PC5204 Power Series Security System Installation Guide

Contents

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PC5204 v2.0 Installation Instructions

Power Supply / Four High Current Outputs Module

The PC5204 can be used to provide up to 1.0A of additional current and can be used to add up to four high current programmable outputs to the compatible DSC Alarm Controllers, models PC5010, PC5015, PC5020, PC1864, PC1832 and PC1616. This Installation sheet shall be used in conjunction with the Installation Manual of the DSC equipment to which PC5204 is connected or powered from (e.g. alarm controller, power supply, etc.).

General
This product meets the requirements of Class 11, Grade 2 equipment as per EN50131-1:1997 and prEN50131-1:2004 Standards.

Specifications

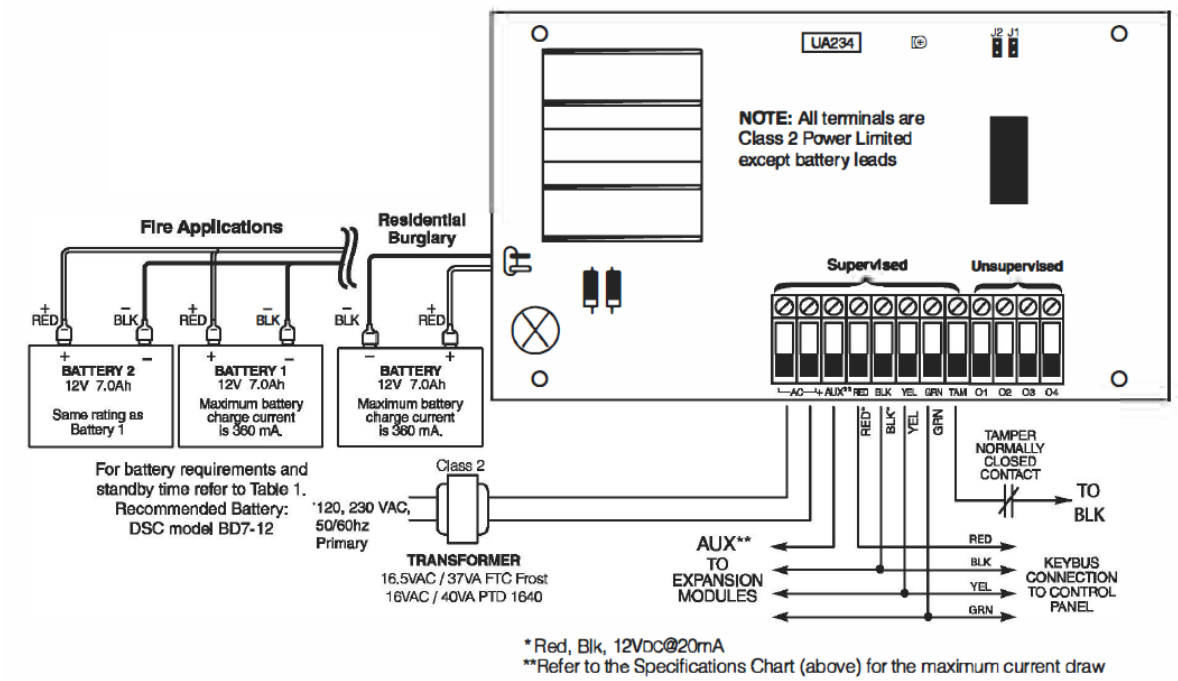
- Power Supply Type A as per EN50131-6 Standard
- **Temperature range:** -1 OC to + 50(
- **Relative Humidity:** 93% non condensing
- **Input ratings:** 220V-240Vac, 50/60Hz, 200mA
- Transformer required, mounted in the same enclosure and permanently connected
- **Transformer secondary ratings:** l 6.5Vac, 40VA min
- **Board current draw:** 20mA (set and unset state)
- **Board dimensions:** 145 mm x 83 mm
- **AUX output ratings:** l 2Voc, -15%/ + 10% when Input voltage is between 85% to 110% of rated value and output current is between O.OA – l .OA max.
- Resettable fuse (PT() used on circuit board instead of replaceable fuses
- **Output ripple voltage:** 600mVp-p max
- No Overvoltage protection devices required on the outputs
- **Storage device:** rechargeable battery, rated l 2VDC. Replace battery every 3-5 years
- **Battery capacity:** 4Ah, 7Ah or 14Ah (2 x 7Ah) max.
- Maximum standby time 24h (when using 14Ah battery capacity and AUX current limited to 480mA max. Refer to table below.
- **Recharging time:** less than 72 hours
- low battery trouble indication threshold l l .5VDC
- Battery deep discharge protection (cut-off at 9.SVoc)
- Supervision for loss of primary power source (AC Fail) battery fail or battery low voltage (Battery Trouble) with indication provided on the keypad

Table 1	Residential		Commercial	
PC5204 Current Draw 20mA	Burglary	Fire	Burglary	Fire*
Max. Aux Current Draw @12VDC	1A	550mA	1A	550mA
Transformer Requirements	16V, 40VA	16V, 40VA	16V, 40VA	16.5V, 37VA
Battery Requirements	7Ah min	14Ah min (2x7Ah)	7Ah min	14Ah min (2x7Ah)
UL Listed Enclosures	PC500C	PC5003C (Household Fire & Burglary)	CMC-1 PC4050CAR	PC4050CR, PC4050CRAR (Commercial fire & burglary)
Standby Time (min.)	4 hours	24 hours	4 hours	24 hours

*To be used with the PC5020CF only.

Terminal Descriptions

NOTE: Devices that require power from the PC5204 shall § be UL Listed for the intended application and operate over .

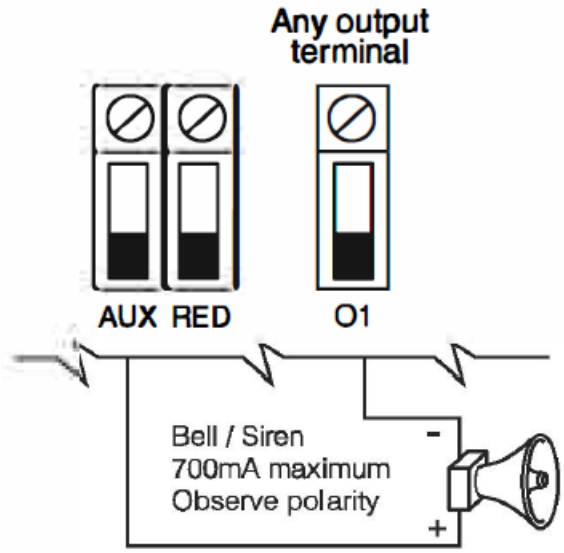


- **AC** – Supervised, the PC5204 requires a 16.5V/37VA or 16V/40VA transformer. Connect the primary of the transformer to an unswitched AC source (maximum current draw is 0.5A) and connect the secondary of the transformer (US market only) to these terminals.
- **AUX+** – This terminal is used to provide power for devices & modules. Please refer to Table 1 for maximum ratings.

  Connect the positive lead of powered devices to AUX and the negative to the proper output terminal (01 to 04).
- **TAM** – This can be used to tamper the cabinet in which the PC5204 is mounted. Connect a normally closed (NC) switch across TAM and BLK. If the tamper is not being used connect a piece of wire across TAM and BLK to remove the trouble condition.
- **Keybus-** The 4-wire Keybus connection is used by the panel to communicate with the module. Connect the RED, BLK, YEL & GRN terminals to the RED, BLK, YEL & GRN Keybus terminals on the PCSOXO control panel.

- **01 to 04** – Wire the positive lead of the device to the AUX terminal and the negative lead to the required output terminal 01 to 04).

IMPORTANT NOTE: Output 01 is supervised in the same manner as the Bell Output of the PCSOXO. If 01 is not used, if no continuous load is connected, or if a siren is connected, a 1 OOOW resistor, DSC model EOLR-1 must be connected in order to prevent the indication of a trouble condition. This diagram is an example of how to wire various devices to the outputs.



NOTE: The PC5204 is not suitable for fire alarm annunciation.

Enclosures

The PC5204 can be installed in the metal enclosures listed below. Tamper protection switches can be installed on all enclosures, including door opening protection and/or removal from the mounting position. Doors can be secured using screws or keylock. PC5204 may be installed within the same metallic cabinet as the alarm controller/power supply (model Power UC1, PC5003C) or in a separate enclosure (model PC4003C). Internal and/or external wiring for this module shall be routed, supported, clamped or secured in a manner that reduces the likelihood of:

- excessive strain on wire and on terminal connections,
- loosening of terminal connections and damage of conductor insulation
- Model PC5003C (removable door) made of 22Ga steel, painted, dimensions: 248mm(L) x 298mm(W) x 76mm(H), weight: 1500g.
- Model PC5003C (hinged door) made of 1.2mm thick steel, painted,
- Model Power UC 1 made of 18Ga steel, painted, dimensions: 31 Smm(L) x 319mm(W) x 1 OOmm(H), weight: 3150g. Model PC4003C made of 18Ga steel, painted, dimensions: 230mm(L) x 180mm(W) x 75mm(D), weight 1050g.

LIMITED WARRANTY

Digital Security Controls warrants that for a period of twelve months from the date of purchase, the product shall be free of defects in materials and workmanship under normal use and that in fulfilment of any breach of such warranty, Digital Security Controls shall, at its option, repair or replace the defective equipment upon return of the equipment to its factory. This warranty applies only to defects in parts and workmanship and not to damage incurred in shipping or handling, or damage due to causes beyond the control of Digital Security Controls such as

lightning, excessive voltage, mechanical shock, water damage, or damage arising out of abuse, alteration or improper application of the equipment. The foregoing warranty shall apply only to the original buyer, and is and shall be in lieu of any and all other warranties, whether expressed or implied and of all other obligations or liabilities on the part of Digital Security Controls. This warranty contains the entire warranty. Digital Security Controls neither assumes responsibility for, nor authorizes any other person purporting to act on its behalf to modify or to change this warranty, nor to assume for it any other warranty or liability concerning this product. In no event shall Digital Security Controls be liable for any direct or indirect or consequential damages, loss of anticipated profits, loss of time or any other losses incurred by the buyer in connection with the purchase, installation or operation or failure of this product.

Warning: Digital Security Controls recommends that the entire system be completely tested on a regular basis. However, despite frequent testing, and due to, but not limited to, criminal tampering or electrical disruption, it is possible for this product to fail to perform as expected.

FCC COMPLIANCE STATEMENT

CAUTION: Changes or modifications not expressly approved by Digital Security Controls could void your authority to use this equipment. This equipment generates and uses radio frequency energy and if not installed and used properly, in strict accordance with the manufacturer's instructions, may cause interference to radio and television reception. It has been type tested and found to comply with the limits for Class B device in accordance with the specifications in Subpart "B" of Part 15 of FCC Rules, which are designed to provide reasonable protection against such interference in any residential installation. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause interference to television or radio reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Re-orient the receiving antenna
- Relocate the alarm control with respect to the receiver
- Move the alarm control away from the receiver
- Connect the alarm control into a different outlet so that alarm control and receiver are on different circuits.

If necessary, the user should consult the dealer or an experienced radio/television technician for additional suggestions. The user may find the following booklet prepared by the FCC useful: "How to Identify and Resolve Radio/Television Interference Problems". This booklet is available from the U.S. Government Printing Office, Washington D.C. 20402, Stock# 004-000-00345-4.

Printed in Canada 2006 Digital Security Controls Toronto, Canada • www.dsc.com Tech. Support: 1-800-387-3630 (Canada & U.S.), 905-760-30

Documents / Resources

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