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# Product Notice

# PN Number 69

## Updates to the AIM104-CAN schematic

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| **Issue Date:** | 6-Jan-05 | **Circulation:** | General |
| **PCB Version:** | 2 | **Schematic Version:** | 2 |
| **PCB Issue:** | 1 | **Schematic Issue:** | 1 |

Some time ago the schematic for the AIM104-CAN was updated to version 2 issue 1 to offer some additional features. This version of the board is now standard. The following describes the changes made and how they should be used.

**1.** A 16bit connector was added to the board to allow use of the upper set of interrupts. IRQ's 10,11,12 and 15 are now additionally available. Fundamentally the board still operates as an 8bit peripheral.

**2.** Two links (LK6 & 7) were added to allow local powering of the CAN bus transceiver. This effectively bypasses the isolation but some customers found having to provide external power more of an inconvenience than the lack of isolation.

When LK6 and LK7 are in the **A** position, the CAN transceiver on the AIM104-CAN board is optically isolated from the PC/104 power supply. In this mode, it requires external power (PL2 V-/V+ from 9-27v).
When both links are in the **B** position, the transceiver is powered directly from the PC/104 bus (Non isolated mode). In this mode, you need to ensure that you have +/-12v supplies on your PC/104 interface.

**N.B**. LK6 is the +5V and LK7 is the ground connection and *both* must be in position A or position B.

We would recommend not using the non-isolated mode or only using it under the condition that all CAN nodes are operating in LAB conditions and there are no a ground loops or voltage drops between power supplies. In this case all connected nodes should be turned on/off simultaneously. You may have to experiment with disconnecting the CAN screen (ground connection) to avoid introducing a ground loop, since a ground connection will be created via the PC/104 power supply when the transceiver is powered locally.

If you have any questions about this or about any of our products please contact Eurotech Ltd Technical Support.

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