PCAN-MicroMod FD Digital 1 & 2 (IPEH-003083 / IPEH-003084) – Detailed Data Sheet

Product Description

The PCAN-MicroMod FD plug-in board can be used with ready-to-use motherboards designed for specific peripheral requirements. The motherboards PCAN-MicroMod FD Digital 1 and Digital 2 emphasize digital inputs and outputs equipped with protective circuitry. Digital 1 features low-side switches for outputs, while Digital 2 features high-side switches. Configuration is managed through free Windows software, enabling mapping of I/Os to CAN IDs and use of function blocks for data processing. Once configured, the module operates as an autonomous CAN node. Optional firmware supports CANopen (FD), or custom firmware can be developed. Licenses for CANopen firmware are provided by Embedded Systems Academy.

Technical Specifications

Feature	Specification
Base Module	PCAN-MicroMod FD with motherboard in aluminum casing
CAN Connection	High-speed CAN (ISO 11898-2), compliant with CAN 2.0 A/B and CAN FD
CAN FD Bit Rates	20 kbit/s up to 10 Mbit/s (64-byte data field)
Classic CAN Bit Rates	20 kbit/s up to 1 Mbit/s
CAN Termination	Switchable
Digital Inputs	8, configurable pull-up or pull-down

Digital Outputs	8, Digital 1: Low-side switches, Digital 2: High-side switches
PWM Mode	16-bit resolution, adjustable frequency up to 20 kHz
Analog Inputs	3 channels, 12-bit resolution, 0–10 V range
Frequency Outputs	2 channels, low-side switches, 0–20 kHz adjustable
Analog Input for Voltage Monitoring	1 channel up to 30 V, 12-bit resolution
Rotary Coding Switch	4-bit, for module ID setting
LED Indicators	3 status LEDs
Operating Voltage	8 to 30 V
Operating Temperature	-40 to +85 °C (-40 to +185 °F)
Casing	Aluminum with spring terminal connectors

Scope of Supply

• PCAN-MicroMod FD plug-in board

• PCAN-MicroMod FD motherboard in aluminum casing with mating connectors

• PCAN-MicroMod FD Configuration software for Windows

• Windows development package with GCC ARM Embedded, flash program, and examples

• PDF manual

Requirements

• PEAK CAN interface required for configuration

Ordering Information

• PCAN-MicroMod FD Digital 1 – Part No.: IPEH-003083

• PCAN-MicroMod FD Digital 2 – Part No.: IPEH-003084