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G6PWM

Datasheet 1.1

Pulse Width Modulation 6 channels generator

Technical features

- 6 analog inputs ±10V 1% fully protected.
- 6 TTL digital outputs up to 10KHz.
- 6 analog outputs with programmable voltage (5 to 20V).
- 6 open collector outputs.
- AC/12V/USB or battery power mode.
- Active protection against short circuit.
- LCD display.
- Analog or digital control.
- Software configuration and management provided.
- Low power consumption.
- Output frequency accuracy on any channel: 1μs.

Description

G6PWM (Generator 6 Pulse Wide Modulation channels) is designed to generate and read back control pulse width modulation signals. The device can be fully controlled and configured by software and is able to drive 6 independent channels.
The open collector output channels can generate and read back PWM signal simultaneously. The open collector resistor is complemented with a programmable pull-up resistor. Analog inputs can be used to independently control PWM output signals.

Electrical features

BNC input :   Analog 0-10V.
                               Input impedance : 10KΩ.

BNC output :   TTL up to 10Khz.
                               Open drain up to 10Khz.
                               Programmable analog output 5-20V up to 10Khz

Power supply :   12V battery (from 10V to 24V) /AC Power/USB power/Battery (standalone)
                               Consumption 5W.

Miscellaneous

Display :   LCD 4*20 rows with backlight
Navigation control :   7 navigation buttons
Software control :   USB 2.0 B type

Size :   260 x 200 x 105 mm.
Weight: 2 Kg.
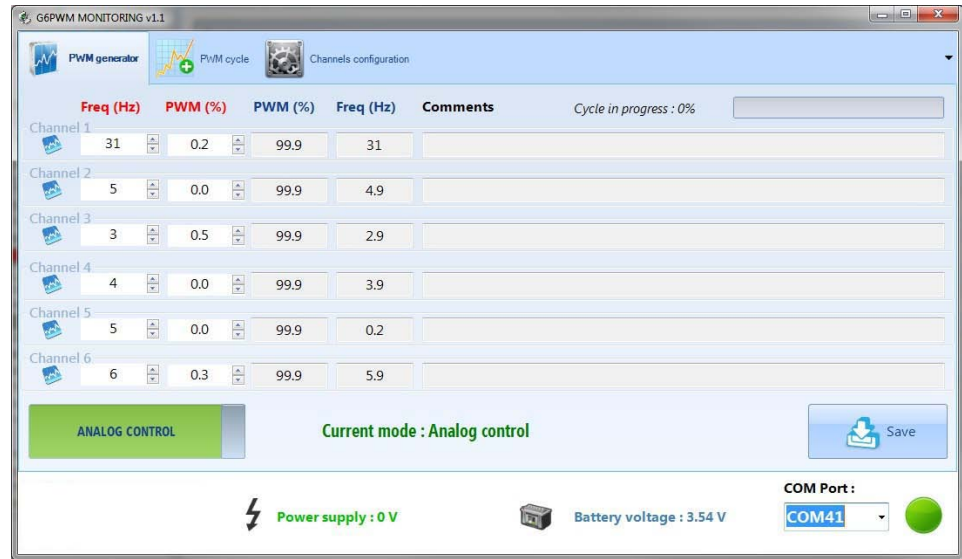Boîtier :   Anodized aluminum, IP40, Class I device.

Menu		
PWM Generation (1/6)	PWM1 to PWM6	00.0 % to 100%
PWM Measurement (2/6)	PWM1 to PWM6	00.0 % to 100%
PWM Frequencies (3/6)	FREQ1 to FREQ6	1 Hz à 9999 Hz
PWM Voltage (4/6)	PWM1 to PWM6	5V to 20V
PULL-UP on PWM (5/6)	Channel1 to Channel6	ON or OFF
System info (6/6)	PWM control	Digital or analog
	On board battery level	Typically from 2.5V to 4.2 V
	External voltage	7V to 15V

Scrolling Menu description

G6PWM Software

- **Control mode** : digital or analog
- **PWM frequency** and **duty cycle** in digital mode.
- **PWM cycle generation**
- **Channels configuration**
- **Load a saved configuration**
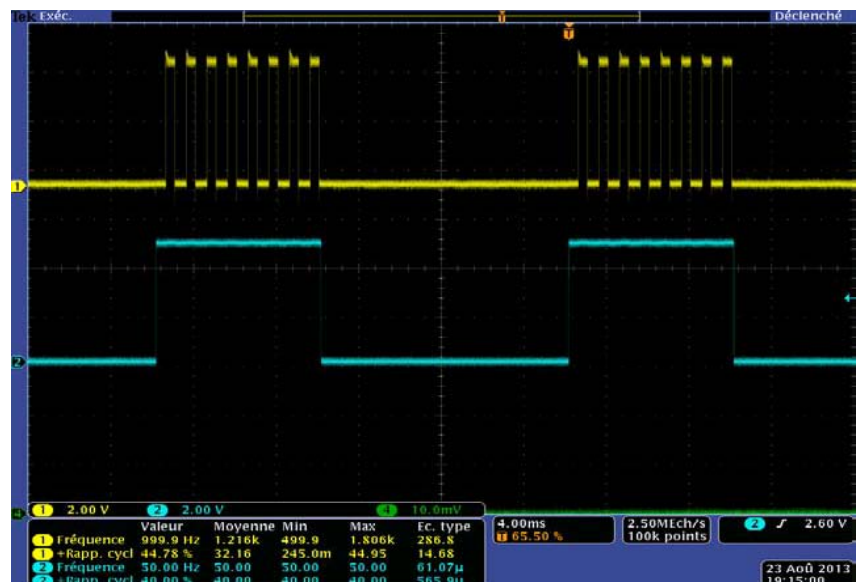- **Association of a comment to a PWM measured value**

G6PWM Capability

-**PWM Generation** with parametrable duty cycle and frequency 0.0 % to 100.0 % in step of 0.1% with a frequency range : from 0 Hz to 10 Khz in step of 1 Hz.
-**Read back PWM** value on the same channel with a precision of 1 µs.

Blue curve : PWM generation
Yellow curve : PWM read back value

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