Ond

UnoLib documentation

analog.pas

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The analog.pas module contains low-level constants and routines for the analog-digital converter (AD) and PWM wave modulation.

Routines

procedure AnalogReference(const aMode: UInt8);

Sets the reference voltage for analog input.

Parameters

a Mode: can be one of DEFAULT, INTERNAL or EXTERNAL, which mean as follows:

EXTERNAL - voltage applied to AREF pin,

DEFAULT - default reference voltage (5V),

INTERNAL - internal reference voltage (1.1V).

function AnalogRead(aPin: UInt8): integer;

Reads the value from an analog pin using analog-digital (AD) converter. Return value represents 10-bit number (in range 0..1023).

Parameters

aPin - number of analog pin. It can be one of following constants: A0, A1, A2, A3, A4, A5.

Note: Add definitions of constants A0-A5.

procedure AnalogWrite(const aPin: UInt8; aVal: integer);

Generates a digital signal with a variable duty cycle (PWM) on selected digital pins. This allows for simulating an analog signal, allowing for the adjustment of e.g. LED brightness, DC motor speed, or servo position.

Parameters

aPin - number of digital pin. It can be one of following: 3, 5, 6, 9, 10, 11 (marked on the board with \sim sign).

aVal – value, normally in range 0 to 255.