Color 12 Click

PID: MIKROE-5724

Color 12 Click is a compact add-on board providing an accurate color-sensing solution. This board features the BU27006MUC-Z, a digital color sensor from Rohm Semiconductor with an integrated flicker sensing function. The BU27006MUC-Z can sense Red, Green, Blue (RGB), and Infrared light and efficiently convert them into digital values via the I2C interface. Its remarkable high sensitivity, wide dynamic range, and exceptional IR-cut characteristics enable precise illuminance measurement, typically up to 50klx, and accurate ambient light color temperature determination. Moreover, this sensor can effectively detect flicker noise originating from displays and room lighting, with a typical sensitivity of 10klx. This Click board™ is suitable for residential and commercial lighting management, contrast enhancement, detection of ambient for backlight control, and more.

Color 12 Click is supported by a mikroSDK compliant library, which includes functions that simplify software development. This Click board™ comes as a fully tested product, ready to be used on a system equipped with the mikroBUS™ socket.

Specifications

Type	Optical
Applications	Can be used for residential and commercial lighting management, contrast enhancement, detection of ambient for backlight control, and more
On-board modules	BU27006MUC-Z - advanced digital color sensor from Rohm Semiconductor
Key Features	Senses RGB/IR, integrated flicker detection, built-in IR-cut filter, rejecting light noise for color sensning, I2C serial interface, vast detection rage, low power consumption, and more
Interface	I2C
Compatibility	mikroBUS
Click board size	S (28.6 x 25.4 mm)
Input Voltage	3.3V

Resources

mikroBUS™

mikroSDK

Click board™ Catalog

Click boards™

Downloads

Color 12 click example on Libstock

Color 12 click schematic

Color 12 click 2D and 3D files

BU27006MUC-Z datasheet