



Electronic Current Detector - ECD

High precision Electronic Current Detector with two preset current detection levels (range from 0A to 5A), which works in the temperature range from -40°C to $+85^{\circ}\text{C}$. Optocoupler outputs are provided to give the information about the level of the detected current. The outputs can be set to the same current level (for example, $< 60\%$ and $< 60\%$ of nominal current), or to the two different current levels (for example, $< 80\%$ and $< 60\%$ of nominal current). Various levels of detection can be preset in the working range from 0A to 5A.

Typical application: Replacement for a conventional current detection relay.

Main Technical Characteristics:

- Current detection range for the adjustments: (0A – 5A);
 - Typical nominal currents: (0.5A; 1A; 1.67A; 2A);
- Two preset current detection levels, on request;
 - Typical levels are: 80% and 60% of nominal current.
- Both current detection levels in the detection range (0A – 5A) can be adjusted to the same current level, or to two different current levels,
- The independent optocoupler outputs are provided to give the information about the detected current. In general, the optocouplers are conductive (closed contacts) when the detected current is above the preset detection level and they are not conductive (open contacts) when detected current drops below the preset detection level;
- Accuracy of the preset detection levels is 1%.
- Temperature range: -40°C to $+85^{\circ}\text{C}$;
- Temperature stability of the preset detection levels, in complete temperature working range, is 2.5 %.
- Hysteresis for the current detection levels can be preset on request. Typical value is 10 mA.
- Power supply: 24V DC (+10%, -15%);
- Power consumption: 10 mW;
- Size of the box: W=35mm; H=86mm; D=57mm;
- Protection: IP 20.
- Connectors: 2 x 5 pin, 2.5 mm.
- Placement: DIN rail (EN50022);
- References: Used for the level crossing protection systems:
 - ELC (Signalling & Control) and
 - LCLC DL2000 (Siemens);
- Warranty: 2 years;
- Delivery time: 30 days;
- Price: on request.



Figure 1. ECD