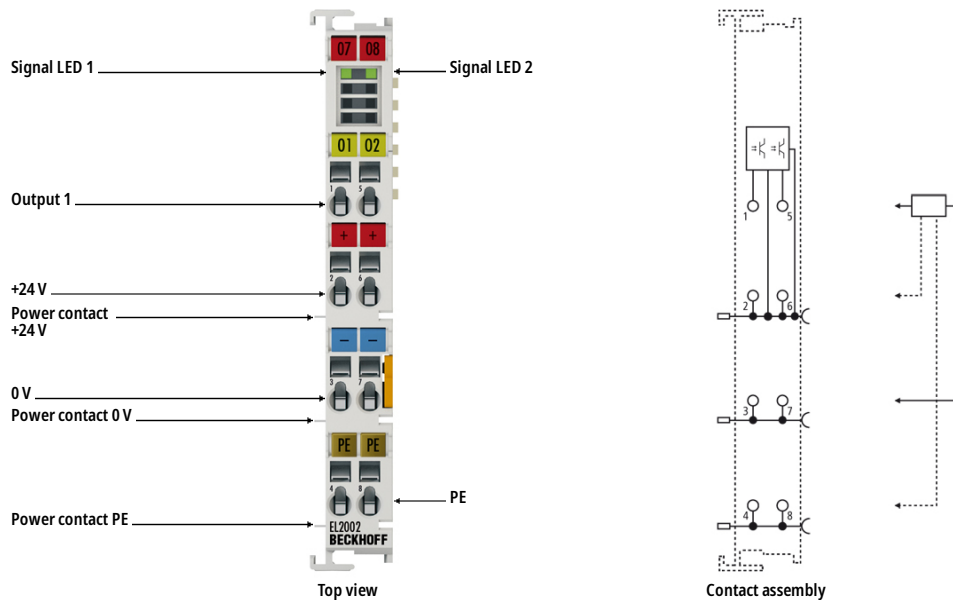


# EL2002 | EtherCAT Terminal, 2-channel digital output, 24 V DC, 0.5 A



**i Product status:** Regular delivery

The EL2002 digital output terminal connects the binary 24 V DC control signals from the automation device on to the actuators at the process level with electrical isolation. Each EtherCAT Terminal has two channels that indicate their signal state via light emitting diodes.

Special features:

- Connection of different load types possible (ohmic, inductive, lamp load)
- Max. output current 0.5 A per channel
- Short-circuit-proof outputs and reverse polarity protection

## Product information

### Technical Data

| Technical data        | EL2002, ES2002                          |
|-----------------------|---|
| Connection technology | 4-wire                                  |
| Number of outputs     | 2                                       |
| Nominal voltage       | 24 V DC (-15 %/+20 %)                   |
| Load type             | ohmic, inductive, lamp load             |
| Distributed clocks    | –                                       |
| Max. output current   | 0.5 A (short-circuit proof) per channel |

|                                    |  |
|------------------------------------|--|
| Reverse voltage protection         | yes                                    |
| Breaking energy                    | < 150 mJ/channel                       |
| Switching times                    | typ. TON: 60 µs, typ. TOFF: 300 µs     |
| Current consumption E-bus          | typ. 100 mA                            |
| Electrical isolation               | 500 V (E-bus/field potential)          |
| Current consumption power contacts | typ. 15 mA + load                      |
| Bit width in the process image     | 2 outputs                              |
| Configuration                      | no address or configuration setting    |
| Weight                             | approx. 55 g                           |
| Operating/storage temperature      | -25...+60 °C/-40...+85 °C              |
| Relative humidity                  | 95 %, no condensation                  |
| Vibration/shock resistance         | conforms to EN 60068-2-6/EN 60068-2-27 |
| EMC immunity/emission              | conforms to EN 61000-6-2/EN 61000-6-4  |
| Protect. rating/installation pos.  | IP20/variable                          |
| Pluggable wiring                   | for all ESxxxx terminals               |
| Approvals/markings                 | CE, UL, ATEX, DNV GL                   |
| Ex marking                         | II 3 G Ex nA IIC T4 Gc                 |

| Housing data                      | EL-12-8pin  | ES-12-8pin  |
|-----------------------------------|---|---|
| Design form                       | compact terminal housing with signal LEDs   | terminal housing with pluggable wiring level  |
| Material                          | polycarbonate   |   |
| Dimensions (W x H x D)            | 12 mm x 100 mm x 68 mm  |   |
| Installation                      | on 35 mm DIN rail, conforming to EN 60715 with lock   |   |
| Side by side mounting by means of | double slot and key connection  |   |
| Marking                           | labeling of the BZxxx series  |   |
| Wiring                            | solid conductor (e), flexible conductor (f) and ferrule (a): spring actuation by screwdriver            |   |
| Connection cross-section          | s*: 0.08...2.5 mm <sup>2</sup> ,<br>st*: 0.08...2.5 mm <sup>2</sup> ,<br>f*: 0.14...1.5 mm <sup>2</sup> | s*: 0.08...1.5 mm <sup>2</sup> ,<br>st*: 0.08...1.5 mm <sup>2</sup> ,<br>f*: 0.14...1.5 mm <sup>2</sup> |
| Connection cross-section AWG      | s*: AWG 28...14,<br>st*: AWG 28...14,<br>f*: AWG 26...16  | s*: AWG 28...16,<br>st*: AWG 28...16,<br>f*: AWG 26...16  |
| Stripping length                  | 8...9 mm  | 9...10 mm   |
| Current load power contacts       | I <sub>max</sub> : 10 A   |   |

\*s: solid wire; st: stranded wire; f: with ferrule

## Ordering Information

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|        |   |
|--------|---|
| EL2002 | EtherCAT Terminal, 2-channel digital output, 24 V DC, 0.5 A                   |
| ES2002 | EtherCAT Terminal, 2-channel digital output, 24 V DC, 0.5 A, pluggable wiring |

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