



240V AC, control relay, relay



Powering Business Worldwide™

Part no.
Article no.

EASY719-AC-RC
274115

Delivery programme

| | | | |
|---------------------|--|--------|---|
| Product range | | | Control relays easyRelay |
| Basic function | | | easy700 (expandable) |
| Description | | | Expandable: Digital inputs/outputs, bus systems AS-Interface, PROFIBUS-DP, CANopen®, DeviceNet customized laser inscription or delivery with user program possible with EASY-COMBINATION-* product (article No. 2010781) |
| Inputs | | | |
| Digital input count | | | digital: 12 |
| Digital | | | 12 |
| Outputs | | | |
| Type | | | Relay |
| Quantity of outputs | | | Relays: 6 |
| Outputs | | Number | 6 |
| Additional features | | | |
| Display | | | with display, with keypad |
| Expansions | | | Expandable |
| Supply voltage | | | 100 - 240 V AC |
| Software | | | EASY-SOFT-BASIC/-PRO |

Approvals

Product Standards

IEC/EN see Technical Data; UL 508; CSA C22.2 No. 142-M1987; CSA C22.2 No. 213-M1987; CE marking

UL File No.

E135462

UL CCN

NRAQ

CSA File No.

012528

CSA Class No.

2252-01 + 2258-02

NA Certification

UL listed, CSA certified

Degree of Protection

IEC: IP20, UL/CSA Type: -

General

| | | | |
|------------------------|--|----|--|
| Standards | | | EN 55011, EN 55022, IEC/EN 61000-4, IEC 60068-2-6, IEC 60068-2-27 |
| Dimensions (W x H x D) | | mm | 107.5 x 90 x 58 (6 PE) |
| Weight | | kg | 0.3 |
| Mounting | | | Top-hat rail IEC/EN 60715, 35 mm or screw fixing using fixing brackets ZB4-101-GF1 (accessories) |

Terminal capacities

| | | | |
|------------------------|--|-----------------|-----------------------|
| Solid | | mm ² | 0.2/4 (AWG 22 - 12) |
| Flexible with ferrule | | mm ² | 0.2/2.5 (AWG 22 - 12) |
| Standard screwdriver | | mm | 3.5 x 0.8 |
| Max. tightening torque | | Nm | 0.6 |

Climatic environmental conditions

| | | | |
|-------------------------------|---|-----|---|
| Operating ambient temperature | | °C | In accordance with IEC 60068-2-1, -25 - +55 |
| Condensation | | | Take appropriate measures to prevent condensation |
| Storage | 8 | °C | -40 - +70 |
| relative humidity | | % | in accordance with IEC 60068-2-30, IEC 60068-2-78 5 - 95 |
| Air pressure (operation) | | hPa | 795 - 1080 |

Ambient conditions, mechanical

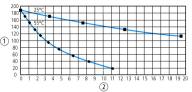
| | | | |
|--|-------------|---------|--|
| Protection type (IEC/EN 60529, EN50178, VBG 4) | | | IP20 |
| Vibrations | | Hz | In accordance with IEC 60068-2-6 constant amplitude 0.15 mm: 10 - 57 constant acceleration 2 g: 57 - 150 |
| Mechanical shock resistance (IEC/EN 60068-2-27) semi-sinusoidal 15 g/11 ms | | Impacts | 18 |
| Drop to IEC/EN 60068-2-31 | Drop height | mm | 50 |
| Free fall, packaged (IEC/EN 60068-2-32) | | m | 1 |

| | | | |
|---|--|-----|--|
| Mounting position | | | Vertical or horizontal |
| Electromagnetic compatibility (EMC) | | | |
| Overvoltage category/pollution degree | | | III/2 |
| Electrostatic discharge (ESD) | | | |
| applied standard | | | according to IEC EN 61000-4-2 |
| Air discharge | | kV | 8 |
| Contact discharge | | kV | 6 |
| Electromagnetic fields (RFI), to IEC EN 61000-4-3 | | V/m | 10 |
| Radio interference suppression | | | EN 55011 Class B, EN 55022 Class B |
| Burst | | | according to IEC/EN 61000-4-4 |
| power pulses (Surge) | | | according to IEC/EN 61000-4-5 2 kV (supply cables, symmetrical) |
| Immunity to line-conducted interference to (IEC/EN 61000-4-6) | | V | 10 |

Insulation resistance

| | | | |
|---|--|--|--------------------------------------|
| Clearance in air and creepage distances | | | EN 50178, UL 508, CSA C22.2, No. 142 |
| Insulation resistance | | | EN 50178 |

Back-up of real-time clock

| | | | |
|---------------------------------------|--|-------|--|
| Back-up of real-time clock | | |  |
| | | | <p>① Backup time (hours) with fully charged double layer capacitor</p> <p>② Service life (years)</p> |
| Accuracy of real-time clock to inputs | | s/day | typ. ± 2 (± 0.2 h/Year) |
| | | | depending on ambient air temperature fluctuations of up to ± 5 s/day (± 0.5 h/year) are possible |


Repetition accuracy of timing relays

| | | | |
|---------------------------------------|--|-----|--------|
| Accuracy of timing relays (of values) | | % | ± 0.02 |
| Resolution | | | |
| Range "S" | | ms | 10 |
| Range "M:S" | | s | 1 |
| Range "H:M" | | min | 1 |

Retentive memory

| | | | |
|--------------------------------------|--|--|----------------------------|
| Write cycles of the retentive memory | | | 1000000 (10 ⁶) |
|--------------------------------------|--|--|----------------------------|

Power supply



| | | | |
|---------------------------|----------------|----|--|
| Rated operational voltage | U _e | V | 100/110/115/120/230/240 AC (-15/+10%) |
| Permissible range | | | 85 - 264 V AC |
| Frequency | | Hz | 50/60 (± 5%) |
| Input current | | | normally 70 mA at 115/120 V AC 60 Hz normally 35 mA at 230/240 V AC 50 Hz |
| Voltage dips | | ms | ≤ I _n accordance with IEC 61131-2 ≤ 20 |
| Fuse | | A |  1A (T) |

Digital inputs 115/230 V AC

| | | | |
|----------------------------|----------------|------|---|
| Number | | | 12 |
| Status Display | | | LCD-Display |
| Potential isolation | | | from power supply: no between digital inputs: no from the outputs: yes to interface/memory card: no to easyLink: no |
| Input voltage (sinusoidal) | U _e | V AC | Signal 0: 0 - 40 Signal 1: 79 - 264 |
| Rated frequency | | Hz | 50 - 60 |
| Input current at signal 1 | | mA | I1 - I6: 6 x 0.25 (at 115 V AC, 60 Hz) I7, I8: 2 x 4 (at 115 V AC, 60 Hz) I9 - I12: 4 x 0.25 I1 - I6: 6 x 0.5 (at 230 V AC, 50 Hz) I7, I8: 2 x 6 (at 230 V AC, 50 Hz) I9 - I12: 4 x 0.5 (at 230 V AC, 50 Hz) |

| | | | |
|-------------------|--|----|---|
| Deceleration time | | ms | 80/66% (0 -> 1/1 -> 0, debounce ON 50/60Hz, I1 - I6, I9 - I12, R1 - R12) 20/16% (0 -> 1/1 -> 0, debounce OFF 50/60Hz, I1 - I6, I9 - I12, R1 - R12) 80/66% (1 -> 0, debounce ON 50/60Hz, I7, I8) 20/16% (0 -> 1, debounce OFF 50/60Hz, I7, I8) 80/66% (0 -> 1, debounce ON 50/60Hz, I7, I8) 20/16% (0 -> 1, debounce OFF 50/60Hz, I7, I8) |
| Cable length | | m | Normally 40 I1 to I6 (max. permissible per input) Normally 100 I7, I8 (max. permissible per input) Normally 40 I9 to I12 (max. permissible per input) |

Relay outputs

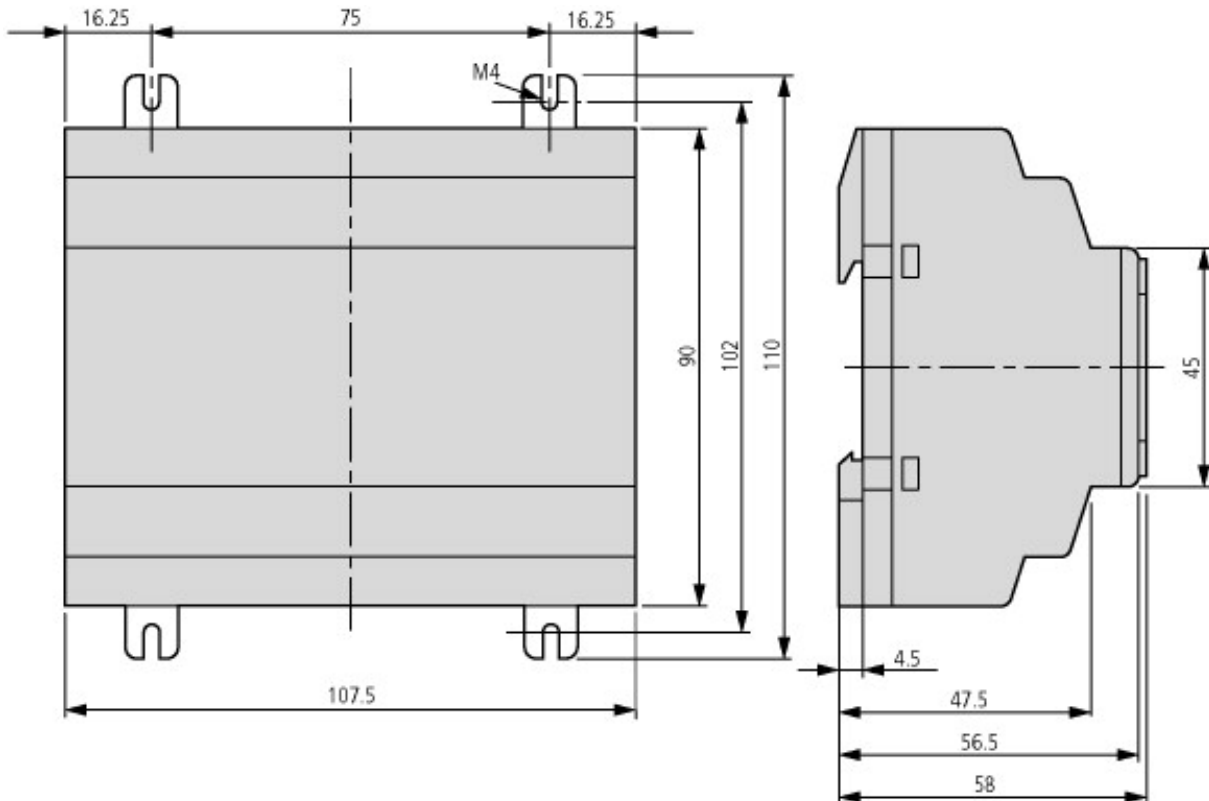
| | | | |
|---|------------|----------------------|---|
| Number | | | 6 |
| Outputs in groups of | | | 1 |
| Parallel switching of outputs for increased output | | | Not permissible |
| Protection of an output relay | | | Miniature circuit-breaker B16 or fuse 8 A (slow) |
| Potential isolation | | | from power supply: yes From the inputs: yes Safe isolation according to EN 50178: 300 V AC Basic isolation: 600 V AC |
| Lifespan, mechanical | Operations | x 10 ⁶ | 10 |
| Contacts | | | |
| Conventional thermal current (10 A UL) | | A | 8 |
| Recommended for load: 12 V AC/DC | | mA | > 500 |
| Short-circuit-proof $\cos \varphi = 1$, characteristic B16 at 600 A | | A | 16 |
| Short-circuit-proof $\cos \varphi = 0.5$ to 0.7, characteristic B16 at 900 A | | A | 16 |
| Rated impulse withstand voltage U_{imp} of contact coil | | kV | 6 |
| Rated operational voltage | U_e | V AC | 250 |
| Rated insulation voltage | U_i | V AC | 250 |
| Safe isolation according to EN 50178 | | V AC | 300 between coil and contact 300 between two contacts |
| Making capacity | | | |
| AC—15, 250 V AC, 3 A (600 ops./h) | Operations | | 300000 |
| DC-13, L/R  150 ms, 24 V DC, 1 A (500 S/h) | Operations | | 200000 |
| Breaking capacity | | | |
| AC-15, 250 V AC, 3 A (600 Ops./h) | Operations | | 300000 |
| DC-13, L/R  150 ms, 24 V DC, 1 A (500 S/h) | Operations | | 200000 |
| Filament bulb load | | | |
| 1000 W at 230/240 V AC | Operations | | 25000 |
| 500 W at 115/120 V AC | Operations | | 25000 |
| Fluorescent lamp load | | | |
| Fluorescent lamp load 10 x 58 W at 230/240 V AC | | | |
| With upstream electrical device | Operations | | 25000 |
| Uncompensated | Operations | | 25000 |
| Fluorescent lamp load 1 x 58 W at 230/240 V AC, conventional, compensated | Operations | | 25000 |
| Switching frequency | | | |
| Mechanical operations | | x 10 ⁶ | 10 |
| Switching frequency | | Hz | 10 |
| Resistive load/lamp load | | Hz | 2 |
| Inductive load | | Hz | 0.5 |
| UL/CSA | | | |
| Uninterrupted current at 240 V AC | | A | 10 |
| Uninterrupted current at 24 V DC | | A | 8 |
| AC | | | |
| Control Circuit Rating Codes (utilization category) | | | B 300 Light Pilot Duty |
| Max. rated operational voltage | | V AC | 300 |
| max. thermal continuous current $\cos \varphi = 1$ at B 300 | | A | 5 |

| | | | |
|--|--|---------|------------------------|
| max. make/break $\cos \phi \neq$ capacity 1 at B 300 | | VA | 3600/360 |
| DC | | | |
| Control Circuit Rating Codes (utilization category) | | | R 300 Light Pilot Duty |
| Max. rated operational voltage | | V DC | 300 |
| Max. thermal uninterrupted current at R 300 | | A | 1 |
| Max. make/break capacity at R 300 | | VA | 28/28 |

Technical data ETIM 4.0

| | | | |
|---|--|----|------|
| Voltage type of supply voltage | | | AC |
| Expandable | | | YES |
| With display | | | YES |
| Number of HW-interfaces RS232 | | | 0 |
| Number of HW-interfaces serial TTY | | | 0 |
| Max. number of integrated digital inputs | | | 12 |
| Supporting protocol for LON | | | No |
| With time switch | | | No |
| Max. number of integrated analog outputs | | | 0 |
| Number of HW-interfaces RS485 | | | 0 |
| Max. number of integrated digital outputs | | | 6 |
| Protection type (IP) | | | IP20 |
| Height | | mm | 90 |
| Width | | mm | 108 |
| Number of Industrial Ethernet HW interfaces | | | 0 |
| Number of HW-interfaces RS422 | | | 0 |
| Depth | | mm | 60 |
| Switching current | | A | 8 |
| Max. number of integrated analog inputs | | | 0 |
| With relay output | | | YES |
| Number of HW-interfaces other | | | 0 |

Dimensions



Additional product information (links)

| | |
|--|---|
| IL05013015Z (AWA2528-2105) Control relay easy | |
| IL05013015Z (AWA2528-2105) Control relay easy | ftp://ftp.moeller.net/DOCUMENTATION/AWA_INSTRUCTIONS/IL05013015Z2010_11.pdf |
| MN05013003Z-EN (AWB2528-1508) control relay easy500, easy700 | |
| MN05013003Z-DE (AWB2528-1508) Steuerrelais easy500, easy700 - Deutsch | ftp://ftp.moeller.net/DOCUMENTATION/AWB_MANUALS/MN05013003Z_DE.pdf |
| MN05013003Z-EN (AWB2528-1508) control relay easy500, easy700 - English | ftp://ftp.moeller.net/DOCUMENTATION/AWB_MANUALS/MN05013003Z_EN.pdf |
| Labeleditor | http://downloadcenter.moeller.net/de/software.f6023a63-5acb-42c7-a51c-cf99091cace |