



SENTRON, switch disconnecter 3LD, main switch, 3-pole, Iu: 160 A, operating performance / at AC-23 A at 400 V: 75 kW, floor mounting with door coupling, knob-operated mechanism, black, 4-hole mounting of the handle,

| Model | |
|---|-----------------------------------|
| product brand name | SENTRON |
| product designation | Switch disconnecter |
| design of the product | Main switch |
| display version for switch position indicator manual operation | 1 ON - 0 OFF |
| type of switch | Floor mounting with door coupling |
| design of the actuating element | selector switch |
| color of the actuating element | black |
| design of handle | knob-operated mechanism, black |
| type of the driving mechanism motor drive | No |
| General technical data | |
| number of poles | 3 |
| size of switch disconnecter | 5 |
| mechanical service life (operating cycles) typical | 100 000 |
| electrical endurance (operating cycles) | |
| • at AC-23 A at 690 V | 6 000 |
| operating frequency maximum | 50 1/h |
| degree of pollution | 3 |
| Voltage | |
| insulation voltage rated value | 690 V |
| surge voltage resistance rated value | 8 kV |
| operating voltage | |
| • at AC rated value | 690 V |
| operating frequency rated value | |
| • minimum | 50 Hz |
| • maximum | 60 Hz |
| Protection class | |
| protection class IP | IP65 |
| degree of protection NEMA rating | 1, 3R, 4X, 12 |
| protection class IP on the front | IP65 |
| Dissipation | |
| power loss [W] for rated value of the current at AC in hot operating state per pole | 36 W |
| Main circuit | |
| operational current | |
| • at AC-21 at 690 V rated value | 160 A |
| • at AC-21 A at 240 V rated value | 160 A |
| • at AC-21 A at 400 V rated value | 160 A |
| • at AC-21 A at 440 V rated value | 160 A |

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| <ul style="list-style-type: none"> at AC-23 A at 400 V rated value | 132 A |
| operating power | |
| <ul style="list-style-type: none"> at AC-23 A at 240 V rated value | 75 kW |
| <ul style="list-style-type: none"> at AC-23 A at 400 V rated value | 75 kW |
| <ul style="list-style-type: none"> at AC-23 A at 440 V rated value | 75 kW |
| <ul style="list-style-type: none"> at AC-23 A at 690 V rated value | 45 kW |
| <ul style="list-style-type: none"> at AC-3 at 240 V rated value | 35 kW |
| <ul style="list-style-type: none"> at AC-3 at 400 V rated value | 50 kW |
| <ul style="list-style-type: none"> at AC-3 at 690 V rated value | 37 kW |
| Auxiliary circuit | |
| number of CO contacts for auxiliary contacts | 0 |
| number of NC contacts for auxiliary contacts | 0 |
| number of NO contacts for auxiliary contacts | 0 |
| operating voltage of auxiliary contacts at AC maximum | 500 V |
| continuous current of the auxiliary contact rated value | 10 A |
| insulation voltage of the auxiliary switch rated value | 500 V |
| Suitability | |
| suitability for use main switch | Yes |
| suitability for use switch disconnecter | Yes |
| suitability for use EMERGENCY OFF switch | No |
| suitability for use safety switch | Yes |
| suitability for use maintenance/repair switch | Yes |
| Product details | |
| product feature can be locked into OFF position | Yes |
| accessories | |
| product extension optional | |
| <ul style="list-style-type: none"> motor drive | No |
| <ul style="list-style-type: none"> voltage trigger | No |
| number of connectable NC contacts for auxiliary contacts attachable maximum | 3 |
| number of connectable NO contacts for auxiliary contacts attachable maximum | 5 |
| number of connectable CO contacts for auxiliary contacts attachable maximum | 0 |
| number of bracket locks maximum | 3 |
| hasp thickness of the bracket locks | 4 ... 6 mm |
| Short circuit | |
| conditional short-circuit current with line-side fuse protection | |
| <ul style="list-style-type: none"> at 690 V by gG fuse rated value | 50 kA |
| let-through current with closed switch | |
| <ul style="list-style-type: none"> at 240 V for combination switch + gG fuse maximum | 15 kA |
| <ul style="list-style-type: none"> at 440 V for combination switch + gG fuse maximum | 15 kA |
| <ul style="list-style-type: none"> at 690 V for combination switch + gG fuse maximum permissible | 15 kA |
| I_{2t} value with closed switch | |
| <ul style="list-style-type: none"> at 240 V for combination switch + gG fuse maximum | 185 kA ² .s |
| <ul style="list-style-type: none"> at 440 V for combination switch + gG fuse maximum | 185 kA ² .s |
| <ul style="list-style-type: none"> at 690 V for combination switch + gG fuse maximum | 185 kA ² .s |
| design of the fuse link | |
| <ul style="list-style-type: none"> for short-circuit protection of the main circuit required | fuse gL/gG: 160 A |
| <ul style="list-style-type: none"> for short-circuit protection of the auxiliary switch required | fuse gL/gG: 10 A |
| operational current of upstream fuse rated value | 160 A |
| according UL | |
| operational current at AC according to UL 508/UL 60947-4-1 rated value | 180 A |
| operating voltage at AC at 50/60 Hz according to UL 508/UL 60947-4-1 rated value | 600 V |
| active power [hp] at AC at 480 V according to UL 508/UL 60947-4-1 rated value | 75 |
| active power [hp] at AC at 600 V according to UL 508/UL 60947-4-1 rated value | 50 |
| short-time withstand current (SCCR) at 600 V according to | 10 kA |

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| UL 508/UL 60947-4-1 | |
| continuous current of upstream fuse according to UL rated value | 200 A |
| type of fuse according to UL | RK5 |

Connections

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| AWG number as coded connectable conductor cross section solid maximum <ul style="list-style-type: none"> • • | 1 4/0 |
| type of connectable conductor cross-sections for copper conductor <ul style="list-style-type: none"> • solid • finely stranded with core end processing • stranded | 1x (16 ...185mm ²) 1x (16...150mm ²) 1x (16...185mm ²) |
| type of connectable conductor cross-sections for auxiliary contacts <ul style="list-style-type: none"> • solid • finely stranded with core end processing • stranded | lateral auxiliary switch 2x (0,75 ... 2,5mm ²), 1x 4mm ² ; front auxiliary switch 1x (0,75 ... 2,5mm ²) lateral auxiliary switch 2x (0,75 ... 1,5mm ²), 1x 2,5mm ² ; front auxiliary switch 1x 2,5mm ² lateral auxiliary switch 2x (0,75 ... 2,5mm ²), 1x 4mm ² ; front auxiliary switch 1x (0,75 ... 2,5mm ²) |
| type of electrical connection <ul style="list-style-type: none"> • for main current circuit • for auxiliary contacts | box terminal connection terminals |

Mechanical Design

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| height | 169 mm |
| width | 112 mm |
| depth | 94 mm |
| type of device | fixed mounting |
| fastening method | Built-in unit fixed-mounted version |
| fastening method <ul style="list-style-type: none"> • 4-hole front mounting • front mounting with central attachment • rail mounting | Yes No No |
| net weight | 2 750 g |

Environmental conditions

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|--|---------------------|
| ambient temperature during operation <ul style="list-style-type: none"> • minimum • maximum | -25 °C 55 °C |
| ambient temperature during storage <ul style="list-style-type: none"> • minimum • maximum | -25 °C 55 °C |

Approvals Certificates

General Product Approval



[Confirmation](#)



| | |
|-------|-------------|
| other | Environment |
|-------|-------------|

[Confirmation](#)

[Miscellaneous](#)

[Environmental Con-
firmations](#)

[Environmental Con-
firmations](#)

Further information

Information on the packaging
<https://support.industry.siemens.com/cs/ww/en/view/109813875>
 Information- and Downloadcenter (Catalogs, Brochures,...)
<http://www.siemens.com/lowvoltage/catalogs>



