



Figure similar

Non-reversing motor starter, Size 3, Three phase full voltage, Solid-state overload relay, OLR amp range 25-100A, Combination type, 125A circuit breaker, Encl NEMA type 4X 304 S-Steel, Water/dust tight noncorrosive, Standard width enclosure

|  |   |
|--|---|
| product brand name   | Class 18 & 26   |
| design of the product  | Full-voltage non-reversing motor starter with motor circuit protector |
| special product feature  | ESP200 overload relay   |
| <b>General technical data</b>  |   |
| Height x Width x Depth [in]  | 24 × 20 × 8 in  |
| touch protection against electrical shock  | NA for enclosed products  |
| installation altitude [ft] at height above sea level maximum   | 6560 ft   |
| ambient temperature [°F]   |   |
| <ul style="list-style-type: none"> <li>during storage</li> <li>during operation</li> </ul>   | -22 ... +149 °F<br>-4 ... +104 °F                                     |
| ambient temperature  |   |
| <ul style="list-style-type: none"> <li>during storage</li> <li>during operation</li> </ul>   | -30 ... +65 °C<br>-20 ... +40 °C                                      |
| <b>Horsepower ratings</b>  |   |
| yielded mechanical performance [hp] for 3-phase AC motor   |   |
| <ul style="list-style-type: none"> <li>at 200/208 V rated value</li> <li>at 220/230 V rated value</li> <li>at 460/480 V rated value</li> <li>at 575/600 V rated value</li> </ul> | 25 hp<br>30 hp<br>50 hp<br>50 hp                                      |
| <b>Contactors</b>  |   |
| size of contactor  | NEMA controller size 3  |
| number of NO contacts for main contacts  | 3   |
| operating voltage for main current circuit at AC at 60 Hz maximum  | 600 V   |
| operational current at AC at 600 V rated value   | 90 A  |
| mechanical service life (switching cycles) of the main contacts typical  | 5000000   |
| <b>Auxiliary contact</b>   |   |
| number of NC contacts at contactor for auxiliary contacts  | 0   |
| number of NO contacts at contactor for auxiliary contacts  | 1   |
| number of total auxiliary contacts maximum   | 7   |
| contact rating of auxiliary contacts of contactor according to UL  | 10A@600VAC (A600), 5A@600VDC (P600)                                   |
| <b>Coil</b>  |   |
| type of voltage of the control supply voltage  | AC  |
| control supply voltage   |   |
| <ul style="list-style-type: none"> <li>at AC at 50 Hz rated value</li> <li>at AC at 60 Hz rated value</li> </ul>   | 550 V<br>575 ... 600 V  |

|   |  |
|---|--|
| holding power at AC minimum   | 14 W   |
| apparent pick-up power of magnet coil at AC   | 310 VA   |
| apparent holding power of magnet coil at AC   | 26 VA  |
| operating range factor control supply voltage rated value of magnet coil  | 0.85 ... 1.1                                   |
| percental drop-out voltage of magnet coil related to the input voltage  | 50 %   |
| ON-delay time   | 26 ... 41 ms                                   |
| OFF-delay time  | 14 ... 19 ms                                   |
| <b>Overload relay</b>   |  |
| reset function  | Manual, automatic and remote                   |
| trip class  | CLASS 5 / 10 / 20 (factory set) / 30           |
| adjustable current response value current of the current-dependent overload release   | 25 ... 100 A                                   |
| make time with automatic start after power failure maximum  | 3 s  |
| relative repeat accuracy  | 1 %  |
| number of NC contacts of auxiliary contacts of overload relay   | 1  |
| number of NO contacts of auxiliary contacts of overload relay   | 1  |
| operational current of auxiliary contacts of overload relay <ul style="list-style-type: none"> <li>• at AC at 600 V</li> <li>• at DC at 250 V</li> </ul>                          | 5 A<br>1 A                                     |
| contact rating of auxiliary contacts of overload relay according to UL  | 5A@600VAC (B600), 1A@250VDC (R300)             |
| insulation voltage (Ui) <ul style="list-style-type: none"> <li>• with single-phase operation at AC rated value</li> <li>• with multi-phase operation at AC rated value</li> </ul> | 600 V<br>300 V                                 |
| <b>Enclosure</b>  |  |
| degree of protection NEMA rating  | 4X, 304 stainless steel                        |
| design of the housing   | dustproof, waterproof & resistant to corrosion |
| <b>Circuit Breaker</b>  |  |
| type of the motor protection  | Motor circuit protector (magnetic trip only)   |
| operational current of motor circuit breaker rated value  | 125 A  |
| adjustable current response value current of instantaneous short-circuit trip unit  | 500 ... 1250 A                                 |
| <b>Mounting/wiring</b>  |  |
| mounting position   | Vertical                                       |
| fastening method  | Surface mounting and installation              |
| type of electrical connection for supply voltage line-side  | Box lug  |
| type of connectable conductor cross-sections at line-side at AWG cables single or multi-stranded  | 1x (10 AWG ... 1/0 AWG)                        |
| temperature of the conductor for supply maximum permissible   | 75 °C  |
| material of the conductor for supply  | AL or CU                                       |
| type of electrical connection for load-side outgoing feeder   | Box lug  |
| tightening torque [lbf·in] for load-side outgoing feeder  | 120 ... 120 lbf·in                             |
| type of connectable conductor cross-sections at AWG cables for load-side outgoing feeder single or multi-stranded   | 1x (14 ... 2/0 AWG)                            |
| temperature of the conductor for load-side outgoing feeder maximum permissible  | 75 °C  |
| material of the conductor for load-side outgoing feeder   | AL or CU                                       |
| type of electrical connection of magnet coil  | Screw-type terminals                           |
| tightening torque [lbf·in] at magnet coil   | 5 ... 12 lbf·in                                |
| type of connectable conductor cross-sections of magnet coil at AWG cables single or multi-stranded  | 2x (16 ... 12 AWG)                             |
| temperature of the conductor at magnet coil maximum permissible   | 75 °C  |
| material of the conductor at magnet coil  | CU   |
| type of electrical connection for auxiliary contacts  | Screw-type terminals                           |
| tightening torque [lbf·in] at contactor for auxiliary contacts  | 10 ... 15 lbf·in                               |

|  |   |
|--|---|
| type of connectable conductor cross-sections at contactor at AWG cables for auxiliary contacts single or multi-stranded      | 1x (12 AWG), 2x (16 ... 14 AWG), 2x (18 ... 16 AWG) |
| temperature of the conductor at contactor for auxiliary contacts maximum permissible   | 75 °C   |
| material of the conductor at contactor for auxiliary contacts  | CU  |
| type of electrical connection at overload relay for auxiliary contacts   | Screw-type terminals                                |
| tightening torque [lbf-in] at overload relay for auxiliary contacts  | 7 ... 10 lbf-in                                     |
| type of connectable conductor cross-sections at overload relay at AWG cables for auxiliary contacts single or multi-stranded | 2x (20 ... 14 AWG)                                  |
| temperature of the conductor at overload relay for auxiliary contacts maximum permissible                                    | 75 °C   |
| material of the conductor at overload relay for auxiliary contacts   | CU  |

### Short-circuit current rating

|  |                                     |
|--|-------------------------------------|
| design of the short-circuit trip   | Instantaneous trip circuit breaker  |
| breaking capacity maximum short-circuit current (Icu)  |                                     |
| <ul style="list-style-type: none"> <li>• at 240 V</li> <li>• at 480 V</li> <li>• at 600 V</li> </ul> | 100 kA<br>100 kA<br>25 kA           |
| certificate of suitability   | NEMA ICS 2; UL 508; CSA 22.2, No.14 |

### Further information

**Industrial Controls - Product Overview (Catalogs, Brochures,...)**

[www.usa.siemens.com/iccatalog](http://www.usa.siemens.com/iccatalog)

**Industry Mall (Online ordering system)**

<https://mall.industry.siemens.com/mall/en/us/Catalog/product?mlfb=US2:18HUG92WE>

**Service&Support (Manuals, Certificates, Characteristics, FAQs,...)**

<https://support.industry.siemens.com/cs/US/en/ps/US2:18HUG92WE>

**Image database (product images, 2D dimension drawings, 3D models, device circuit diagrams, EPLAN macros, ...)**

[http://www.automation.siemens.com/bilddb/cax\\_de.aspx?mlfb=US2:18HUG92WE&lang=en](http://www.automation.siemens.com/bilddb/cax_de.aspx?mlfb=US2:18HUG92WE&lang=en)

**Certificates/approvals**

<https://support.industry.siemens.com/cs/US/en/ps/US2:18HUG92WE/certificate>

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