## SIEMENS

## Data sheet

## 6ES7322-1FH00-0AA0



SIMATIC S7-300, Digital output SM 322, Isolated 16 DO, 120/230 V AC, 1 A, 1x 20-pole

| Fi | q | ur | e | si | m | il | ar |  |
|----|---|----|---|----|---|----|----|--|
|    | - | -  | - |    |   |    |    |  |

| Supply voltage  |                                     |  |  |  |  |
|---|-------------------------------------|--|--|--|--|
| Load voltage L1   |                                     |  |  |  |  |
| Rated value (AC)  | 230 V; 120/230 V AC                 |  |  |  |  |
| <ul> <li>permissible range, lower limit (AC)</li> </ul>                     | 79 V                                |  |  |  |  |
| • permissible range, upper limit (AC)                                       | 264 V                               |  |  |  |  |
| Input current   |                                     |  |  |  |  |
| from load voltage L1 (without load), max.                                   | 2 mA                                |  |  |  |  |
| from backplane bus 5 V DC, max.   | 200 mA                              |  |  |  |  |
| Power loss  |                                     |  |  |  |  |
| Power loss, typ.  | 8.6 W                               |  |  |  |  |
| Digital outputs   |                                     |  |  |  |  |
| Number of digital outputs   | 16                                  |  |  |  |  |
| Short-circuit protection  | Yes; Fuse 8 A, 250 V; per group     |  |  |  |  |
| <ul> <li>required current for fuse shutdown, min.</li> </ul>                | 40 A                                |  |  |  |  |
| Response time, max.   | 300 ms                              |  |  |  |  |
| Controlling a digital input   | Yes                                 |  |  |  |  |
| Size of motor starters according to NEMA, max.                              | 4 NEMA compliant                    |  |  |  |  |
| Spare fuses   | 8 A / quick response                |  |  |  |  |
| Switching capacity of the outputs   |                                     |  |  |  |  |
| <ul> <li>on lamp load, max.</li> </ul>                                      | 50 W                                |  |  |  |  |
| Output voltage  |                                     |  |  |  |  |
| • for signal "1" (at max. current), min.                                    | L1 (-1.5 V)                         |  |  |  |  |
| <ul> <li>for signal "1" (at min. current), min.</li> </ul>                  | L1 (-8.5 V)                         |  |  |  |  |
| Output current  |                                     |  |  |  |  |
| <ul> <li>for signal "1" rated value</li> </ul>                              | 1 A                                 |  |  |  |  |
| • for signal "1" permissible range for 0 to 40 °C, min.                     | 10 mA                               |  |  |  |  |
| <ul> <li>for signal "1" permissible range for 0 to 40 °C, max.</li> </ul>   | 1 A                                 |  |  |  |  |
| • for signal "1" permissible range for 40 to 60 °C, min.                    | 10 mA                               |  |  |  |  |
| <ul> <li>for signal "1" permissible range for 40 to 60 °C, max.</li> </ul>  | 0.5 A                               |  |  |  |  |
| <ul> <li>for signal "1" minimum load current</li> </ul>                     | 10 mA                               |  |  |  |  |
| <ul> <li>for signal "1" permissible surge current, max.</li> </ul>          | 20 A; with 2 half waves             |  |  |  |  |
| <ul> <li>for signal "0" residual current, max.</li> </ul>                   | 2 mA                                |  |  |  |  |
| Parallel switching of two outputs   |                                     |  |  |  |  |
| • for uprating  | No                                  |  |  |  |  |
| <ul> <li>for redundant control of a load</li> </ul>                         | Yes; only outputs of the same group |  |  |  |  |
| Switching frequency   |                                     |  |  |  |  |
| <ul> <li>with resistive load, max.</li> </ul>                               | 10 Hz                               |  |  |  |  |
| • with inductive load, max.   | 0.5 Hz                              |  |  |  |  |
| <ul> <li>with inductive load (acc. to IEC 60947-5-1, AC15), max.</li> </ul> | 0.5 Hz                              |  |  |  |  |
|   |                                     |  |  |  |  |

| <ul> <li>on lamp load, max.</li> </ul>                      | 1 Hz                                    |
|---|---|
| Total current of the outputs (per group)                    |   |
| horizontal installation                                     |   |
| — up to 40 °C, max.   | 4 A                                     |
| — up to 60 °C, max.   | 2 A                                     |
| vertical installation                                       |   |
| — up to 40 °C, max.   | 2 A                                     |
| Cable length  |   |
| <ul> <li>shielded, max.</li> </ul>                          | 1 000 m                                 |
| unshielded, max.  | 600 m                                   |
| Interrupts/diagnostics/status information                   |   |
| Diagnostics function  | Yes; Fuse blown or load voltage missing |
| Alarms  |   |
| Diagnostic alarm  | No                                      |
| Diagnoses   |   |
| Wire-break  | No                                      |
| Short-circuit   | No                                      |
| Fuse blown  | Yes                                     |
| <ul> <li>missing load voltage</li> </ul>                    | No                                      |
| Diagnostics indication LED                                  |   |
| <ul> <li>Rated load voltage PWR (green)</li> </ul>          | No                                      |
| <ul> <li>Fuse OK FSG (green)</li> </ul>                     | Yes; Red LED for fuse                   |
| Group error SF (red)  | Yes                                     |
| <ul> <li>Status indicator digital output (green)</li> </ul> | Yes                                     |
| Potential separation  |   |
| Potential separation digital outputs                        |   |
| <ul> <li>between the channels, in groups of</li> </ul>      | 8                                       |
| <ul> <li>between the channels and backplane bus</li> </ul>  | Yes; Optocoupler                        |
| Isolation   |   |
| Isolation tested with                                       | 4 000 V DC                              |
| connection method   |   |
| required front connector                                    | 20-pin                                  |
| Dimensions  |   |
| Width   | 40 mm                                   |
| Height  | 125 mm                                  |
| Depth   | 120 mm                                  |
| Weights   |   |
| Weight, approx.   | 275 g                                   |
|   | _                                       |
| last modified:  | 8/16/2023 🖸                             |

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