



## EL2258 | 8-channel digital output terminal with multi-timestamping

The 8-channel EL2258 digital output terminal switches the binary output signals of the controller electrically isolated from the process level. As in the EL2252, the outputs of the EL2258 are switched with high precision relative to the transferred timestamp, although there are certain differences in the details: eight instead of two channels, coarser temporal resolution and AutoActivation, which enables consecutive switching tasks in each cycle. With multi-timestamping as many events can be read per channel in each EtherCAT cycle, as were pre-loaded in the internal buffer.

The distributed clocks are used as time reference. In conjunction with timestamp input terminals, the EL2258 enables responses at equidistant intervals that are largely independent of the bus cycle time.

Technical data	EL2258
Connection technology	2-wire
Number of outputs	8
Rated load voltage	24 V DC (-15 %/+20 %)
Load type	ohmic, inductive, lamp load
Oversampling/multi-timestamping factor	$n = \text{integer multiple of the cycle time, } 1 \dots 10$
Internal sampling/execution	$< 10 \dots 40 \mu\text{s}$ , corresponds to $100 \dots 25 \text{ k detectable edges/s}$ , dependent on configuration
Distributed clocks	yes
Distributed clock precision	$\ll 1 \mu\text{s}$
Output delay through 24 V power section	typ. $< 1 \mu\text{s}$
Max. output current	0.5 A (short-circuit-proof) per channel
Short circuit current	$< \text{typ. } 1 \text{ A}$
Reverse voltage protection	yes
Breaking energy	$< 150 \text{ mJ/channel}$
Switching times	typ. $T_{\text{ON}}: < 1 \mu\text{s}$ , typ. $T_{\text{OFF}}: < 1 \mu\text{s}$
Output stage	push
Current consumption E-bus	typ. 130 mA
Electrical isolation	500 V (E-bus/field potential)
Current consumption power contacts	typ. 30 mA + load
Bit width in the process image	8 bit output (ch. 1 + ch. 2), 9 byte timestamp
Special features	multi-timestamping, auto activation
Weight	approx. 55 g
Operating/storage temperature	$0 \dots +55 \text{ }^\circ\text{C} / -25 \dots +85 \text{ }^\circ\text{C}$
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. class/installation pos.	IP 20/variable
Approvals	CE

Further information

XFC

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