SIEMENS

Data sheet for Incremental encoder

MLFB-Ordering data

6FX2001-2GF00



Client order no. : Order no. : Offer no. : Remarks :

Item no. : Consignment no. : Project :

Electrical data		Mechanical data	
Operating voltage Up	DC 5 V ± 10 %	Shaft diameter	6 mm
Max. power consumption without load	150 mA	Shaft length	10 mm
Signal level	TTL (RS 422)	Angular acceleration, max. Moment of inertia of rotor	100000 rad/s² 0.00000145 kgm²
Resolution	5000 S/R	Vibration (552000 Hz), max.	300 m/s ²
Accuracy	13 rad	Friction torque (at 20°C), max.	0.01 Nm
Sampling frequency, max.	300 kHz	Starting torque (at 20°C), max.	0.01 Nm
Switching time (10 90 %)	<= 50 ns	Net weight	0.3 kg
	Rise / fall time t+/t- <=	Max. admissible speed	
Phase relation signal A to B	90°	Electrical	3600 rpm
Edge clearance at 300 kHz	0.45 μs	Mechanical	12000 rpm
LED failure monitoring	High impedance driver	Load capacity	
able length		n = 6000 rpm	
To the downstream electronics, ma	x. 100 m	- Axial	10 N
Ambient temp in operation		- Radial at shaft end	20 N
xed installation of flange outlet	or cable	n > 6000 rpm	
	40 100 °C	- Axial	40 N
		- Radial at shaft end	60 N
lexible cable		Shock, max.	
- At Up = 5V ± 10%	10 100 °C	2 ms	2000 m/s ²
		6 ms	1000 m/s²
Standards		Degree of protection	
Compliance with standards C	Œ, cULus	Without shaft input	IP67
EINIC Class Title1	ested according to the EMC guidelines 19/336/EEC and the rules of the EMC Juidelines (generic standards)	With shaft input	IP64