

# IDX 56 S with integrated electronics

Drive with Positioning/Speed Controller

EtherCAT  
CANopen  
I/O ↔

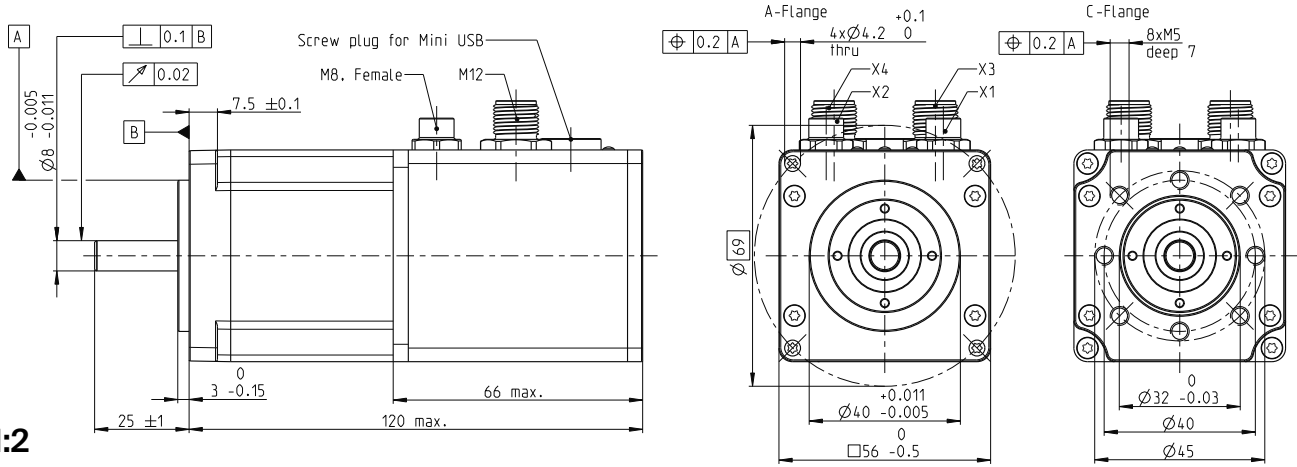


**NEW**

**IDX**

**Key Data: 180/212 W, 450 mNm, 6000 rpm**

**M 1:2**



**Drive data (provisional)**

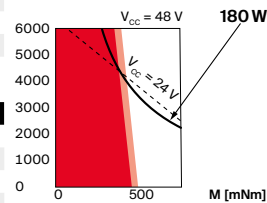
1_ Nominal power supply voltage	V	24	48
2_ Nominal speed	rpm	4400	4500
3_ Nominal torque at 25°C	mNm	393	450
4_ Nominal torque at 40°C	mNm	349	399
5_ Nominal supply current at 25°C	A	9.0	5.3
6_ Nominal supply current at 40°C	A	8.0	4.7
7_ Maximum speed at nominal voltage	rpm	6000	6000
8_ Maximum permissible drive speed	rpm	6000	6000
9_ Maximum torque (short-time)	mNm	775	1546
10_ Maximum supply current (short-time)	A	24	24
11_ Rotor inertia of the drive	gcm <sup>2</sup>	107	107
12_ Nominal supply voltage + V <sub>CC</sub>	V	12..48	12..48
13_ Mechanical time constant	ms	0.82	0.783

**Thermal data**

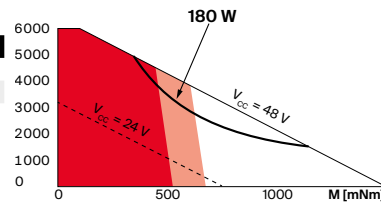
14_ Thermal resistance housing-ambient	K/W	2.04
15_ Thermal resistance winding-housing	K/W	1.94
16_ Thermal time constant winding	s	38.2
17_ Thermal time constant drive	s	585
18_ Ambient temperature	°C	-30...+85

**Operating Range**

**n [rpm] 24-V-system**



**n [rpm] 48-V-system**



■ Continuous operation  
■ Continuous operation with reduced thermal resistance R<sub>th2</sub> 50%  
 Short term operation

**Mechanical data**

19_ Axial play	mm	0.14
Preload	N	16
Direction of force		Pull
20_ Radial play		preloaded
21_ Max. axial load (dynamic)	N	12
22_ Max. force for press fits (static)	N	150
23_ Max. radial load [mm from flange]	N	110 [12.5]

**Other specifications**

24_ Weight of the drive	g	574
25_ Typical noise level [rpm]	dBA	55 [4000]
Encoder: Steps per turn		4096

Supply	M12, male, 5 poles, L-coded
I/O's	M12, male, 12 poles, A-coded
CANopen Input	M8, male, 5 poles, B-coded
CANopen Output	M8, female, 5 poles, B-coded
EtherCAT Input	M8, female, 4 poles, A-coded
EtherCAT Output	M8, female, 4 poles, A-coded

**Modular System**

<b>Gear</b>	Stages [opt.]	<b>Sensor</b>	<b>Motor Control</b>
390_GPX 52 A/UP	1-3	integrated	integrated
391_GPX 52 LN	1-3		
		<b>Accessories</b>	
		569_AB 42 S	

Details on catalog page 40

**Configuration**

Flange front: A-Flange/C-Flange  
 Interface with Positioning/Speed Controller: CANopen / EtherCAT  
 Interface with Speed Controller: I/O