

Brakes

Electromagnetically Released System

For combination with
DC-Micromotors:
2342, 2642, 2657, 3242, 3257

Series FSB 001

	FSB 001	24 V	
Nominal coil data at 20°C			
Supply voltage (DC) ±10%	U_N	24	Volt
Resistance	R	138	Ω
Current	A	0,17	A
Power	$P_{2 \text{ max.}}$	4,1	W
Mechanical response times ¹⁾			
Coupling time		14	ms
Disconnection time		8	ms
Static torque rating ²⁾			
Static torque rating		113	mNm
Moment of inertia		1,2	gcm ²
Max. permissible speed			
Max. permissible speed		9 000	rpm
Temperature range: ³⁾			
Operating temperature		-30... +100	°C
Storage temperature		-20...+ 70	°C
Weight			
Weight		50	g

¹⁾ Depending on the requirements, a Switch-off voltage-limitation function can be applied using an anti-parallel diode, varistor or other. However, this will influence the brake switching time.

²⁾ Under dry operation conditions, absolutely oil-free.

³⁾ Non condensing atmosphere.

Features

The brakes are designed as DC operated permanentmagnet single-surface brakes characterised by the fact that the braking effect is produced by a permanentmagnetic field (electromagnetically released system). This means that the required braking force is generated when voltage is removed.

In order to neutralise the braking effect, the permanentmagnetic field is counteracted by an opposing electromagnetic field.

The brakes are intended only for use as holding brakes (unsuitable for braking rotating motor shaft).

