

Data sheet for SIMOTICS S-1FK2

Article No. : 1FK2104-6AF11-1SA0



Figure similar

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

Item no. :
Consignment no. :
Project :

Basic motor data

| | |
|-------------------------|---|
| Motor type | Permanent-magnet synchronous motor, Natural cooling, IP65 |
| Motor type | High Dynamic |
| Static torque | 3.20 Nm |
| Static current | 3.0 A |
| Maximum torque | 10.00 Nm |
| Maximum current | 10.9 A |
| Maximum speed | 7,200 rpm |
| Rotor moment of inertia | 0.8400 kgcm ² |
| Weight | 4.2 kg |

Rated data

SINAMICS S210, 3AC 400V

| | |
|---------------|-----------|
| Rated speed | 3,000 rpm |
| Rated torque | 3.20 Nm |
| Rated current | 3.0 A |
| Rated power | 1.00 kW |

Encoder system

| | |
|----------------|--|
| Encoder system | Encoder AS22DQC: Absolute encoder single turn 22 bit |
|----------------|--|

Motor connection

| | |
|-----------------|--------------|
| Connection type | OCC for S210 |
| Connector size | M17 |

Mechanical data

| | |
|-------------------------------|--|
| Design acc. to Code I | IM B5 (IM V1, IM V3) |
| Vibration severity grade | Grade A |
| Shaft height | 40 |
| Flange size (AB) | 80 mm |
| Centering ring (N) | 70 mm |
| Hole circle (M) | 90 mm |
| Screw-on hole (S) | 6.5 mm |
| Overall length (LB) | 188 mm |
| Diameter of shaft (D) | 19 mm |
| Length of shaft (E) | 40 mm |
| Length of flange diagonal (P) | 105 mm |
| Shaft end | Fitted key |
| Color of the housing | Standard (Anthracite, similar to RAL 7016) |



Holding brake

| | |
|--|-----------|
| Holding torque | 3.30 Nm |
| Average dynamic torque | 3.30 Nm |
| Opening time | 50 ms |
| Closing time | 40 ms |
| Maximum single switching energy ¹⁾ | 270 J |
| Service life, operating energy | 120,000 J |
| Holding current ²⁾ | 0.2 A |
| Break-induced current for 500 ms ²⁾ | 1.2 A |

¹⁾ Up to three consecutive emergency stops and up to 25% of all emergency stops as a Wmax high energy stop possible.

²⁾ Typical value for 20°C ambient temperature. At -15°C the break-induced currents can be increased by up to 30%.