## Product data sheet Characteristics

# BCH2MR3523CF6C

servo motor BCH, Lexium 28, 180mm, 3500W, 54.1kg.cm², with oil seal, with key, brake, straight connection





#### Main

| Wall                         |             |
|------------------------------|-------------|
| Range Compatibility          | Lexium 28   |
| Product or Component<br>Type | Servo motor |
| Device short name            | BCH2        |

#### Complementary

| o o i i pio i i o i i o i |  |
|---------------------------|--|
| Maximum mechanical speed  | 3000 rpm   |
| [Us] rated supply voltage | 220 V  |
| Phase                     | Three phase  |
| Continuous stall current  | 16.55 A  |
| Continuous stall torque   | 147.81 Lbf.ln (16.7 N.m) LXM26D 22.9 A, 220 V, three phase 147.81 lbf.in (16.7 N.m) LXM28 22.9 A, 220 V, three phase |
| Continuous power          | 3500 W   |
| Peak stall torque         | 445.19 Lbf.ln (50.3 N.m) LXM26D 22.9 A, 220 V, three phase 445.19 lbf.in (50.3 N.m) LXM28 22.9 A, 220 V, three phase |
| Nominal output power      | 3500 W LXM26D 22.9 A, 220 V, three phase<br>3500 W LXM28 22.9 A, 220 V, three phase                                  |
| Nominal torque            | 147.81 Lbf.In (16.7 N.m) LXM26D 22.9 A, 220 V, three phase 147.81 lbf.in (16.7 N.m) LXM28 22.9 A, 220 V, three phase |
| Nominal speed             | 2000 rpm LXM26D 22.9 A, 220 V, three phase<br>2000 rpm LXM28 22.9 A, 220 V, three phase                              |
| Maximum current Irms      | 57.8 A LXM26D 3.5 kW, 220 V<br>57.8 A LXM28 3.5 kW, 220 V  |
| Maximum permanent current | 19 A   |
| Product compatibility     | LXM26D servo drive 3.5 kW, 220 V, three phase LXM28 servo drive 3.5 kW, 220 V, three phase                           |
| Shaft end                 | Keyed  |
| Shaft diameter            | 1.38 in (35 mm)  |
| Shaft length              | 3.11 in (79 mm)  |
| Key width                 | 0.39 in (10 mm)  |
| Feedback type             | 20 bits single turn absolute encoder   |
| Holding brake             | With   |
| Holding torque            | 424.84 lbf.in (48 N.m) built-in  |
| Mounting Support          | Asian standard flange  |
| Motor flange size         | 7.09 in (180 mm)   |
| Electrical connection     | Connector MIL  |
| Torque constant           | 1.01 N.m/A 68 °F (20 °C)   |
| Back emf constant         | 61 V/krpm 68 °F (20 °C)  |
| Rotor inertia             | 54.1 kg.cm <sup>2</sup>  |
| Stator resistance         | 0.157 Ohm 68 °F (20 °C)  |
| Stator inductance         | 2.93 mH 68 °F (20 °C)  |
|                           |  |

The information provided in this documentation contains general descriptions and/or technical characteristics of the performance of the products contained herein. This documentation is not inherent for and is not to be used for determining suitability or reliability of these products for specific user applications. It is the dourn and restring of the products with respect to the relevant specific application or use thereof. Neither Schneider Electric Industries SAS nor any of its affiliates or subsidiaries shall be responsible or liable for misuse of the information contained herein.

| Stator electrical time constant       | 18.66 ms 68 °F (20 °C) |
|---------------------------------------|------------------------|
| Maximum radial force Fr               | 1200 N 2000 rpm        |
| Maximum axial force Fa                | 497 N                  |
| Brake pull-in power                   | 49.6 W                 |
| Type of cooling                       | Natural convection     |
| Length                                | 9.25 in (235 mm)       |
| Number of motor stacks                | 2                      |
| Centring collar diameter              | 4.50 in (114.3 mm)     |
| Centring collar depth                 | 0.16 in (4 mm)         |
| Number of mounting holes              | 4                      |
| Mounting holes diameter               | 0.53 in (13.5 mm)      |
| Circle diameter of the mounting holes | 7.87 in (200 mm)       |
| Distance shaft shoulder-flange        | 0.16 in (4 mm)         |
| Net Weight                            | 50.71 lb(US) (23 kg)   |

## Environment

| IP Degree of Protection               | IP50 IM V3<br>IP65 IM B5, IM V1 |
|---------------------------------------|---------------------------------|
| Ambient Air Temperature for Operation | 32104 °F (040 °C)               |

## Ordering and shipping details

| Category          | 18281-LEXIUM 23/28 MOTORS |
|-------------------|---------------------------|
| Discount Schedule | PC53                      |
| GTIN              | 3606480734915             |
| Returnability     | No                        |
| Country of origin | CN                        |

## Packing Units

| PCE                      |
|--------------------------|
| 1                        |
| 9.65 in (24.5 cm)        |
| 11.42 in (29 cm)         |
| 23.03 in (58.5 cm)       |
| 868.78 oz (24630 g)      |
| P06                      |
| 4                        |
| 19.69 in (50 cm)         |
| 31.50 in (80 cm)         |
| 23.62 in (60 cm)         |
| 244.05 lb(US) (110.7 kg) |
|                          |

# Offer Sustainability

| Sustainable offer status   | Green Premium product   |  |
|----------------------------|---|--|
| California proposition 65  | WARNING: This product can expose you to chemicals including: Lead and lead compounds, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information go to www.P65Warnings.ca.gov |  |
| REACh Regulation           |   |  |
| REACh free of SVHC         | Yes   |  |
| EU RoHS Directive          | Pro-active compliance (Product out of EU RoHS legal scope)  |  |
| Mercury free               | Yes   |  |
| China RoHS Regulation      | China RoHS Declaration  |  |
| RoHS exemption information | €Yes  |  |
| Environmental Disclosure   | Product Environmental Profile   |  |
|                            |   |  |

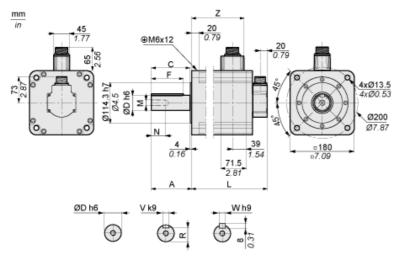
| Circularity Profile | End Of Life Information  |
|---------------------|--|
| WEEE                | The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins. |
| PVC free            | Yes  |

# Product data sheet Dimensions Drawings

# BCH2MR3523CF6C

## **Dimensions**

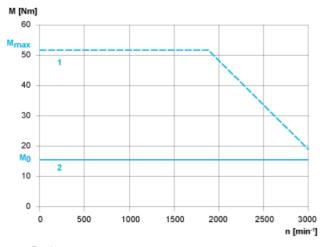
## **Dimensions of Motor**



|                           | mm  | in.  |
|---------------------------|-----|------|
| L (without holding brake) | 202 | 7.95 |
| L (with holding brake)    | 235 | 9.25 |
| A                         | 79  | 3.11 |
| С                         | 73  | 2.87 |
| D                         | 35  | 1.38 |
| F                         | 63  | 2.48 |
| N                         | 28  | 1.10 |
| M                         | M12 |      |
| R                         | 30  | 1.18 |
| V                         | 10  | 0.39 |
| W                         | 10  | 0.39 |
| Z                         | 136 | 5.35 |

## Torque/Speed Curves with 230 V Single/Three Phase Supply Voltage

#### Servo Motor with LXM28AU45●●● Servo Drive



- 1: Peak torque
- 2: Continuous torque