

# BMH2052P36F1A

servo motor BMH, Lexium 32, 62.5Nm,  
3800rpm, keyed shaft, with brake, IP65, IP67,  
16bit encoder, straight



## Main

|                           |                                                                                                                              |
|---------------------------|------------------------------------------------------------------------------------------------------------------------------|
| Device short name         | BMH                                                                                                                          |
| Product or Component Type | Servo motor                                                                                                                  |
| Maximum mechanical speed  | 3800 rpm                                                                                                                     |
| Continuous stall torque   | 553.2 Lbf.in (62.5 N.m) LXM32.D72N4 24 A, 400 V, three phase<br>553.2 lbf.in (62.5 N.m) LXM32.D72N4 24 A, 480 V, three phase |
| Peak stall torque         | 1504.6 Lbf.in (170 N.m) LXM32.D72N4 24 A, 400 V, three phase<br>1504.6 lbf.in (170 N.m) LXM32.D72N4 24 A, 480 V, three phase |
| Nominal output power      | 6500 W LXM32.D72N4 24 A, 400 V, three phase<br>6500 W LXM32.D72N4 24 A, 480 V, three phase                                   |
| Nominal torque            | 368.2 Lbf.in (41.6 N.m) LXM32.D72N4 24 A, 400 V, three phase<br>368.2 lbf.in (41.6 N.m) LXM32.D72N4 24 A, 480 V, three phase |
| Nominal speed             | 1500 rpm LXM32.D72N4 24 A, 400 V, three phase<br>1500 rpm LXM32.D72N4 24 A, 480 V, three phase                               |
| Product compatibility     | LXM32.D72N4 400...480 V three phase                                                                                          |
| Shaft end                 | Keyed                                                                                                                        |
| IP Degree of Protection   | IP65 standard<br>IP67 with IP67 kit                                                                                          |
| Speed feedback resolution | 32768 points/turn                                                                                                            |
| Holding brake             | With                                                                                                                         |
| Mounting Support          | International standard flange                                                                                                |
| Electrical Connection     | Straight connectors                                                                                                          |

## Complementary

|                           |                                       |
|---------------------------|---------------------------------------|
| Range Compatibility       | Lexium 32                             |
| [Us] rated supply voltage | 480 V                                 |
| Phase                     | Three phase                           |
| Continuous stall current  | 24.2 A                                |
| Continuous power          | 7.85 W                                |
| Maximum current Irms      | 72 A LXM32.D72N4                      |
| Maximum permanent current | 96.8 A                                |
| Second shaft              | Without second shaft end              |
| Shaft diameter            | 1.5 in (38 mm)                        |
| Shaft length              | 3.1 in (80 mm)                        |
| Key width                 | 2.8 in (70 mm)                        |
| Feedback type             | Single turn SinCos Hiperface          |
| Holding torque            | 708.06 lbf.in (80 N.m) holding brake  |
| Motor flange size         | 8.07 in (205 mm)                      |
| Number of motor stacks    | 2                                     |
| Torque constant           | 2.6 N.m/A 248.0000000000 °F (120 °C)  |
| Back emf constant         | 161 V/krpm 248.0000000000 °F (120 °C) |

|                                       |                                                       |
|---------------------------------------|-------------------------------------------------------|
| Number of motor poles                 | 10                                                    |
| Rotor inertia                         | 145 kg.cm <sup>2</sup>                                |
| Stator resistance                     | 0.3 Ohm 68.0000000000 °F (20 °C)                      |
| Stator inductance                     | 5.6 mH 68.0000000000 °F (20 °C)                       |
| Stator electrical time constant       | 18.7 ms 68.0000000000 °F (20 °C)                      |
| Maximum radial force Fr               | 4200 N 1000 rpm<br>3330 N 2000 rpm<br>2910 N 3000 rpm |
| Maximum axial force Fa                | 0.2 x Fr                                              |
| Brake pull-in power                   | 40 W                                                  |
| Type of cooling                       | Natural convection                                    |
| Length                                | 17.9 in (454.5 mm)                                    |
| Centring collar diameter              | 7.09 in (180 mm)                                      |
| Centring collar depth                 | 0.2 in (4 mm)                                         |
| Number of mounting holes              | 4                                                     |
| Mounting holes diameter               | 0.6 in (14 mm)                                        |
| Circle diameter of the mounting holes | 8.5 in (215 mm)                                       |
| Net Weight                            | 107.8 lb(US) (48.9 kg)                                |

### Ordering and shipping details

|                   |               |
|-------------------|---------------|
| Category          | US1PC5318282  |
| Discount Schedule | PC53          |
| GTIN              | 3606485203270 |
| Returnability     | No            |
| Country of origin | DE            |

### Packing Units

|                              |                        |
|------------------------------|------------------------|
| Unit Type of Package 1       | PCE                    |
| Number of Units in Package 1 | 1                      |
| Package 1 Height             | 14.2 in (36.0 cm)      |
| Package 1 Width              | 12.2 in (31.0 cm)      |
| Package 1 Length             | 28.7 in (73.0 cm)      |
| Package 1 Weight             | 127.9 lb(US) (58.0 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 <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a> |
| EU RoHS Directive          | Pro-active compliance (Product out of EU RoHS legal scope)                                                                                                                                                                                                                                  |
| Mercury free               | Yes                                                                                                                                                                                                                                                                                         |
| China RoHS Regulation      |  <a href="#">China RoHS Declaration</a>                                                                                                                                                                  |
| RoHS exemption information |  Yes                                                                                                                                                                                                     |
| Environmental Disclosure   |  <a href="#">Product Environmental Profile</a>                                                                                                                                                           |
| Circularity Profile        | No need of specific recycling operations                                                                                                                                                                                                                                                    |
| WEEE                       | The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins.                                                                                                                                                                |
| PVC free                   | Yes                                                                                                                                                                                                                                                                                         |

### Contractual warranty

|          |           |
|----------|-----------|
| Warranty | 18 months |
|----------|-----------|