# 400 V MDME 3.0 kW [Middle inertia, Middle capacity]

## Specif cations

| | | | AC400 V | |
|---|---|---|---|---|
| Motor model *1 | IP65 | | MDME304GC□ | MDME304SC□ |
| | IP67 | | MDME304G1□ | MDME304S1□ |
| Applicable driver *2 | Model No. | A5Ⅱ, A5 series | MFD◇ T5440 | |
| | | A5ⅢE, A5E series | MFD◇ T5440E | – |
| | Frame symbol | | F-frame | |
| Power supply capacity (kVA) | | | 4.5 | |
| Rated output (W) | | | 3000 | |
| Rated torque (N·m) | | | 14.3 | |
| Momentary Max. peak torque (N·m) | | | 43.0 | |
| Rated current (A(rms)) | | | 8.7 | |
| Max. current (A(o-p)) | | | 37 | |
| Regenerative brake frequency (times/min) Note)1 | Without option | | No limit Note)2 | |
| | DV0PM20049×2 | | No limit Note)2 | |
| Rated rotational speed (r/min) | | | 2000 | |
| Max. rotational speed (r/min) | | | 3000 | |
| Moment of inertia of rotor ($\times 10^{-4}$ kg·m$^2$) | Without brake | | 12.9 | |
| | With brake | | 14.2 | |
| Recommended moment of inertia ratio of the load and the rotor Note)3 | | | 10 times or less | |
| Rotary encoder specif cations Note)5 | | | 20-bit Incremental | 17-bit Absolute |
| | Resolution per single turn | | 1048576 | 131072 |

### ●Brake specif cations (For details, refer to P.183)

(This brake will be released when it is energized. Do not use this for braking the motor in motion.)

| | |
|---|---|
| Static friction torque (N·m) | 16.2 or more |
| Engaging time (ms) | 110 or less |
| Releasing time (ms) Note)4 | 50 or less |
| Exciting current (DC) (A) | 0.90±10 % |
| Releasing voltage (DC) (V) | 2 or more |
| Exciting voltage (DC) (V) | 24±2.4 |

### ●Permissible load (For details, refer to P.183)

| | | |
|---|---|---|
| During assembly | Radial load P-direction (N) | 980 |
| | Thrust load A-direction (N) | 588 |
| | Thrust load B-direction (N) | 686 |
| During operation | Radial load P-direction (N) | 784 |
| | Thrust load A, B-direction (N) | 343 |

- For details of Note 1 to Note 5, refer to P.182, P.183.
- Dimensions of Driver, refer to P.45.

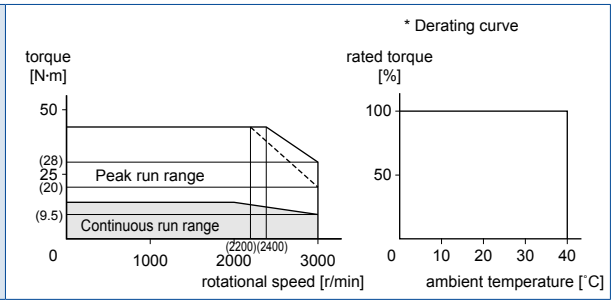
*1 Motor specif cations: □

*2 The product that the end of driver model designation has “E” is “Position control type”. Detail of model designation, refer to P.16.

*3 ◇ in number of applicable driver represents the series. For more information about the part number, please refer to P.16.

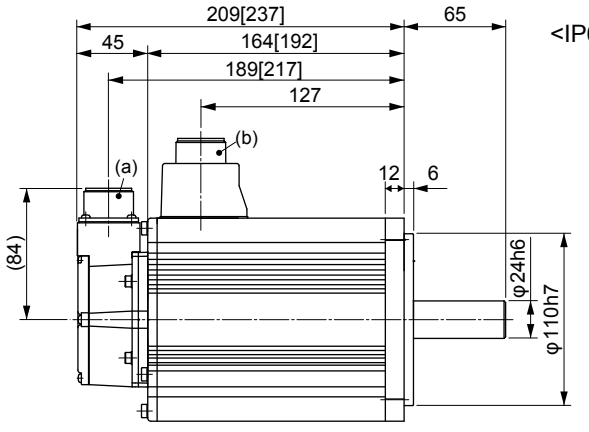
## Torque characteristics (at AC400 V of power voltage <Dotted line represents the torque at 10 % less supply voltage.>)

With oil seal

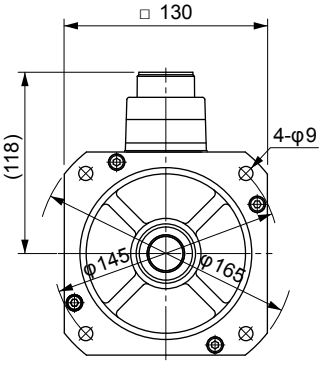



## Dimensions

(For IP67 motor, refer to P.139.)

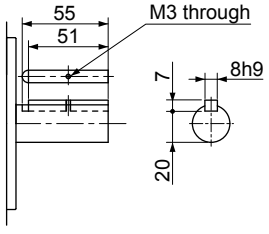



<IP65>




Mass: Without brake/ 11.0 kg
With brake/ 12.6 kg

Key way dimensions




(a) Encoder connector
(b) Motor/Brake connector

* Figures in [ ] represent the dimensions with brake.

[Unit: mm]

**<Cautions>** Reduce the moment of inertia ratio if high speed response operation is required.
Dimensions are subject to change without notice. Contact us or a dealer for the latest information.
Read the Instruction Manual carefully and understand all precautions and remarks before using the products.