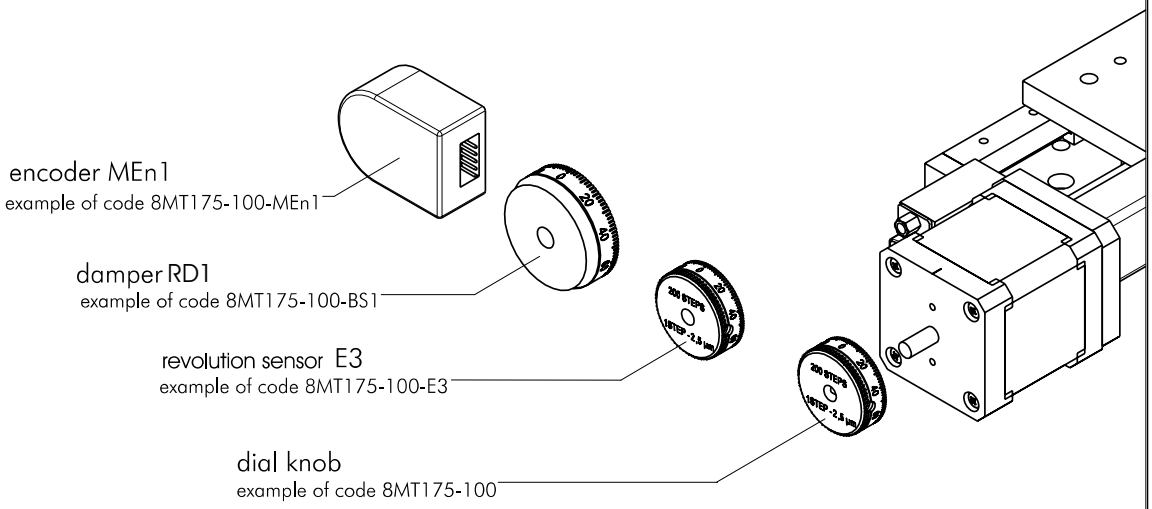
ORDERING INFORMATION
for **Motorized Translation** and **Rotation stages**



DEFAULT CHOICE

Default choice for **ordering motorized translation** or **rotation** stages is with **dial knob**.

Example:
8MT175-100 - translation stage **8MT175-100** with **dial knob**.
8MR190-2-28 - rotation stage **8MR190-2-28** with **dial knob**.

REVOLUTION SENSOR

Revolution sensor counts stepper motor axis revolutions. It consists of Codewheel with one mark and Optointerrupter. When motor is connected to Standa controller **8SMC1-USBhF**, signal from **revolution sensor** allows monitoring of motor axis revolutions, possible loss of steps and detecting motor stalling. It is not as accurate as encoder, which provides feedback for each step of motor. **Revolution sensor** determines whether there was any loss of steps within one revolution of motor axis. This information is reported to the controller and corrective actions can be taken.
Revolution sensor can also be used for precise home position setting.

For **ordering motorized stages** with **revolution sensor**, please **add symbols E3** to the code of motorized stages.

Example:
8MT175-100-E3 - translation stage **8MT175-100** with **revolution sensor E3**.
8MR190-2-28-E3 - rotation stage **8MR190-2-28** with **revolution sensor E3**.

DAMPER

When **damper RD** is used, **vibrations** and **motor noise** is greatly **reduced**, **settling time** is **improved** and **system resonances** are **suppressed**.

For **ordering motorized stages** with **damper**, please **add symbols RD1** to the code of motorized stages.

Example:
8MT175-100-RD1 - translation stage **8MT175-100** with **damper RD1**.
8MR190-2-28-RD1 - rotation stage **8MR190-2-28** with **damper RD1**.

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ORDERING INFORMATION: for **Motorized Translation** and **Rotation stages**

ENCODER

Our **2-channel encoder** is compact and lightweight.

Technical Characteristics of encoder

Operating Voltage	DC 4,5 V to 5,5 V
max. Current Consumption	(at 5 V) 57 mA
Pulse Width	180 ±45 degree
Signal-Phase Shift	(Channel A vs. B) 90 ±15 degree
Signal-Rise-/Fall-Time	0,25 / 0,25 μS
Limit Frequency	up to 100 kHz
Output Signals	rectangular 2
Pulses per Revolution	1000
Operating Temperature	0 °C to +70 °C

Encoder measures motor axis position change and direction and provides feedback to controller. **Encoder** type **HEDS-5540-B14** with **1000 pulses per revolution** is used by default. Standa controller **8SMC1-USBhF** can use signal **from the encoder for motion monitoring**. Result of the monitoring is high system reliability - controller can detect motor stall situation very quickly. Threshold level of motor stall detection is programmable using program SMCVieW included with controller **8SMC1-USBhF**. User specific software can get feedback from encoder through Standa controller **8SMC1-USBhF** and send motion correction commands back to it using provided software libraries.
Unlike servo motors, stepper motors do not necessarily require encoders for operation. **Encoder provides monitoring option. 1000 pulses per revolution ensure precise step monitoring down to 1/4 microstep mode**.

For **ordering motorized stages** with **encoder**, please **add symbols MEn1** to the code of motorized stages.

Example:
8MT175-100-MEn1 - translation stage **8MT175-100** with **encoder MEn1**.
8MR190-2-28-MEn1 - rotation stage **8MR190-2-28** with **encoder MEn1**.

8MTF-75LS05

Motorized XY Scanning Stage **8MTF75LS05** with stepper motor **28** and with **dial knob**

8MR151-1-MEn1

Rotation stage **8MR151-1** with stepper motor **28** and with **encoder MEn1**

8MR191-28-E3

Rotation stage **8MR191** with stepper motor **28** and with **revolution sensor E3**

8MR190-90-RD1

Rotation stage **8MR190-90** with stepper motor **4247** and with **damper RD1**