PD6-E/EB

Motor with integrated controller – PD6

The intelligent compact drives from Nanotec combine motor, controller and encoder in a space-saving package. With 80 mm flange size and a rated power of 942 W, the PD6-EB80C is the most powerful brushless DC motor of this product family. The PD6-E891 is also available in a stepper motor version with a holding torque of up to 10 Nm and 86 mm flange size (NEMA 34).

Maximum performance

In combination with extended features such as the acceleration feed forward and jerk-limited ramps, the field-oriented torque, speed and position control provides optimum dynamic performance and thus cycle time.
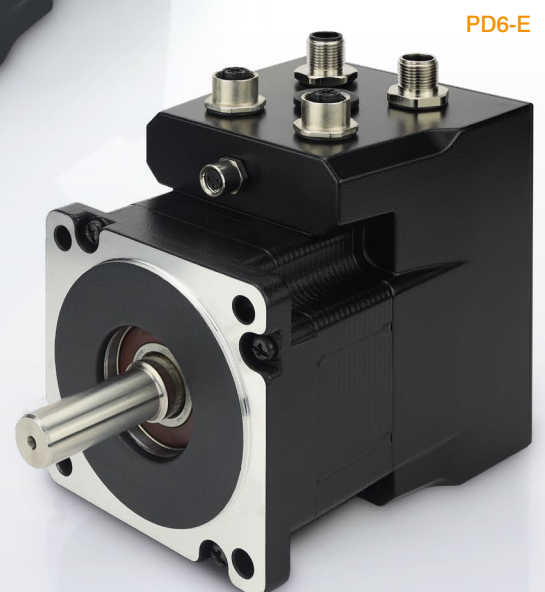
Flexible control

The PD6 can be controlled via fieldbus, clock/direction or digital/analog inputs. This makes it easy to incorporate the motor into various control concepts. The integrated sequence control enables stand-alone applications as well.
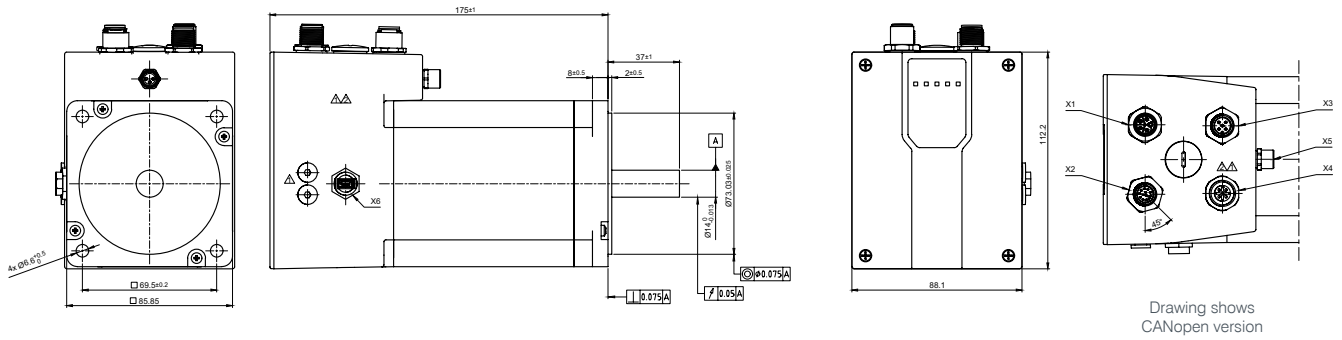
Simple programming

With the free Plug & Drive Studio software from Nanotec, you can easily parameterize and program the PD6. Via the integrated oscilloscope, all motor values can be observed in a millisecond cycle.
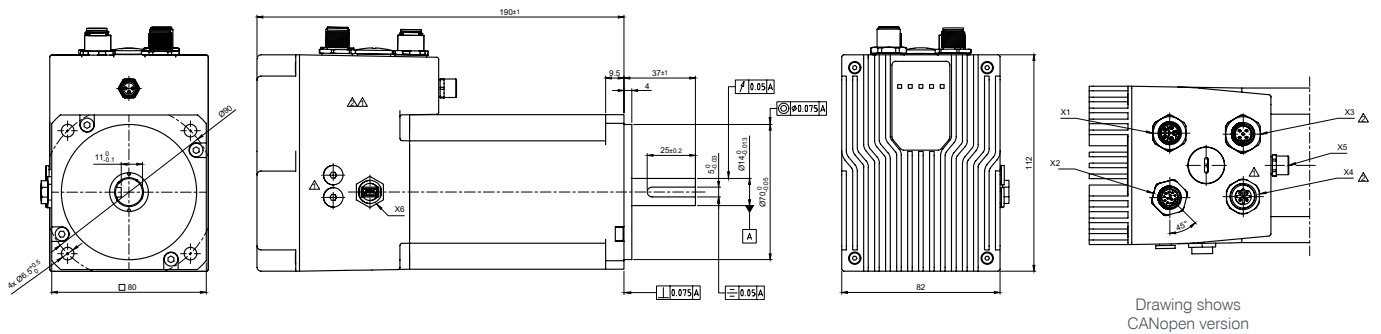
High profitability

Mounting and cabling costs are reduced thanks to the integration of controller and encoder in the motor.

PD6-EB

PD6-E

CANopen   EtherCAT.   EtherNet/IP™   Modbus   PROFINET®

PD6-E

Drawing shows
CANopen version

PD6-EB

Drawing shows
CANopen version

	PD6-E891	PD6-EB80
Motor type	stepper motor	brushless DC motor
Size	86 mm	80 mm
Length	114 - 175 mm	134 - 190 mm
Rated power	-	283 - 940 W
Holding torque	320 - 933 Ncm	-
Rated torque	-	90 - 300 Ncm
Rated speed	-	3,000 rpm
Operating voltage	12 - 58 V	12 - 58 V
Digital inputs	6 (5/24 V switchable)	6 (5/24 V switchable)
Analog input	0 - 20 mA / 0 - 10 V switchable	0 - 20 mA / 0 - 10 V switchable
Digital outputs	2 (open-drain)	2 (open-drain)
Encoder	singleturn absolute (multiturn optional)	singleturn absolute (multiturn optional)
Encoder resolution	1,024 CPR / 4,096 PPR	1,024 CPR / 4,096 PPR
Fieldbuses	CANopen, EtherCAT, EtherNet/IP, Modbus RTU, Modbus TCP, Profinet	CANopen, EtherCAT, EtherNet/IP, Modbus RTU, Modbus TCP, Profinet
Service interface	USB	USB