

Torque sensor TA125 600Nm

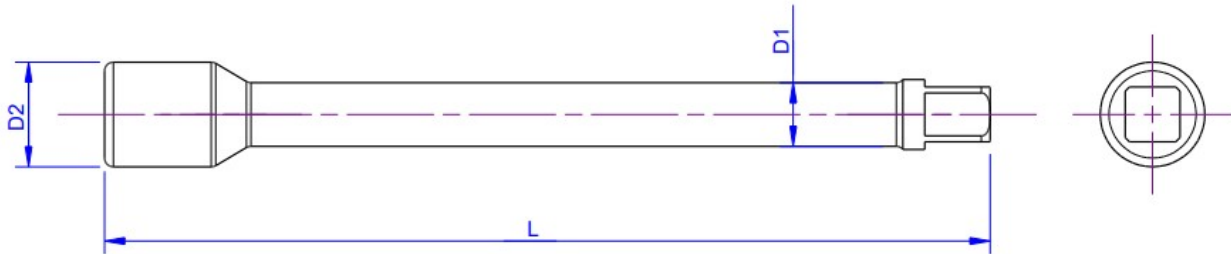
Item number: 4783



The torque sensor TA125 is suitable for measuring the reaction torque up to a nominal torque of 600 Nm (corded, non-rotating).

The torque sensor TA125 is used to monitor torques in quality assurance.

Technical Drawing



ME-Artikelnr.	Nennmoment	L in mm	D1 in mm	D2 in mm
5291	15 Nm	101,5	8	12
5292	50 Nm	126	12,5	18
5293	120 Nm	123	17	23
5294	350 Nm	200	25	36
5295	600 Nm	200	33	43

Technical Data

Basic Data		Unit
Type	Vollzylinder	
Rated torque	600	Nm
Maximum operating torque	150	%FS
Breaking torque	400	%FS
Rated torsion angle	0.7	°/FS
Torque introduction	outer square	
Dimension (torque introduction)	1"	
sensor fastening	inside square	
Dimension 2	1"	
Diameter	43	mm
length	200	mm
Material	tool steel	
Dimensions	101,5 mm x Ø12 mm...200 mm x Ø43 mm	
Variants	15Nm... 600Nm	

Electrical Data		Unit
Input resistance	350	Ohm
Tolerance input resistance	5	±
Output resistance	350	Ohm
Tolerance output resistance	5	±
Insulation resistance	5x10 ⁹	Ohm
Rated range of excitation voltage from	2.5	V
Rated range of excitation voltage to	5	V
Operating range of excitation voltage from	1	V
Operating range of excitation voltage to	10	V
Zero signal	0.05	mV/V
Rated output	2.5	mV/V / FS

Accuracy Data		Unit
Accuracy class	1	
Relative linearity error	0.1	%FS
Relative zero signal hysteresis	0.1	%FS
Temperature effect on zero signal	0.01	%FS/K
Temperature effect on characteristic value	0.01	%RD/K
Relative creep	0.05	%FS

Environmental Data		Unit
Rated temperature range from	-10	°C
Rated temperature range to	60	°C
Operating temperature range from	-10	°C
Operating temperature range to	85	°C
Storage temperature range from	-10	°C
Storage temperature range to	85	°C
Environmental protection	IP65	

Abbreviation : RD: „Reading“; FS: „Full Scale“;1) The exact nominal sensitivity is indicated in the test report.

Pin Assignment

Channel	Symbol	Description	Wire color	PIN
	+Us	positive bridge supply	brown	
	-Us	negative bridge supply	white	
	+Ud	positive bridge output	green	
	-Ud	negative bridge output	yellow	

Compressive load: positive output signal. Shield: transparent.