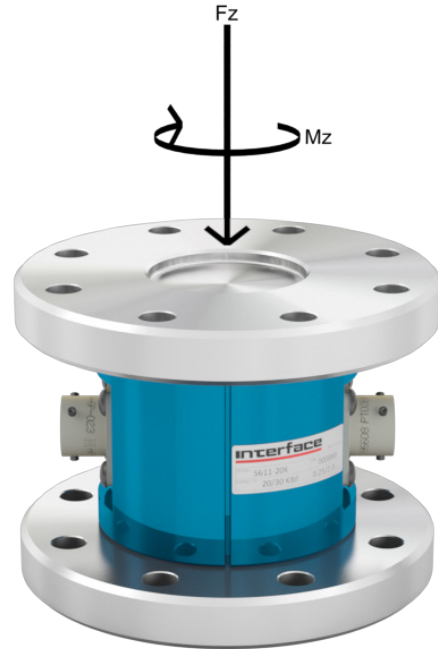


5600 AXIAL TORSION FORCE TRANSDUCER (U.S. & METRIC)

FEATURES & BENEFITS

- Capacities: Force lbf(kN) / Torque lbf-in(Nm) – from 6K(26.7)/5K(565) to 180K(801)/300K(33.9K)
- Measures compressive force and torque
- Low cross talk
- High stiffness
- Extraneous load resistance

STANDARD CONFIGURATION



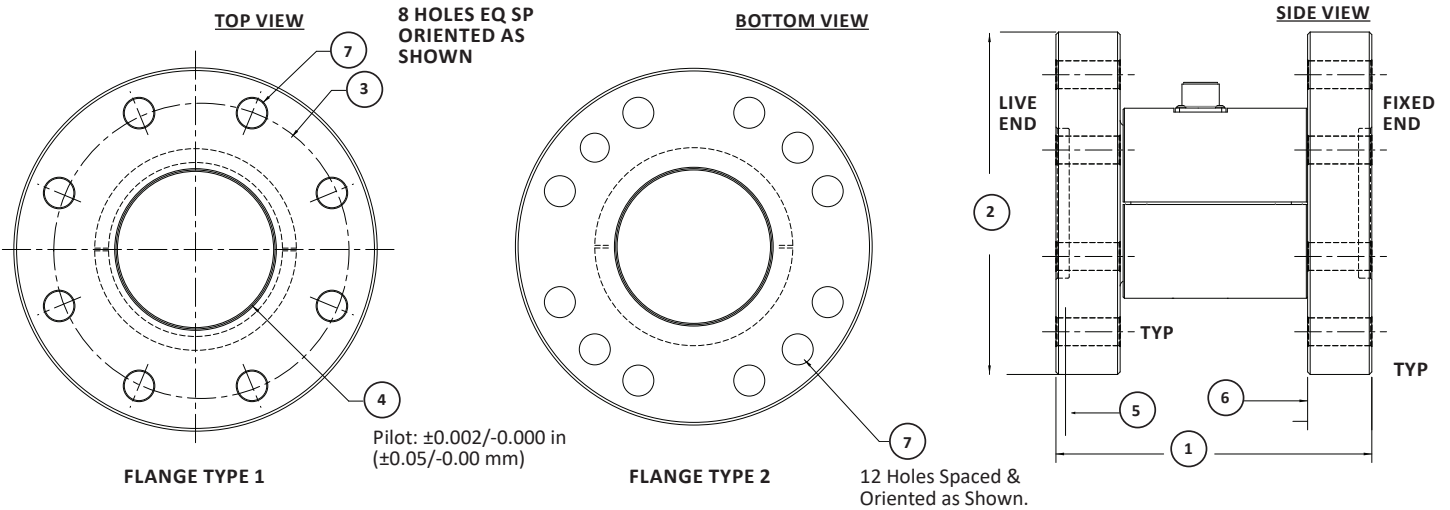
Model 5611-20K (Shown)

5600 AXIAL TORSION FORCE TRANSDUCER (U.S. & METRIC)

SPECIFICATIONS

MODEL		5610-5K	5611 - 20K	5612 - 100K	5613 - 200K	5614 - 300K
CAPACITY						
Mz	lbf-in	5K	20K	100K	200K	300K
	Nm	560	2.2K	11K	22K	33K
Fz (Compression)	lbf	6K	30K	100K	150K	180K
	kN	27	130	450	670	800
ACCURACY						
Nonlinearity – %FS		±0.1	±0.1	±0.1	±0.1	±0.1
Hysteresis – %FS		±0.1	±0.1	±0.1	±0.1	±0.1
Nonrepeatability – %RO		±0.02	±0.02	±0.02	±0.02	±0.02
TEMPERATURE						
Temperature Effect on Zero – %RO MAX	°C	Fz	±0.007	±0.007	±0.007	±0.007
		Mz	±0.004	±0.004	±0.004	±0.004
	°F	Fz	±0.004	±0.004	±0.004	±0.004
		Mz	±0.002	±0.002	±0.002	±0.002
Temperature Effect of Output – % MAX	°C	±0.004	±0.004	±0.004	±0.004	±0.004
	°F	±0.002	±0.002	±0.002	±0.002	±0.002
Compensated Range	°C	+21 to +77	+21 to +77	+21 to +77	+21 to +77	+21 to +77
	°F	+70 to +170	+70 to +170	+70 to +170	+70 to +170	+70 to +170
Operating Range	°C	-54 to +93	-54 to +93	-54 to +93	-54 to +93	-54 to +93
	°F	-65 to +200	-65 to +200	-65 to +200	-65 to +200	-65 to +200
ELECTRICAL						
Rated Output – mV/V (Nominal)	Fz	0.25	0.5	0.5	0.5	0.5
	Mz	2	2	2	2	2
Excitation Voltage – VDC MAX		20	20	20	20	20
Bridge Resistance – Ohm (Nominal)		350	350	350	350	350
Electrical Connection		MS3102E-14S-5P	MS3102E-14S-5P	MS3102E-14S-5P	MS3102E-14S-5P	MS3102E-14S-5P
MECHANICAL						
Safe Overload – % CAP		±150	±150	±150	±150	±150
Deflection at Capacity – (in/rad)	Fz	0.001	0.001	0.002	0.002	0.002
	Mz	0.005	0.004	0.005	0.006	0.005
Overhung Moment – lbf-in MAX		2	10	50	90	200
Side load – lbf MAX		2K	7K	20K	30K	55K

5600 AXIAL TORSION FORCE TRANSDUCER (U.S. & METRIC)



DIMENSIONS

SEE DRAWING	MODEL									
	5610		5611		5612		5613		5614	
	CAPACITY									
	U.S. (lbf-in)	Metric (Nm)	U.S. (lbf-in)	Metric (Nm)	U.S. (lbf-in)	Metric (Nm)	U.S. (lbf-in)	Metric (Nm)	U.S. (lbf-in)	Metric (Nm)
	5K	550	20K	2.2K	100K	11K	200K	22K	300K	33K
	in	mm	in	mm	in	mm	in	mm	in	mm
(1)	3.00	76.2	3.50	88.9	7.38	187.5	8.50	215.9	10.50	266.7
(2)	4.00	101.6	5.00	127.0	8.00	203.2	9.75	247.7	14.00	355.6
(3)	3.25	82.6	4.25	108.0	6.50	165.1	8.00	203.2	11.0	279.4
(4)	1.500	38.10	2.000	50.80	3.500	88.90	4.000	101.60	6.000	152.40
(5)	0.13	3.3	0.25	6.4	0.31	7.9	0.31	7.9	0.31	7.9
(6)	0.50	12.7	0.75	19.1	1.50	38.1	1.50	38.1	2.00	50.8
(7)	0.328	8.33	0.390	10.41*	0.650	16.51	0.781*	20.65	1.031	24.64*
Flange Type	1		1		2		2		1	
Recommended mtg screw size – lbf-in/Nm	$\frac{3}{16}$ - 24	M8 x 1.25	$\frac{3}{16}$ - 24	M10 x 1.5	$\frac{3}{8}$ - 18	M16 x 2	$\frac{3}{8}$ - 16	M20 x 2.5	1 - 12	M24 x 3
Recommended mtg torque – lbf-in/Nm	300	34	600	68	2400	270	4400	500	9000	1000

* Metric Model 5611, 5613, & 5614 have larger mounting holes than their equivalents to accommodate standard metric fasteners