

TSF Static Torque Transducer

Flange to flange static torque reaction transducer.

The TSF range of static torque reaction transducers provide a cost-effective solution to static or semi-rotary torque measurement applications.

All units are internally strain gauged for protection and a range of compatible readouts and amplifiers are available for the complete range of TSF static torque transducers.

The TSF series is available in a variety of sizes ranging from 200Nm up to 75,000Nm.

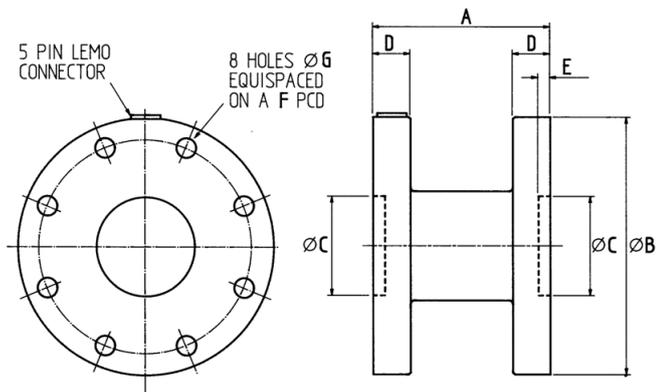
An aluminium version (TSFA) is also available where weight is of concern, in sizes ranging from 50Nm up to 4000Nm.

For pricing, availability or further technical information about the TSF series of static torque transducers, contact us via our website at www.crane-electronics.com or get in touch via email at sales@crane-electronics.com.

Technical Specification

Nominal Sensitivity:	1.5mV/V
Non-linearity:	±0.1% fs
Compensated Range:	0 to +95°C
Overload Capacity:	150% fs
Repeatability:	±0.05% FS
Storage Temp:	-30 to +95°C
Bridge Supply:	10V
Hysteresis:	±0.1% fs
Zero Shift:	< ±0.01%/C°
Bridge Resistance:	700 ohms
Operating Temp:	0 to +95°C
Span Shift:	< ±0.02%/C°
Tolerance on C diameter:	H7
Accuracy:	0.25% FS

Dimensions



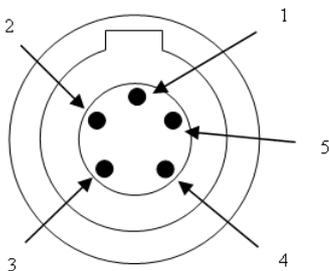
Steel Range

Model	Size	A	B	C	D	E	F	G
TSF-200	200 Nm	75	100	38	15	3	83	8,2
TSF-500	500 Nm	75	100	38	15	3	83	8,2
TSF-1k	1.0 kNm	90	130	50	19	6	108	10,2
TSF-2.5k	2.5 kNm	90	130	50	19	6	108	10,2
TSF-5k	5 kNm	190	205	90	32	8	165	16,2
TSF-10k	10 kNm	190	205	90	32	8	165	16,2
TSF-20k	20 kNm	216	250	102	32	8	203	20,5
TSF-30k	30 kNm	226	355	152	50	8	280	26
TSF-50k	50 kNm	226	355	152	50	8	280	26
TSF-75k	75 kNm	226	335	152	50	9	280	26

Aluminium Alloy Range

Model	Size	A	B	C	D	E	F	G
TSFA-50	50 Nm	60	75	32	15	3	60	6,5
TSFA-100	100 Nm	60	75	32	15	3	60	6,5
TSFA-200	200 Nm	75	100	38	15	3	83	8,5
TSFA-500	500 Nm	75	100	38	15	3	83	8,5
TSFA-1k	1.0 kNm	90	130	50	19	6	108	10,5
TSFA-2k	2.0 kNm	90	130	50	19	6	108	10,5
TSFA-3k	3.0 kNm	120	160	70	22	7	130	12,5
TSFA-4k	4.0 kNm	120	160	70	22	7	130	12,5

Wiring Details



PIN	Designation
1	Excitation (+)
2	Excitation (-)
3	Signal (-)
4	Signal (+)
5	N/C



Locations

UK - Watling Drive, Hinckley, Leicestershire LE10 3EY
 USA - 1260 11th Street West, Milan, Illinois 61264
 Germany - Im Rank 5, 73655 Plüderhausen

