



## Torque Sensors **STS Series**

- » **Plug & Play Operation**  
DFS II-R-ND Gauge
- » **Accuracy up to 0.3% FS**
- » **NIST Calibration with Data**
- » **1 Year Warranty**



The CHATILLON® STS Series torque sensors are full-bridge strain gauge sensors complete with 15-pin plug. These sensors are used exclusively with the Chatillon DFS II-R-ND Series digital indicator. The sensor's torque values and sensitivity factors are stored in memory within the sensor plug. When connected to a DFS II-R-ND indicator, the capacity and calibration points are automatically recognized by the instrument. The instrument then becomes a full-featured torque measurement instrument. The STS Series torque sensor meets ASTM E4 and BS EN ISO 7500 part 1 for a  $\pm 0.3\%$  accuracy sensor. The sensors are connected to the DFS II-R-ND with a retractable cord that extends fully to nearly 9 ft. (3 m).

### Specifications

Accuracy:	up to $\pm 0.3\%$ full scale
Input Resistance:	1100 ohms $\pm 100$
Output Resistance:	1000 ohms $\pm 100$
Rated Output:	2.0 mV/V
Safe Overload:	150% full scale
Non-Linearity:	$\pm 0.15\%$ full scale
Hysteresis:	$\pm 0.15\%$ full scale
Zero Balance:	$\pm 1.0\%$ full scale
Operating Temperature:	40 to 110°F (5 to 45°C)
Instrument Weight:	1 lb (0.5 kg)
Shipping Weight:	1.5 lbs (0.7 kg)



*STS Sensor attached to the DFS II-R-ND gauge for torque measurement.*

**ISO 9001 Manufacturer**

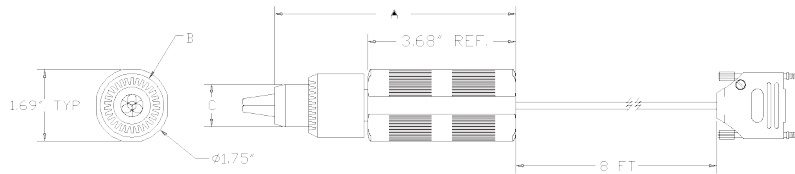
Specification Sheet  
SS-STs Series

## Ordering

Model	oz-in	lbf-in	kg-cm	N-cm	N-m
<b>STS-0003</b>	50 x 0.005	3 x 0.0005	3.5 x 0.005	35 x 0.005	0.35 x 0.0001
<b>STS-0012</b>	192 x 0.02	12 x 0.002	12.5 x 0.002	125 x 0.02	1.25 x 0.0002
<b>STS-0050</b>	800 x 0.1	50 x 0.005	50 x 0.005	500 x 0.05	5 x 0.0005
<b>STS-0100</b>	-	100 x 0.01	100 x 0.01	1000 x 0.1	10 x 0.001
<b>STS-0200</b>	-	200 x 0.02	200 x 0.02	2000 x 0.2	20 x 0.002



STS sensor attached to the B200308 torque fixture for measuring cap torque strength.



Capacity	A	B	C	Sample Size
50 oz-in	5.62"	1.25"	1.0"	1/16 - 3/8"
12 lb-in	6.0"	1.62"	1.2"	5/64 - 1/2"
50 lb-in	6.0"	1.62"	1.2"	5/64 - 1/2"
100 lb-in	6.0"	1.62"	1.2"	5/64 - 1/2"
200 lb-in	6.0"	1.62"	1.2"	5/64 - 1/2"

ISO 9001/2000  
ISO/IEC17025  
Manufacturer

### AMETEK Test & Calibration Instruments

A business unit of AMETEK Measurement & Calibration Technologies offering the following industry leading brands for test and calibration instrumentation.

### Chatillon Force Measurement

Chatillon has been a hallmark in the industry since 1835. The hand held gauges and motorized testers have earned their reputation for quality, reliability and accuracy and they represent the de facto standard for force measurement.

### Lloyd Instruments

#### Materials Testing Solutions

Materials testing machines and software from Lloyd Instruments guarantee the highest level of performance and capability for production testing, quality control, laboratory testing, research and education to provide expert materials testing solutions.

#### Davenport Polymer Test Equipment

Allows critical polymer parameters to be determined, including melt flow index and melt flow rate, intrinsic viscosity (IV) measurement of moisture-sensitive PET polymers and polymer density measurement.

#### Texture Analysers

The comprehensive program provides the platform to perform rapid, general food testing and detailed texture analysis on a diverse range of foods.

### Newage Testing Instruments

Newage offers a comprehensive range of hardness testers, durometers, optical systems and software for measurement, data acquisition and analysis.

### JOFRA Calibration Instruments

The inventor of the portable high precision dry-block temperature calibrators. The calibration instruments program also covers precision thermometers and temperature baths, temperature sensors hand held instruments for pressure calibration and process signal calibrators for easy control loop calibration, measurements and simulation.

### M&G Pressure Testers & Pumps

Pneumatic floating-ball or hydraulic piston dead weight testers with accuracies to 0.015% of reading.

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