

CS14

Wet/Wet Differential Pressure Transducer

FEATURES

- Differential pressures up to 300 PSI
- Line pressures up to 500 PSI
- 316L SS diaphragm / oil filled sensor element
- Bi-directional pressure ranges available

APPROVALS/CERTIFICATIONS

- CE

GREAT FOR....

- Filtration
- Cryogenic bulk tank level measurement
- Tank level monitoring



About the CS14

The **CS14 Wet/Wet Differential Pressure Transducer** is designed for various applications including filtration and tank level monitoring. A 316L SS oil filled sensor element provides excellent stability over a wide operating temperature range while offering corrosion resistance against various liquids and gases. The compact design makes it a perfect solution for differential measurement applications in confined spaces. Configurable options include differential pressure ranges up to 300 PSI, various voltage and 4-20mA loop powered output signals and both male and female 1/4" NPT process connections.

Versatile Differential Pressure Measurement

The **CS14 Wet/Wet Differential Pressure Transducer** is the ideal solution for differential pressure measurement in industrial applications such as filter condition monitoring, sealed tank level measurement, and flow measurement across an orifice.

The CS14 features a fully welded design without any internal O-rings or seals, allowing for **wet/wet, wet/dry, or dry/dry applications**.

Differential pressures are available as low as 1 PSID all the way up to 300 PSID, in **both uni-directional and bi-directional**, making the CS14 an excellent solution for a wide variety of applications.



SPECIFICATIONS

Performance

Accuracy @ 25°C:*	≤ ± 0.25% BFUL ≤ ± 0.5% BFUL (2 PSI & below)
Stability (1 Year):	≤ ±0.25% of FS
Pressure Cycles:	4 million
Max Line Pressure:**	500 PSI
Max Differential Pressure:	300 PSI
Overpressure:***	2X or 500 PSI, whichever is less, configured differential pressure
Burst Pressure:***	3X configured differential pressure

* Accuracy includes non-linearity, hysteresis and non-repeatability

** Max line pressure is the highest common mode pressure that can be applied to the sensor without damage.

*** Overpressure and burst pressure are the maximum differential pressure that can be applied to the high or low side before damage to the sensor will occur.

Thermal

Operating Temperature:	-40 to +105°C
Compensated Temperature:	0 to +55°C
Storage Temperature:	-40 to +125°C
TC Zero:	≤ ± 1% of FS ≤ ± 2% of FS (2 PSI & below)
TC Span:	≤ ± 1% of FS ≤ ± 2% of FS (2 PSI & below)

Environmental

EMI/RFI Protection:	Yes
IP Rating:*	IP65 minimum
Vibration:	10g, 20 to 5000Hz
Shock:	100g, 11msec, 1/2 sine

* IP Rating is dependent on electrical termination selected. Contact factory for more information.

* IP Rating applies when electrical connector is attached with the appropriate ingress protection.

Electrical (Current)

Outputs:	4-20mA
Excitation:	10-28VDC
Current Consumption:	20mA, typical
Output Load:	0-800 Ohms @ 10-28VDC
Frequency Response (min):	~250Hz
Zero Offset (of FS):	≤ ± 0.5% typical ± 1% max
Span Tolerance (of FS):	≤ ± 0.5% typical ± 1% max

Electrical (Voltage)

Outputs:	1-5V 0-5V (3-wire)
Excitation:	10-28VDC
Current Consumption:	<10mA
Output Load:	5K Ohms, min
Frequency Response (min):	~1kHz
Zero Offset (of FS):	≤ ± 0.5% typical ± 1% max
Span Tolerance (of FS):	≤ ± 0.5% typical ± 1% max

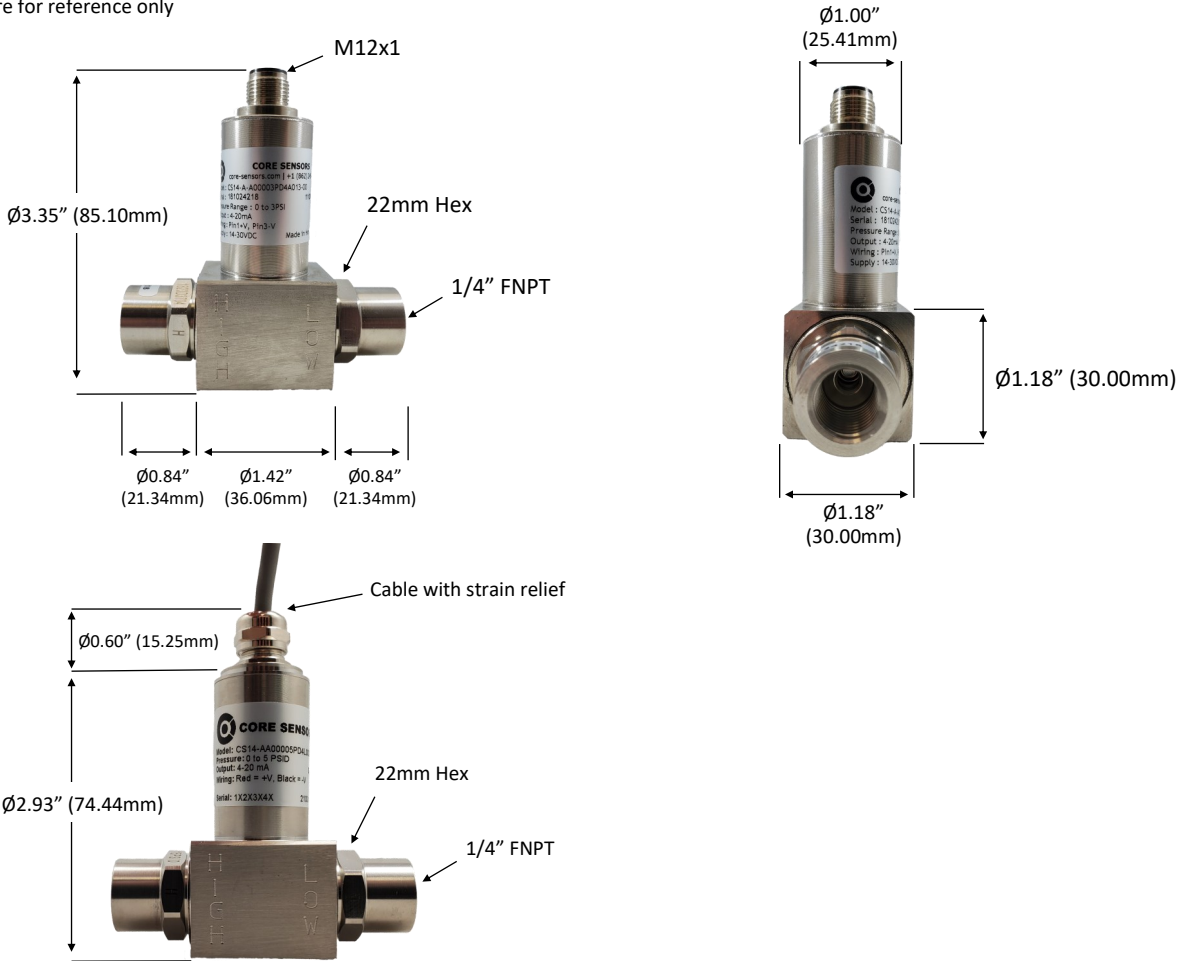
Electrical (Ratiometric Voltage)

Outputs:	0.5-4.5V ratiometric
Excitation:	5VDC +/- 0.5V
Current Consumption:	<10mA
Output Load:	5K Ohms, min
Frequency Response (min):	~1kHz
Zero Offset (of FS):	≤ ± 0.5% typical ± 1% max
Span Tolerance (of FS):	≤ ± 0.5% typical ± 1% max

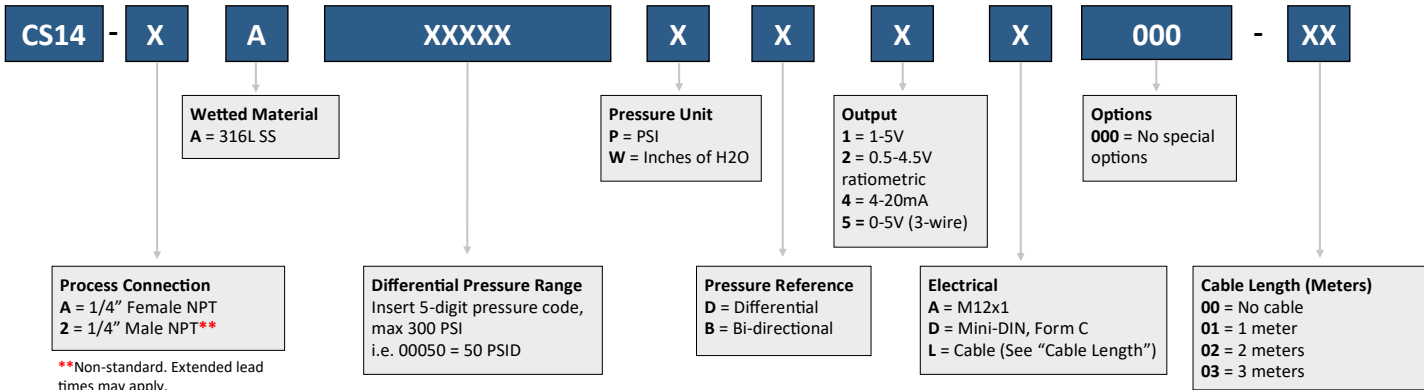
For wiring information, visit core-sensors.com/wiring

DIMENSIONS

*Dimensions are for reference only



MODEL NUMBER CONFIGURATION



Ordering Example: CS14-AA00010PD4A000-00 (1/4" Female NPT, 316L SS, 0-10 PSI differential, 4-20mA, M12x1)
 Not all configurations are available. Our sales team can recommend the closest available configuration based on your requirements.
 Contact Core Sensors for configurations not shown.
 Visit our [How To Buy](#) page or [contact us](#) for a quote.

Warranty information can be found online at core-sensors.com.

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