

## Pillar compression load cells



V1.0



### Strainstall's pillar load cells are highly adaptable to a large number of applications including challenging environments.

These high strength stainless steel compression load cells are fully environmentally protected making them both reliable and durable.

Each pillar load cell is fitted with a domed loading cap to greatly reduce the effect of offset loads and a base plate can be supplied for mounting purposes. The load cell's cable is fitted via an integral connector to allow for on-site mating, removing the need for handling large lengths of heavy duty cable whilst positioning the load cells.

#### Options

- Cabled or wireless
- Hazardous area Zone 0, 1 and 2
- Subsea - with ROV / diver mateable connectors
- Bespoke design
- Optional loading cap

#### Features and benefits

- Robust construction
- Long design life
- Highly accurate
- Fully welded and hermetically sealed
- Larger sizes include built in handles for ease of positioning

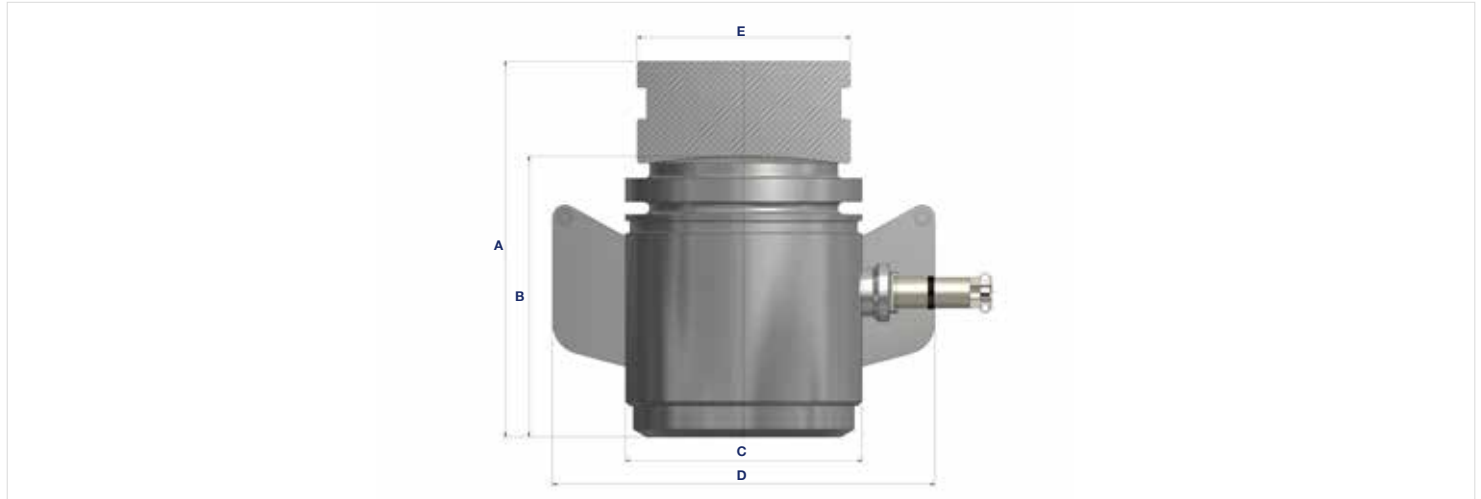
Typical specifications	mV/V output	mA output	External wireless interface
Rated load	As required		
Proof load	150% of rated load		
Non linearity	< ± 0.15% of full scale		
Non repeatability	< ± 0.05% of full scale		
Zero balance	< ± 0.05% of full scale		
Environmental protection	As required	IP66	
Safety factor	As required		
Operating temperature	-20°C to +60°C		
Storage temperature	-30°C to +80°C		
Cable connection	Gland or connector		N/A
Cable length	5m as standard		N/A
Output signal	mV/V	4-20mA	Wireless (Input signal mV/V)
Electrical connection	4 core	2 or 3 wire	N/A
Recommended excitation voltage	10V	N/A	N/A
Maximum excitation voltage	15V	N/A	N/A
Recommended supply voltage	N/A	24V	N/A
Maximum excitation voltage	N/A	30V	N/A
Bridge resistance	700 Ohm	N/A	N/A
Sensitivity	1.5mV/V - 2.0V/V nominal	N/A	N/A
Data logging	N/A	N/A	In interface
Battery type	N/A	N/A	3 x D
Active battery life	N/A	N/A	Up to 500 hours
Standby battery life	N/A	N/A	Up to 1700 hours
Telemetry frequency	N/A	N/A	2.4Ghz ISM
System range	N/A	N/A	Up to 350m
Sampling rate	N/A	N/A	10Hz (500Hz max)

Due to continuous development, Strainstall reserves the right to change specifications without notice.



## Pillar compression load cell typical dimensions

### Pillar compression load cell



Pillar compression load cell typical dimensions						
Load rating (tonnes)	100	200	300	500	700	1000
Weight (kg)	8.5	18	28	75	86	160
A mm	170	215	240	320	350	400
B mm	127	163	179	248	281	315
C mm	100	126	151	216	216	272
D mm	184	210	244	320	320	246
E mm	86	112	136	196	196	246



**Experts in bespoke load monitoring solutions, Strainstall can design and manufacture load measurement equipment to suit your specific requirements.**

Strainstall's enviable reputation for technical innovation is built on delivering quality products and services that have been engineered to the highest standards. We offer bespoke product design and manufacturing and can also provide complete project management capability to manage delivery to time, quality and cost, while ensuring to strict safety regulations.

We are a leading supplier of hazardous area approved equipment, including load cells, load pins and amplifiers, as well as full asset monitoring systems. All of our hazardous area products are fully certified by SGS Baseefa - the leading, internationally recognised certification body for explosion protected equipment.

We will work with you to fully understand your application and monitoring objectives using our significant experience to deliver improved operational performance.



**We are always happy to help find the appropriate, tailored solutions for your business needs. If you have any requests or suggestions please do not hesitate to contact us.**