Unit B2, Stuart Road, Altrincham Business Park, Altrincham WA14 5GJ, United Kingdom. budenberg.co.uk sales@budenberg.co.uk +44 (0)161 777 7300

Model: 510

For power cables. The model 510 Watertight HV cable Gauge has to continually operate in the remote severe environments where robustness coupled with repeatability are paramount.

The model 510 is designed to meet many International and regulatory standards including ESI 50-1 that requires the gauges to be fully immersible under water and are Type Tested to industry standard NGTS 3.5.9 Issue 2\*.

Units can be supplied fitted with up to three electrical contacts whose operation can be independently defined and adjusted by use of a removable key. Electrical connections are taken via a three metre PVC insulated and sheathed cable from the side of the case, the wires are colour coded for ease of installation.

\* Certification available upon request

#### Sizes

150 mm (6")

### Mounting

Direct / Surface

#### Case & Bezel

Grey Cast Iron, grey polyester powder coated, with back flange

### Scale Ranges

0 to 1 Bar up to 0 to 25 Bar

Dual Scale units or custom scales can be provided

### Pressure Element

Phosphor Bronze seamless bourdon tube, with Brass body and connection

### Overload

Units will withstand overload pressure up to 130% FSD.

## **Pressure Connection**

3/8" BSF

Other connections available, please contact our Sales Office

## **Electrical Contacts**

Available with independent single, double or triple contacts (see reverse of datasheet for more details)

### **Accuracy Class**

1% of FSD as defined in EN837-1 NGTS 3.5.9 Issue 2\* Type Tested.

### Temperature

Operating: -20 to +90 Degrees C Storage: -40 up to + 100 Degrees C

### Temperature Effect

Variation in indication caused by temperature shall not exceed  $\pm 0.04 \times (t_2 - t_1)\%$  of the span where:

 $t_1$  is the reference ambient temperature in degrees Celsius  $t_2$  is the ambient temperature in degrees Celsius

# WATERTIGHT PRESSURE GAUGE FOR HIGH VOLTAGE CABLES



Dial

White anodised Aluminium with black scales Option: Dual scales or special dial markings are available

#### Pointe

Black anodised aluminium

### Movement

Stainless Steel

### Window

Acrylic Plastic Window

### **Environmental Rating**

IP68 as defined in EN 60 529

### Traceability

All instruments are individually calibrated and have an unique Serial Number printed on the dial. A Certificate of conformity traceable to National Standards is supplied free of charge.

### Certification available

BS EN 10204 3.1B Material Certification Point by point Certificate

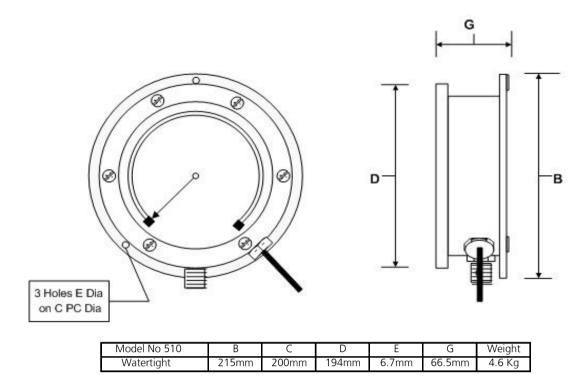
### Safety

All units are manufactured to comply with EN 837-1 and other regulatory standards including P.E.D.

### Installation instructions

Refer to EN 837-2

Dimensions Model: 510



#### **Electrical Contacts**

Units can be supplied with up to three independently settable Model 144 electric contacts, each of which can have a different mode of operation as follows:-

Make on Rising Pressure MR - contacts normally open but close when rising pressure achieves the pressure setting. Break on Rising Pressure BR - contacts normally closed but open when rising pressure achieves the pressure setting. Make on Falling Pressure MF - contacts normally open but close when rising pressure achieves the pressure setting. Break on Falling Pressure BF - contacts normally closed but open when rising pressure achieves the pressure setting.

### Standard Variants

The following are standard variants readily available based on configurations supplied to many of the world's large cable manufacturers

Option 1 - No electric contact, 3/8"BSP connection, range as specified by customer.

Option 2 - Gauge fitted with 144MF, Make on Fall magnetically assisted electric contacts Spec R/3183, with 3 metres of PVC insulated and sheathed cable from side of case. 3/8"BSP connection, range as specified by customer.

Option 3 - Gauge fitted with 144 MF/MF, Double Make on Fall magnetically assisted electric contacts Spec R/3152, of PVC insulated and sheathed cable from side of case. 3/8 BSP connection, range as specified by customer.

Option 4 - Gauge fitted with 144 MF/MF/MR, Triple Make on Fall and Make on Rise magnetically assisted electric contact with 3 metres of PVC insulated and sheathed cable from side of case. 3/8"BSP connection, range as specified.

### **Accessories**

### Transmitters

We have a range of standard and 'Smart' Transmitters that can be used in combination with the Watertight Cable Gauges - See separate Datasheets.

### Valves and Adaptors

A full range of Needle and Ball Valves to fit the Watertight Cable Gauges - See separate Datasheets.