

Viewline Voltmeter

Description

Indication of Battery power



Picture: Voltmeter

Features

- _ Integrated Warning LED.
- _ Changeable Frontbezels.
- _ LED Illumination
- _ Flush mount possibility
- _ High reliability









Concept

| | |
|--------------|---|
| Housing | PC; flame retarding (UL94) |
| Bezel | PC or ABS; several colors and shapes (see table) |
| Lens | PMMA; double lens |
| Dial | backlit; different colors (see table) |
| Pointer | backlit, white on black dials; red on white dials |
| Illumination | Dial: LED amber (605nm) Pointer: LED red (632nm) |
| Warning LED | red (632nm) |
| Mounting | spinlock Nut; locking height 0,5mm – 20mm, optional Studs and Bracket; locking height 2 – 15mm |
| Connection | 8 pin MQS connector system |

Technical Data

| | | |
|------------------------------|--|---|
| Installation depth | 50mm | |
| Installation diameter | 52mm | |
| Deflection angle | 90° | |
| Operating Voltage | 8 – 16 Volt, (18-32V) | |
| Accuracy | < 3,6 angular degrees | |
| Current consumption | < 140 mA, including Warning LED | |
| Operating temperature | -30°C to +80°C; plated bezels (chrome) -30°C to +70°C | |
| Storage temperature | -40°C to +80°C for 48h; plated bezels (chrome) -40°C to +70°C +90°C for 1h | |
| Temperature shock | Range | -40°C to +85°C; plated bezels (chrome) -40°C to +70°C |
| | Transformation time | 10 seconds |
| | Retention time | 2h |
| Climatic test | Range | +25°C to +55°C |
| | Rel. Humidity | 95% |
| EMC in conformity with | DIN_EN 61000-6-3 DIN_EN 61000-6-1 DIN_EN 61000-6-4 DIN_EN 61000-6-2 | |
| Standards | EN 60945 | |
| | GL, Category C, F (under preparation) | |
| Vibration | Sinus 2g; 10-500Hz; duration 16h | |
| | Noise 3g; 10-1000Hz, duration 8h | |
| Mechanical shock | continuous | 25g; 6ms; 1Hz |
| | Single shock | 100g; 11ms |
| | Free fall | 1m; 3 times |
| Chemical resistance against- | preservative agent - preservative agent remover - cold cleaner - methylated spirit - interior cleaner - drinks containing caffeine and tannin | |
| Nominal position | NL 0 to NL 85 (DIN16257) | |
| Protection class | according to IEC 60529 | |
| | Front: IP67 (in Nominal position) | |
| | Rear: IP52 (in Nominal position) | |
| Reverse polarity protection | yes, 5 minute | |
| Over voltage protection | yes, 24V for 1 minute (12V Gauges) | |

available Gauges:

| No. packed | No. unpacked | colour | Double Scale | Measurement range | ISO Symbol | Voltage | Double lens |
|-------------|--------------|--------|--------------|-------------------|--|---------|-------------|
| A2C60100076 | A2C53191475 | black | no | 18 - 32V |  | 24V | no |
| A2C60100077 | A2C53191478 | white | no | 18 - 32V |  | 24V | no |
| A2C60100078 | A2C53191767 | black | no | 18 - 32V |  | 24V | yes |
| A2C60100079 | A2C53191769 | white | no | 18 - 32V |  | 24V | yes |
| A2C60100176 | A2C53191474 | black | no | 8 - 16V |  | 12V | no |
| A2C60100177 | A2C53191476 | white | no | 8 - 16V |  | 12V | no |
| A2C60100178 | A2C53191766 | black | no | 8 - 16V |  | 12V | yes |
| A2C60100179 | A2C53191768 | white | no | 8 - 16V |  | 12V | yes |

Accessories:

| | |
|--------------------|--|
| A2C59510854 | VL Mounting Kit (studs and brackets) 52, 85, 110mm |
| A2C59510864 | VL Mounting bracket flush mount |
| A2C53215640 | VL Sealing Ring 52mm flush mount |
| A2C59510847 | Bush housing, 8-pin |
| A2C53324664 | Protective connector cap, 8-pin |
| Tyco No. 539635-1 | Hand pliers |
| Tyco No. 539682-2 | Tool for hand pliers. |
| Tyco No. 1355718-1 | Single contacts 0.14 – 0.22 mm ² tin plated |
| Tyco No. 963729-1 | Single contacts 0.5 – 0.75 mm ² tin plated |
| Tyco No. 1355717-1 | Strip 0.14 – 0.22 mm ² tin plated |
| Tyco No. 928999-1 | Strip 0.25 – 0.5 mm ² tin plated |
| Tyco No. 963715-1 | Strip 0.5 – 0.75 mm ² tin plated |

Bezels 52mm

| | black | black nickel* | brush aluminum* | chrome | gold* | white |
|----------|-------------|---------------|-----------------|-------------|-------------|-------------|
| flat | A2C53186040 | A2C53293468 | A2C53293480 | A2C53186023 | A2C53293482 | A2C53186022 |
| round | A2C53186027 | A2C53293494 | A2C53293495 | A2C53186029 | A2C53293496 | A2C53186028 |
| triangle | A2C53186024 | A2C53293545 | A2C53293546 | A2C53186026 | A2C53293548 | A2C53186025 |

* Only on request, no part off standard portfolio