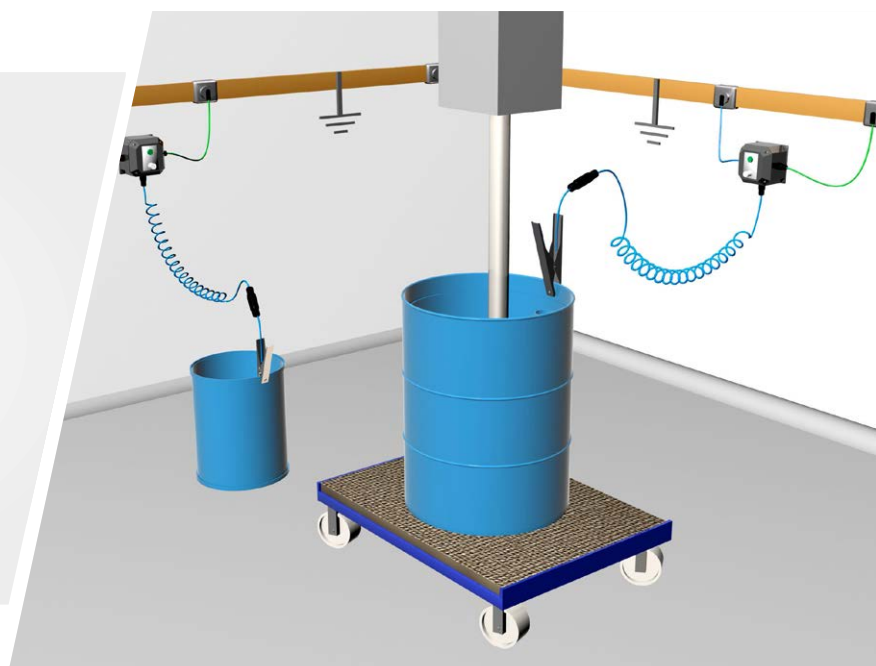


Bond-Rite® REMOTE

Continuous Ground Loop Monitoring with Visual Indication



Bond-Rite Remote Static Dissipative GRP Enclosure



The Bond-Rite REMOTE indicator station houses the ground loop monitoring circuit and a bright green LED which pulses continuously when it detects that the resistance between the conductive metal equipment to be grounded and the site's verified earth ground (e.g. copper tape) is 10 Ohms or less.

Once connected the Bond-Rite REMOTE continuously monitors the loop resistance of the circuit between the equipment and the verified ground point (e.g. wall-mounted earth bar).

The pulsing green LED provides process operators with a continuous visual reference point that enables them to monitor the ground status of conductive metal equipment capable of accumulating static electricity.

The standard GRP enclosure is static dissipative and suitable for general processing environments. The stainless steel enclosure is designed to cater for hygienic or corrosive environment specifications.

Both enclosures provide a minimum IP 65 degree of ingress protection and are suitable for both indoor and outdoor installation.

The Bond-Rite REMOTE can be powered with an intrinsically safe 9V battery (included) or an external 230/115 V AC power supply which can power up to 10 individual indicator stations.

The Bond-Rite REMOTE is an ideal solution for applications and installations where interlocks with the process are not possible or required.

Please Note:

The Bond-Rite REMOTE does not check if the site's verified earth grounding point is connected to the general mass of earth. It is the responsibility of the site owner to ensure that their installed ground network is connected to general mass of earth in line the relevant national standards.

Typical Applications

- Filling and dispensing to/from metal containers, including drums, waste drums, mixing vessels
- Grounding equipment used in mixing and blending operations

Bond-Rite® REMOTE

Continuous Ground Loop Monitoring with Visual Indication

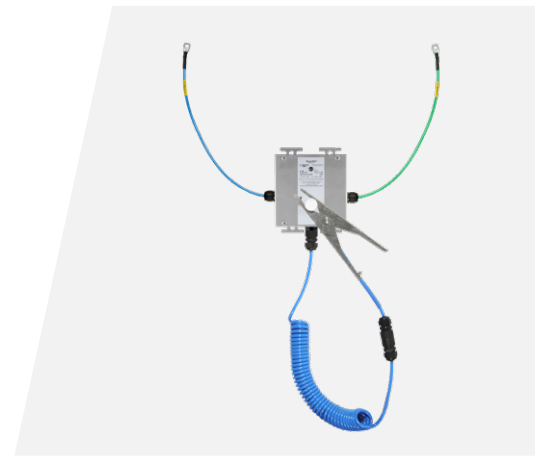
Bond-Rite® REMOTE (EP)

For process applications that require grounding for more than 6 hours per day, the **Bond-Rite REMOTE EP** (EP = Externally Powered) utilises 230 V AC or 115 V AC mains supply / line power to feed the monitoring circuit of each indicator station.

The external power supply can be located in both the 'hazardous' (Zone 2/22 / Div. 2) and 'non-hazardous' areas, with the indicator stations mounted in the zoned / HAZLOC area (Zone 0 / Div.1) or lower.

When used in conjunction with the Newson Gale Universal Power Supply, up to 10 **Bond-Rite REMOTE** indicator stations can be powered simultaneously. This enables users to actively monitor up to 10 items of plant equipment susceptible to charge accumulation (e.g. drums) independently of each other.

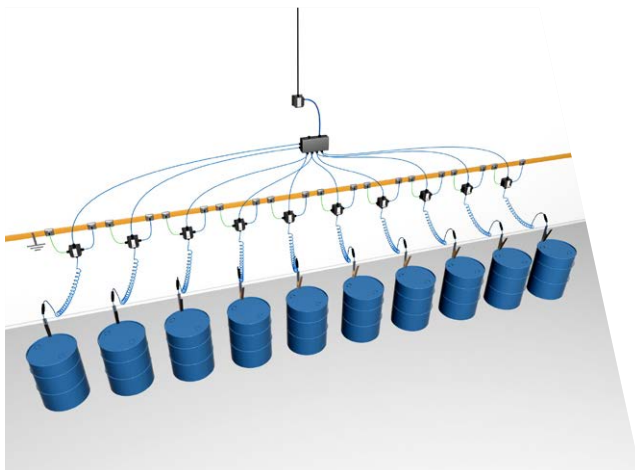
An additional advantage of this configuration is that the external power supply itself can be installed within the hazardous area. For more detailed information please refer to the ATEX / IECEx and cCSAus technical specification pages.



Bond-Rite REMOTE
Stainless steel enclosure

Features and Benefits

- **Highly visible LED** housed in wall mounted enclosure indicates to operators when a resistance threshold of 10 Ohms or less has been achieved.
- **Tungsten carbide teeth** bite through product deposit build up, rust & drum coatings.
- **Stainless steel clamps** designed to withstand use in tough chemical processing and industrial environments.
- **10 Ohms loop resistance** monitoring based on National and International Standards and Recommended Practices*.
- Indicator station mounted **stowage pin** provides operators with location to return the grounding.



Ideal for multiple drum filling applications

***IEC/TS 60079-32-1:2017**

“Explosive atmospheres: Electrostatic hazards, guidance”

***PD CLC/TR 60079-32-1:2018**

“Explosive atmospheres: Electrostatic hazards, guidance”

***NFPA 77:2019**

“Recommended Practice on Static Electricity”

* Always check for and read the latest version of the International Standards and or Recommended Practices.

Bond-Rite® REMOTE (GRP)

Technical Specification

Bond-Rite REMOTE (GRP) - Battery Powered and Mains Powered

Ingress Protection	IP65
Ambient Temperature Range	-40°C to +60°C
Monitored Loop Resistance	Nominally $\leq 10 \Omega$ ($\pm 10\%$)
Indicator Lamp	LED: 1 green
Battery Supply Option	Varta 6122 E-Block (9V Lithium-Manganese Battery) supplied with unit
Power Supply Option	Newson Gale Universal Power Supply
Enclosure Material	Glass Reinforced Plastic (carbon loaded)

Hazardous Area Certification

Europe / International:

IECEX

Ex ia IIC T4 Ga
Ex ta IIIC T135°C Da
Ta = -40°C to +60°C
IECEX EXV 19.0061X
IECEX Certifying Body: ExVeritas

ATEX

II 1 G
II 1 D
Ex ia IIC T4 Ga
Ex ta IIIC T135°C Da
Ta = -40°C to +60°C
ExVeritas 19ATEX0547X
ATEX Notified Body: ExVeritas

UKCA Ex

II 1 G
II 1 D
Ex ia IIC T4 Ga
Ex ta IIIC T135°C Da
Ta = -40°C to +60°C
ExVeritas 21UKEX0835X
UKCA Ex Approved Body: ExVeritas

CCC

Ex ia IIC T4 Ga
Ex tD A20 IP65 T135°C
2021312304001043
Approved Body: CNEX

KCs (Gas)

Ex ia IIC T4 Ga
Ta = -40°C to +60°C
22-AV4B0-0300X
Approved Body: KOSHA

KCs (Dust)

Ex ta IIIC T135°C Da
Ta = -40°C to +60°C
22-AV4B0-0301X
Approved Body: KOSHA

North America Version Available:

NEC 500 / CEC (Class & Division)

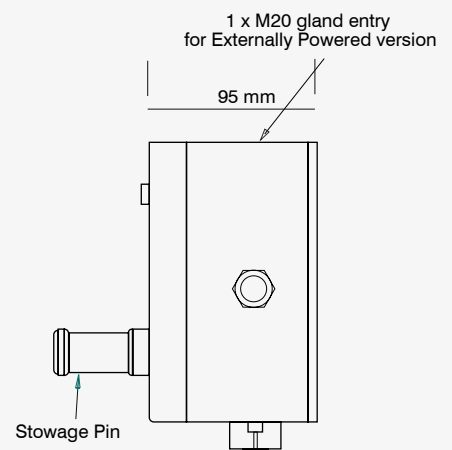
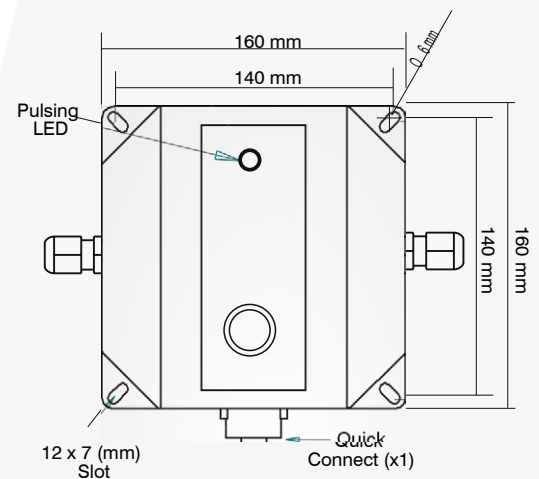
Intrinsically safe equipment Exia for use in:
Class I, Div. 1, Groups A, B, C, D.
Class II, Div. 1, Groups E, F, G.
Class III, Div. 1.
Ta = -40°F to +140°F
OSHA recognised NRTL: CSA

NEC 505 & 506 (Class & Zoning)

Class I, Zone 0, AEx ia IIC T4 Ga
Class II, Zone 20, AEx iaD 20 T135°C

CEC Section 18 (Class & Zoning)

Class I, Zone 0 Ex ia IIC T4 Ga
DIP A20, IP66, T135°C



Bond-Rite® REMOTE (Stainless Steel)

Technical Specification

Bond-Rite REMOTE [Stainless Steel] - Battery Powered and Mains Powered

Ingress Protection	IP65
Ambient Temperature Range	-40°C to +60°C
Monitored Loop Resistance	Nominally $\leq 10 \Omega$ ($\pm 10\%$)
Resistance Indicator Lamp	LED: 1 green
Battery Supply Option	Varta 6122 E-Block (9V Lithium-Manganese Battery) supplied with unit
Power Supply Option	Newson Gale Universal Power Supply
Enclosure Material	Stainless steel (SS grade: 304)

Hazardous Area Certification

Europe / International:

IECEX

Ex ia IIC T4 Ga
Ex ta IIIC T135°C Da
Ta = -40°C to +60°C
IECEX EXV 19.0061X
IECEX Certifying Body: ExVeritas

ATEX

II 1 G
II 1 D
Ex ia IIC T4 Ga
Ex ta IIIC T135°C Da
Ta = -40°C to +60°C
ExVeritas 19ATEX0547X
ATEX Notified Body: ExVeritas

UKCA Ex

II 1 G
II 1 D
Ex ia IIC T4 Ga
Ex ta IIIC T135°C Da
Ta = -40°C to +60°C
ExVeritas 21UKEX0835X
UKCA Ex Approved Body: ExVeritas

CCC

Ex ia IIC T4 Ga
Ex tD A20 IP65 T135°C
2021312304001043
Approved Body: CNEC

KCs (Gas)

Ex ia IIC T4 Ga
Ta = -40°C to +60°C
22-AV4BO-0300X
Approved Body: KOSHA

KCs (Dust)

Ex ta IIIC T135°C Da
Ta = -40°C to +60°C
22-AV4BO-0301X
Approved Body: KOSHA

North America Version Available:

NEC 500 / CEC (Class & Division)

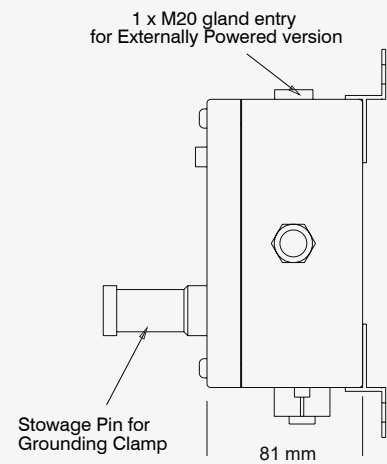
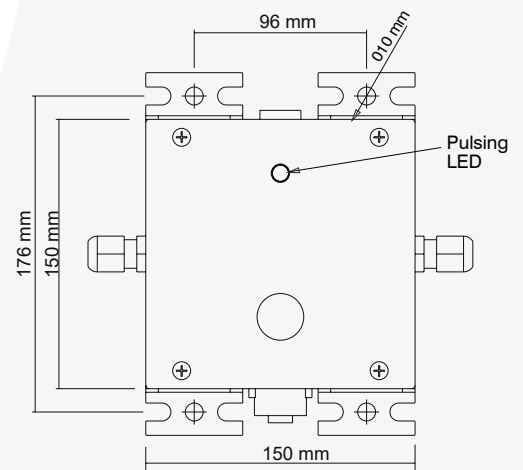
Intrinsically safe equipment Exia for use in:
Class I, Div. 1, Groups A, B, C, D.
Class II, Div. 1, Groups E, F, G.
Class III, Div. 1.
Ta = -40°F to +140°F
OSHA recognised NRTL: CSA

NEC 505 & 506 (Class & Zoning)

Class I, Zone 0, AEx ia IIC T4 Ga
Class II, Zone 20, AEx iaD 20 T135°C

CEC Section 18 (Class & Zoning)

Class I, Zone 0 Ex ia IIC T4 Ga
DIP A20, IP66, T135°C



Bond-Rite® REMOTE Universal Power Supply

Technical Specification

Universal Power Supply Unit

Ingress Protection	IP66
Ambient Temperature Range	-40°C to +55°C
Power Supply	115 V or 230 V AC, 50-60 Hz
Enclosure Construction	Glass Reinforced Plastic (carbon loaded)

Hazardous Area Certification

Europe / International:

IECEX

Ex ec [ia Ga] IIC T4 Gc
 Ex tb [ia Da] IIIC T70°C Db
 Ta = -40°C to +55°C
 IECEX EXV 19.0063
 IECEX Certifying Body: ExVeritas

ATEX

II 3(1)G
 II 2(1)D
 Ex ec [ia Ga] IIC T4 Gc
 Ex tb [ia Da] IIIC T70°C Db
 Ta = -40°C to +55°C
 ExVeritas 19ATEX0551
 ATEX Notified Body: ExVeritas

UKCA Ex

II 3(1)G
 II 2(1)D
 Ex ec [ia Ga] IIC T4 Gc
 Ex tb [ia Da] IIIC T70°C Db
 Ta = -40°C to +55°C
 ExVeritas 21UKEX0836
 UKCA Ex Approved Body: ExVeritas

CCC

Ex nA [ia Ga] IIC T4 Gc
 Ex tD A21 IP66 T70°C
 2021312303000497
 Approved Body: CNEC

KCs (Gas)

Ex ec [ia] IIC T4 Gc(Ga)
 Ta = -40°C to +55°C
 22-AV4BO-0302X
 Approved Body: KOSHA

KCs (Dust)

Ex tb IIIC T70°C Db IP66
 Ta = -40°C to +55°C
 22-AV4BO-0303X
 Approved Body: KOSHA

North America Version Available:

NEC 500 / CEC (Class & Division)

Associated Equipment [Exia] for use in:
 Class I, Div. 2, Groups A, B, C, D;
 Class II, Div. 2, Groups E, F, G;
 Class III, Div. 2.

Providing Intrinsically safe circuits for:

Class I, Div. 1, Groups A, B, C, D;
 Class II, Div 1, Groups E, F, G;
 Class III, Div 1.

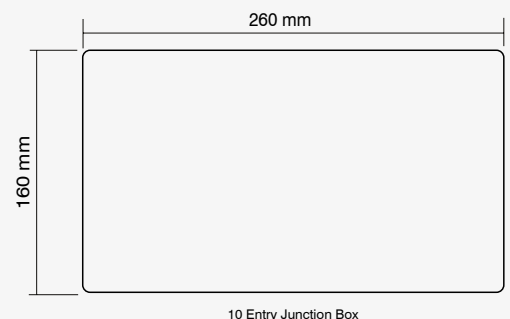
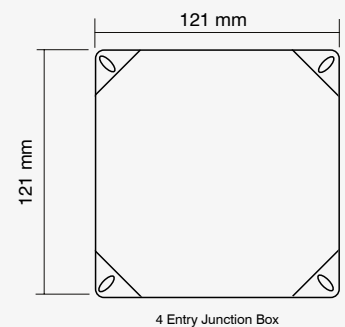
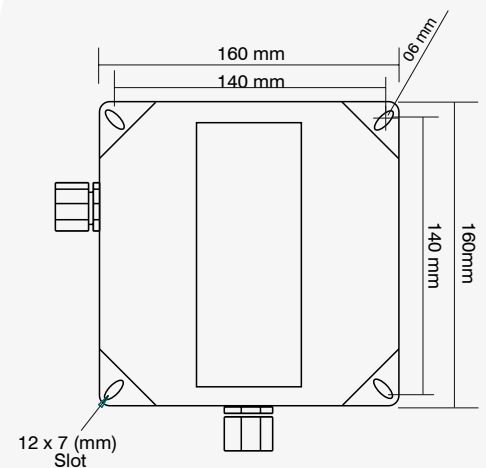
Ta = -13°F to +131°F
 OSHA recognised NRTL: CSA

NEC 505 & 506 (Class & Zoning)

Class I, Zone 2 (Zone 0) AEx nA [ia] IIC T4

CEC Section 18 (Class & Zoning)

Class II, Zone 22, AEx tD [iaD] 22 T70°C
 Class I, Zone 2 (Zone 0), Ex nA [ia] IIC T4
 DIP A22 T70°C



Additional Certification

EMC Tested

to EN 61000-6-2, EN 61000-6-3
 to FCC - Part 15

Bond-Rite® REMOTE

Equipment Options

Cable Length Options

Equipment specifiers can order the Bond-Rite® REMOTE with 2-pole Cen-Stat cable on standard spiral lengths of 3 m (10 ft), 5 m (16 ft) and 10 m (32 ft) of cable.

The spiral cable retracts when the clamp is not in use, ensuring the cable is neatly stowed and safely out of the way.



2-Pole Surface Mountable Connector

With this assembly operators tasked with earthing mobile process equipment will have a dedicated earthing point to attach the easy to use screw thread connector. The 'plug and play' connector can interface with all Newson Gale 2 core systems to provide earth monitoring capability on a wide range of mobile processes and equipment where generic earthing clamps cannot be used.

The conical shape design aids in the reduction of powder deposit build up over time and aids in clean down operations.

- Made using Stainless steel (SS grade: 304) with Viton O-Rings
- IP 66
- -40 °C to 60 °C
- Various lengths of straight or spiral Hytrel cable available.



Bond-Rite® REMOTE

Equipment Options

Universal Resistance Tester (URT)

The URT is designed to provide users of Newson Gale Bond-Rite static grounding systems with a means of testing the permissive resistance range on a regular basis.

The easy to use tester consists of a pair of rotary switches that enable a competent electrical person to check the resistance level at which the grounding system should be working and conduct a PASS / FAIL test at the required setting.



NOTE: For a complete Bond-Rite REMOTE EP installation, the power supply module (ER/UPS/AC) must be ordered with the required number of remote indicator stations. Up to 10 Bond-Rite REMOTE indicator stations can be powered by a single ER/UPS/AC universal power supply.

Different lengths of spiral cable available on request. Contact your local Newson Gale office, or preferred supplier, for more options.



Designed for grounding 250 litre closed drums and smaller containers



Designed for grounding 250 litre drums and larger containers

Copyright Notice

The website and its content is copyright of Newson Gale Ltd © 2020. All rights reserved.

Any redistribution or reproduction of part or all of the contents in any form is prohibited other than the following:

- you may print or download to a local hard disk extracts for your personal and noncommercial use only
- you may copy the content to individual third parties for their personal use, but only if you acknowledge the website as the source of the material

You may not, except with our express written permission, distribute or commercially exploit the content. Nor may you transmit it or store it in any other website or other form of electronic retrieval system.

Right to change

This document provides general information only and may be subject to change at any time without notice. All information, representations, links or other messages may be changed by Newson Gale at any time without prior notice or explanation.

Newson Gale is not obliged to remove any outdated information from its content or to expressly mark it as being outdated. Please seek the advice of professionals as necessary regarding the evaluation of any content.

Disclaimer of liability

The information provided in this Datasheet is provided by Newson Gale without any representations or warranties, expressed or implied, as to its accuracy or completeness. The liability of Newson Gale for any expenses, losses or actions incurred whatsoever by the recipient as a result of the use of this Datasheet shall be excluded.

Leading the way in hazardous area static control



www.newson-gale.com

7/7

United Kingdom
Newson Gale Ltd
Omega House
Private Road 8
Colwick, Nottingham
NG4 2JX, UK
+44 (0)115 940 7500
groundit@newson-gale.co.uk

United States
IEP Technologies LLC
417-1 South Street
Marlborough, MA 01752
USA
+1 732 961 7610
groundit@newson-gale.com

Deutschland
IEP Technologies GmbH
Kaiserswerther Str. 85C
40878 Ratingen
Germany
+49 (0)2102 58890
erdung@newson-gale.de