

Earthing & lightning protection Earth rod seal





# Furse earth rod seal To prevent water ingress when installing earth rods

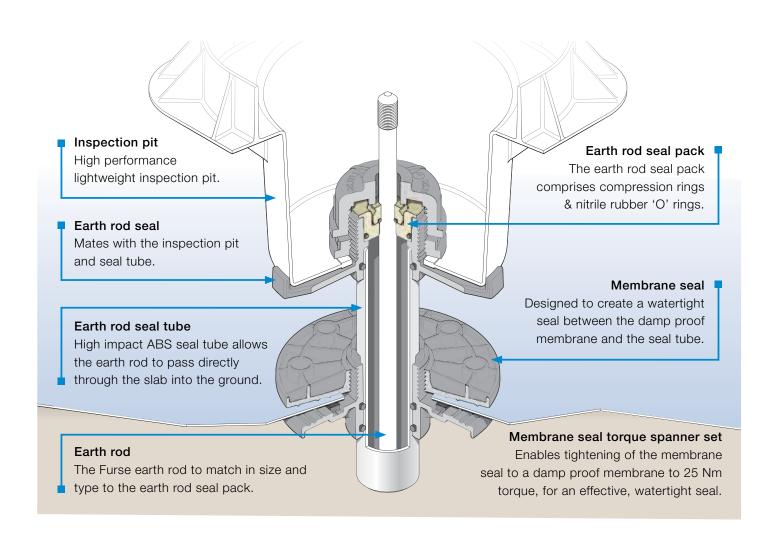
Modern building specifications often require that earth points are located within the building itself, which means that rod type earth electrodes must pass through the building's foundations or floor slab.

In such applications, where the building's damp proof membrane is pierced, it is necessary to prevent the upward seepage of water through use of a suitable sealing mechanism around each earth rod. Furse market-leading earth rod seals have offered the most effective solution to this problem for years. Now, our new earth rod seal delivers all the benefits of previous designs whilst offering the simplest, most cost effective installation to date.

The new Furse earth rod seal utilizes our removable compression seal technology, and is specifically designed to ensure a watertight seal between Furse earth rods and

commonly used damp proof membranes, without the need for adhesive, sealant or mastic. Furse lightweight inspection pits fit easily on to the seal assembly making connections to earthing conductors readily accessible, and through selection of a suitable length of seal tube, an effective seal through both shallow and deep concrete slabs can be achieved.

Complete assembly of a Furse earth rod seal around an earth rod is easily achieved using a number of core components, including an earth rod seal assembly and accessory spanners, earth rod seal pack, protective seal tube and lightweight inspection pit.



#### Key features include:

- Manufactured using a lightweight polymer for simple cost effective installation
- Corrosion resistant, preventing unnecessary maintenance costs
- Achieves a secure, watertight seal to most commonly used damp proof membranes without the use of adhesive, sealant or mastic
- Earth rod seal pack pressure tested to 80 psi or 5.5 Bar (equivalent to a 55 m head of water)
- Internal compression seals available to fit all Furse earth rod sizes and types

- Earth seal design permits removal of the earth rod seal pack if required without the risk of damage
- Designed for use with Furse high performance lightweight earth inspection pit, which eliminates the need for time consuming shuttering around the top of the earth rod
- Minimal on site assembly is required, and clear, easy to follow instructions are provided
- Conforms to IEC/BS EN 62305-3 and tested to IEC/ BS EN 62561-5: Requirements for earth electrode inspection housings and earth electrode seals



## **Standards**

IEC/BS EN 62561-5

#### Earth rod seal

		Weight each
Part no.	Description	(kg)
Earth rod seal	assembly	
ES300	Earth rod seal and membrane seal	0.75
Earth rod seal	pack	
ES300-12	Seal pack for ½" (ø 12.7 mm) Copperbond rod	0.06
ES300-58	Seal pack for %" (ø 14.2 mm) Copperbond rod	0.06
ES300-34	Seal pack for ¾" (ø 17.2 mm) Copperbond rod	0.06
ES300-15	Seal pack for ø 15 mm solid copper rod	0.06
ES300-16	Seal pack for ø 16 mm solid stainless steel rod	0.06
ES300-20	Seal pack for ø 20 mm solid copper rod	0.06
Earth rod seal	tube	
ES310-03	Seal tube, 300 mm length	0.16
ES310-05	Seal tube, 500 mm length	0.27
ES310-10	Seal tube, 1,000 mm length	0.54
ES310-15	Seal tube, 1,500 mm length	0.81
ES310-20	Seal tube, 2,000 mm length	1.08
ES310-30	Seal tube, 3,000 mm length	1.62
Polymer insp	ection pit	
PT205	Lightweight inspection pit with grey polymer lid	1.80
Accessory spa	anner set	
ES320	Membrane seal torque spanner set	0.45

- When specifying a Furse earth rod seal, ensure that all relevant components are ordered earth rod assembly, seal pack, seal tube, accessory spanner set and lightweight inspection pit. The accessory spanner set may be used for multiple earth rod seal installations
- Please specify the correct size of earth rod seal pack for the earth rod, and the correct length of protective seal tube when ordering Note: earth rod seal designed for use with clean, smooth Type 'A' damp proof membranes as defined by BS EN 13967, without the need for adhesive, sealant or mastic. For uneven, textured or tanking damp proof membranes, if installed, or where hydrostatic conditions exist, adhesive, sealant or mastic should be applied







### Contact us

#### **ABB Ltd**

Electrification Products
Tower Court
Courtaulds Way
Foleshill Enterprise Park
Coventry
West Midlands
CV6 5NX

Sales Tel: +44 (0) 333 999 9900 Sales Fax: +44 (0) 333 999 9901 E-Mail: lv.enquiries@gb.abb.com

You can find the address of your local sales unit on the ABB home page: http://www.abb.com/contacts -> Low Voltage Products & Systems

#### **ABB Furse**

Wilford Road Nottingham NG2 1EB

Tel: +44 (0) 115 964 3700 Fax: +44 (0) 115 986 0071 E-Mail: enquiry@furse.com

www.furse.com

**Note:** We reserve the right to make technical changes or modify the contents of this document without prior notice. With regard to purchase orders and/or contracts, the agreed particulars shall prevail. ABB does not accept any responsibility whatsoever for potential errors or possible lack of information in this document.

We reserve all rights in this document and in the subject matter and illustrations contained therein. Any reproduction, disclosure to third parties or utilisation of its contents – in whole or in parts – is forbidden without prior written consent of ABB.

Copyright © 2016 ABB All rights reserved

