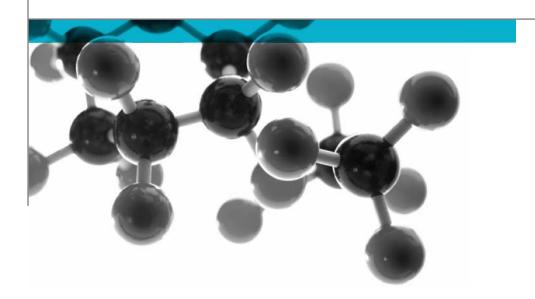
Exova Warringtonfire Holmesfield Road Warrington WA1 2DS United Kingdom T:+44 (0 1925 655116 F:+44 (0) 1925 655419 E:warrington@exova.com W:www.exova.com



Review of Fire Test Report



A Report To: Berica Cavi S.p.A.

Document Reference: 371404

Date: 4th October 2016

Issue No.: 1

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Executive Summary

Objective

To review and extend the validity period of Exova Warringtonfire Test Report No: 177605 which details the fire performance of the following product when tested in accordance with BS EN 50200: 2006.

| Generic Description | Product reference | Thickness / | Weight per unit | | |
|--|------------------------------------|--------------------|-----------------|--|--|
| | | c.s.a. | length | | |
| Cable | "Eurosafe FE 180" | 9.3mm | 128kg/km | | |
| Individual components used to manufacture composite: | | | | | |
| Conductors | "Solid Plain Annealed Copper Wire" | 1.5mm ² | 13.52kg/km | | |
| Insulation | "Special Silicone Rubber" | 0.8mm | 22.6kg/km | | |
| Outer sheath | "Special Halogen Free LSZH" | 1mm | 37.6kg/km | | |
| Please see page 4 of this test report for the full description of the product tested | | | | | |

Test Sponsor Berica Cavi S.p.A., Via della Meccanica, 2, 36040 Meledo di Sarego (VI), Italy.

Conclusion With respect to test report WF No. 177605, its contents shall remain valid until 4th

November 2018.

This review should be read in conjunction with test report WF No. 177605.

Date of Test 5th & 6th November 2008

Signatories

Responsible Officer

C. Meachin *
Technical Officer

Authorised S. Deeming *

Business Unit Head

* For and on behalf of Exova Warringtonfire.

C. Men.

Report Issued: 4th October 2016

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Client: Berica Cavi S.p.A. Issue No.:



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Review of Fire Test Report



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Test Details

Introduction

Test report WF No. 177605 relates to a test performed in accordance with the procedures defined in BS EN 50200: 2006, "Method of test for determining the resistance to fire of unprotected small cables for use in emergency circuits".

| Product reference | | "Eurosafe FE 180" | |
|--|-------------------------|--|--|
| Cable marking | | "EUROSAFE FE 180 4G1.5 UNSCR. FIRE RESISTANT | |
| | | BS6387 CWZ, EN 50200 PH 120, EN 60332-1-2, EN | |
| | | 61034-2, FIPEC(EN)50339-2-1 CE 09/08" | |
| Cable function | | Fire system connections | |
| Number of cores x core size | | 4 x 1.5mm ² | |
| Voltage rating | | 300/500V | |
| Overall diameter | | 9.3mm (stated by sponsor) | |
| | | 9.6mm (determined by Exova Warringtonfire) | |
| Overall weight per unit length | | 128kg/km (stated by sponsor) | |
| | Product reference | "Solid Plain Annealed Copper Wire" | |
| | Generic type | Solid copper wire | |
| Conductors | Name of manufacturer | See Note 1 below | |
| | Cross sectional area | 1.5mm ² | |
| | Weight per unit length | 13.52kg/km | |
| | Product reference | "Special Silicone Rubber" | |
| | Generic type | Silicone rubber | |
| Insulation | Name of manufacturer | FTC – Fabbrica Trentina Conduttori Srl | |
| | Colour | "Black", "Blue", "Grey" and "Brown" | |
| | Thickness | 0.8mm | |
| | Weight per unit length | 22.6kg/km | |
| | Flame retardant details | See Note 1 below | |
| | Product reference | "Special Halogen Free LSZH" | |
| | Generic type | Low smoke zero halogen | |
| | | See Note 1 below | |
| Outer sheath | Name of manufacturer | FTC – Fabbrica Trentina Conduttori Srl | |
| Outer sneath | Colour | "Red" | |
| | Thickness | 1mm | |
| | Weight per unit length | 37.6kg/km | |
| | Flame retardant details | See Note 1 below | |
| Brief description of manufacturing process | | The conductor wires are insulated by extrusion of a | |
| | | continuous silicone rubber layer, which has been high | |
| | | temperature cross-linked. The cores are then twisted | |
| | | together. Finally, the sheathing is applied by a semi- | |
| | | compression extrusion process. | |

Note 1: The sponsor of the test was unwilling to provide this or further information.

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Test Results

Test report WF No. 177605 contains the following results:

When tested in accordance with BS EN 50200: 2006 in relation to the requirements for PH120 classification, the cable meets the criteria for resistance to fire with mechanical shock.

Confirmation Specification

Subsequent to the issue of the original test report, a representative of the sponsor of the test has stated that the sponsor has changed the name of the company. The correct name of the company is now Berica Cavi S.p.A. The new company name is referred to in this review report.

It has been confirmed in writing by Berica Cavi S.p.A. that there have been no changes to the product description contained within test report WF No. 177605 and that the product which is currently being manufactured is identical in every respect to the specimens which were tested.

It has also been confirmed in writing that no further fire testing of the previously fire tested specification has been performed since the issue of the test report, and no other individual or organisation has been asked to provide a technical review of the reports.

Conclusions

The procedures adopted for the original test (BS EN 50200: 2006) have been re-examined and are identical in all respects to those currently in use (BS EN 50200: 2015), therefore, with respect to test report WF No. 177605, its contents shall remain valid until 4th November 2018.

This review should be read in conjunction with test report WF No. 177605.

Validity

This review is based on information used in the original test report. No other information or data has been submitted by Berica Cavi S.p.A., which could affect this review.

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Revision History

| Issue No : | Issue Date: | |
|----------------------|--------------|--|
| Revised By: | Approved By: | |
| Reason for Revision: | • | |
| | | |
| Issue No : | Issue Date: | |
| Revised By: | Approved By: | |
| Reason for Revision: | · | |

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