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Testing. Advising. Assuring.

Title:

CLASSIFICATION OF
REACTION TO FIRE
PERFORMANCE
IN ACCORDANCE WITH
EN 13501-1:2007+A1: 2009.

Notified Body No:

0833

Product Name:

"Excel PVC FREE FOAM"

Report No:

WF 398164

Issue No:

1

Prepared for:

Excel Plastics Ltd,
Kingscourt Road,
Derrylavan,
Carrickamoss,
Co. Monaghan,
Ireland

Date:

3rd April 2018



0249

1. Introduction

This classification report defines the classification assigned to “Excel PVC FREE FOAM”, a family of foamed PVC sheets in line with the procedures given in EN 13501-1:2007+A1: 2009.

2. Details of classified product

2.1 General

The product, “Excel PVC FREE FOAM”, a family of foamed PVC sheets, is defined as being suitable for construction applications, excluding flooring and linear pipe thermal insulation.

2.2 Product description

The product, “Excel PVC FREE FOAM”, is fully described below and in the test reports provided in support of classification listed in Clause 3.1.

Generic type	Foamed PVC sheet
Product reference	“Excel PVC FREE FOAM”
Detailed description / composition details	PVC Resin, heat stabilizer, lubricants, calcium carbonate, acrylic processing aid and pigments
Name of manufacturer	Excel Plastics
Thickness	24 - 30 mm (stated by sponsor) 23.4 - 30.93mm (determined by Exova Warringtonfire)
Density	0.60g/cm ³ (stated by sponsor) 0.64 – 0.69g/cm ³ (determined by Exova Warringtonfire)
Colour reference	“White”
Trade name of flame retardant	“Garoflam”
Generic type of flame retardant	SB203 (Antimony Trioxide)
Amount of flame retardant	2.4 %
Air space details	An 80mm ventilated cavity was situated between the reverse face of each specimen and the calcium silicate backing board
Brief description of manufacturing process	Extruded PVC sheet

3. Test reports & test results in support of classification

3.1 Test reports

Name of Laboratory	Name of sponsor	Test reports/extended application report Nos.	Test method / extended application rules & date
Exova Warringtonfire	Excel Plastics Ltd	WF 396586, 396588	EN ISO 11925-2
Exova Warringtonfire	Excel Plastics Ltd	WF 396585, 396587	EN 13823
Exova Warringtonfire	Excel Plastics Ltd	WF 398166	EN/TS 15117

3.2 Test results

Test method & test number	Parameter	No. tests	Results	
			Continuous parameter - mean (m)	Compliance parameters
EN ISO 11925-2 (30s exposure - surface)	F _s	6, 6	40 - 60 mm	Compliant
	Flaming droplets/ particles		None	Compliant
EN ISO 11925-2 (30s exposure - edge)	F _s	6, 6	30 - 50 mm	Compliant
	Flaming droplets/ particles		None	Compliant
EN 13823	FIGRA _{0.2MJ}	3, 3	35.92 – 63.20	Compliant
	FIGRA _{0.4MJ}		32.19 – 55.52	Compliant
	THR _{600s}		2.91 – 4.12	Compliant
	LFS		None	Compliant
	SMOGRA		205.08 - 228.91	Compliant
	TSP _{600s}		950.79 - 976.40	Compliant

4. Classification and field of application

4.1 Reference of classification

This classification has been carried out in accordance with clause 8 of EN 13501-1:2007+A1:2009.

4.2 Classification

The product, "Excel PVC FREE FOAM", a family of rigid polyisocyanurate foams (PIR) bonded to a layer of tapered edge plasterboard, in relation to their reaction to fire behaviour are classified:

B

The additional classification in relation to smoke production is:

s3

The additional classification in relation to flaming droplets / particles is:

d0

The format of the reaction to fire classification for construction applications, excluding flooring and linear pipe thermal insulation is:

Fire Behaviour		Smoke Production			Flaming Droplets	
B	-	s	3	,	d	0

Reaction to fire classification: B – s3, d0

4.3 Field of application

This classification is valid for the following end use applications:

- i) Construction applications, mounted with an airspace over any substrate having a minimum thickness of 12.5mm, a minimum density of 870kg/m³ and a minimum fire performance of A2-s1, d0.

This classification is also valid for the following product parameters:

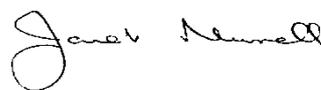
Overall product thickness	24 - 30 mm
Product density	60kg/m ²
Product colour/pattern	No variation allowed
Product composition	No variation allowed

SIGNED



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Katie Williams
Junior Certification Engineer

APPROVED



.....
Janet Murrell
Technical Manager
Technical Department
on behalf of **Exova Warringtonfire**

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