



Confidential Report

Our Ref: 23/60418D/11/22

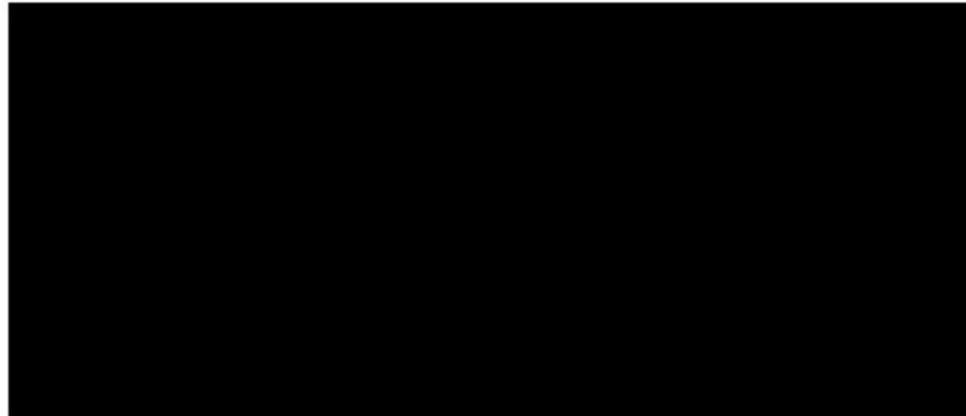




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Date: 5 December 2022
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Your Ref: P40148
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Client:



Job Title:

Fire Test on One Fabric Sample

Clients Order Ref:

P40148

Date of Receipt:

24 January 2022

Date Test Started:

5 December 2022

Description of Sample:

One sample of fabric, which was referenced by the client as;



Work Requested:

We were asked to make the following fire test:

IMO FTP Code 2010:Part 9

- * subcontracted test, UKAS accredited
- ** subcontracted test, EN ISO/IEC 17025 accredited
- *** not UKAS accredited

Note: This report relates only to the items tested.



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Client:



Product Description

Company Name	
FABRIC	
Type of Material, i.e. Mattress, Blankets, Quilts, Pillows, Thin, Light Mattresses or Removable Covers, etc.;	PFP - DRAPERY, TOP OF BED CUSHIONS
Name and/or Identification of the Product Tested	
Materials of the Product and its Composite Ratio (i)	100% POLYESTER
Composition of Weave (ii)	--
Density (Number/Inch) the Number of Threads per Inch in both warp and weft; and	--
Yarn Number Count	--
Thickness (mm)	--
Mass per Unit Area (g/m ²)	230gsm
Colour and Tone (iii)	--
Method and Quantity of Fire Retardant Treatment	--
FILLINGS	
Material (Name of the Manufacturer, Type Designation);	--
Weight per Unit Volume (kg/m ³)	--
For Products Where Thickness is Difficult to Measure Exactly Square Density (g/m ²)	--
Method and Quantity of Fire Retardant Treatment	--

- (i) Such as wool, nylon, polyester, etc.
- (ii) Such as plain, weave, twilled.
- (iii) If the product has a pattern, the representative colour shall be described.



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FIRE TESTS ACCORDING to IMO FTP Code 2010:Part 9 Test for Bedding Components

Cleansing Procedure

The fabric received no pre-treatment.

Conditioning

The sample was conditioned for 72 hours in indoor ambient conditions and then for at least 16 hours in an atmosphere of $23 \pm 2^\circ\text{C}$ and $50 \pm 5\%$ R.H.

Procedure

The sample was sampled and tested in accordance with IMO FTP Code 2010:Part 9.

Cigarette Specification

Dimensions (mm)	69mm x 8.0mm
Mass (g)	0.83
Smouldering Rate (mins/secs)	9m 50s



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Requirements

Smouldering Ignition Sources

Progressive smouldering is considered to have occurred if any of the following occurs:-

- a) Smoulders more than 1 hour
- b) Unsafe escalating combustion
- c) Test assembly consumed
- d) Smoulders through thickness or to extremities
- e) Charring more than 25 mm from edge of cotton wool
- f) Occurrence of flames by a smouldering ignition source

Flame as Ignition Sources

Ignition is considered to have occurred if any of the following occurs:-

- a) Occurrence of flames imitated by smouldering
- b) Flaming for more than 150 sec.
- c) Unsafe escalating combustion
- d) Test specimen burns more than 66% consumed within 150s after removal of igniting flame
- e) Smoulders or burns through thickness or to extremities



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Results

Criteria for Progressive Smouldering	Specimen 1		Specimen 2	
	Cigarette Source 0	Match Source 1	Cigarette Source 0	Match Source 1
Criteria for Progressive Smouldering				
Smoulders more than 1 hour	No	No	No	No
Unsafe escalating combustion	No	No	No	No
Smoulders until essentially consumed	No	No	No	No
Smoulders to the extremities of specimen (*)	No	No	No	No
Charring more than 25 mm from source	No	No	No	No
Performance	Pass	Pass	Pass	Pass
Criteria for Flaming Ignition				
Occurrence of flames initiated by smouldering	No	No	No	No
Flaming for more than 150s	No	No	No	No
Unsafe escalating combustion	No	No	No	No
More than 66% test assembly consumed	No	No	No	No
Burns to the extremities of specimen (*)	No	No	No	No
Extent of Damage (mm)				
Width	46	19	143	20
Length	80	12	125	11
Depth	3	2	4	2
Performance	Pass	Pass	Pass	Pass
Observations	DNO	--	DNO	--

Acronym

DNP – Did not propagate
 ES – Escalating smouldering
 BTE – Burnt to extremities

EC – Escalating combustion
 DNS – Material did not split

ME – Manually extinguished
 DNO – Did not observe time of event

(*) For samples thicker than 25mm and/or mattresses, it also includes the full thickness of the specimen.



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Note

The test results relate only to the ignitability of the combination of materials under the particular conditions of test; they are not intended as a means of assessing the full potential fire hazard of the materials in use.

Comment

The results meets the requirements according to IMO 2010 FTP Code, Part 9.

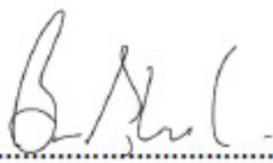
Where required to make a judgement to any pass/fail criteria an estimation of uncertainty of measurement has been taken into account. Under our Policy we have used a non-binary decision rule.

See our decision rules Policy (<https://www.bttg.co.uk/about-us/decision-rules-policy/>) for further information.

Uncertainty Budget

The overall uncertainty budget IMO FTP Code 2010:Part 9 is as follows:-

Measurements: $\pm 2\text{mm}$
Timing: ± 2 seconds

Reported by:  B Bland, Technical Customer Service Officer

Countersigned by:  P Doherty, Manager

Enquiries concerning this report should be addressed to Customer Services.



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