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Testing. Advising. Assuring.

Huya Modern Ventilation & Insulation Systems
Factory
PO Box 284,
Dammam 31411
Saudi Arabia

21st March 2014
Our ref: 336649 (Issue 2)
Our invoice No: 9614000016

Dear Adam

We enclose a copy of our laboratory record sheet relating to the indicative fire propagation tests to BS 476: Part 6: 1989+A1:2009 which were recently performed on two specimens of your nominally 21mm thick aluminium foil faced and backed PIR insulation foam product. The specimens were conditioned prior to testing.

The specimens were sampled and selected by a representative of **Warrington Certification Ltd**; these specimens were then supplied by yourselves on the 20th January 2014. **Exova Warringtonfire** was not involved in any sampling or selection procedure.

One of two identical faces of the specimen was exposed to the heating conditions of the test.

This test result relates to an exploratory investigation which utilised the test methodology given in BS 476: Part 6: 1989+A1: 2009, the full requirements of the Standard were not, however, complied with. The information is provided for your information only and should not be used to demonstrate performance against the Standard nor compliance with a regulatory requirement. The test was not conducted under the requirements of UKAS accreditation.

The test result given by a full test in accordance with the Standard requires 3 identical specimens to be tested and the result of those 3 specimens to be averaged to give the Fire Propagation Index, I, (the average of the S values), and sub indices i_1, i_2 and i_3 (the average of the s_1, s_2 and s_3 values respectively).

Different specifiers may require different levels of performance for various applications. The test results are most commonly used to determine if a product has a Class 0 surface, as defined in Approved Document B to the Building Regulations 1991. This defines a Class 0 product as being composed throughout of materials of limited designated combustibility (as determined by the test methods BS 476: Part 4 and/or BS 476: Part 11) or a product which is designated Class 1 when tested in accordance with BS 476: Part 7 and also achieves a fire propagation index (I) of not more than 12 and a subindex (i_1) of not more than 6 when it is tested in accordance with BS 476: Part 6.

If you require guidance on the interpretation of the results or if we can assist in any other way, please do not hesitate to contact us.

Yours sincerely

C Meachin

C. Meachin
Technical Officer
Reaction to Fire Testing

Laboratory Record Sheet

FIRE PROPAGATION TEST - BS476:PART 6:1989+A1:2009

Specimen No. : 1 **Date : 24-Jan-14**

Time mins t	Specimen Temperature Deg C Ts	Calibration Temperature Deg C Tc	Ts-Tc/10t	Sub Index Of Performance
0.50	**15**	**11**	**0.80**	
1.00	**23**	**17**	**0.60**	
1.50	**29**	**21**	**0.53**	
2.00	**35**	**25**	**0.50**	
2.50	**39**	**31**	**0.32**	
3.00	**43**	**35**	**0.27**	**3.02**
4.00	**79**	**64**	**0.38**	
5.00	**123**	**102**	**0.42**	
6.00	**152**	**135**	**0.28**	
7.00	**173**	**155**	**0.26**	
8.00	**186**	**174**	**0.15**	
9.00	**199**	**188**	**0.12**	
10.00	**209**	**201**	**0.08**	**1.69**
12.00	**221**	**218**	**0.03**	
14.00	**229**	**230**	**0.00**	
16.00	**240**	**240**	**0.00**	
18.00	**251**	**245**	**0.03**	
20.00	**281**	**251**	**0.15**	**0.21**
Total Index of Performance S			**=**	**4.92**

SubIndex s1 **3.02**

SubIndex s2 **1.69**

SubIndex s3 **0.21**

Index of Performance S **4.92**

Laboratory Record Sheet

FIRE PROPAGATION TEST - BS476:PART 6:1989+A1:2009

Specimen No. : 2 **Date : 27-Jan-14**

Time mins t	Specimen Temperature Deg C Ts	Calibration Temperature Deg C Tc	Ts-Tc/10t	Sub Index Of Performance
0.50	**15**	**11**	**0.80**	
1.00	**21**	**16**	**0.50**	
1.50	**27**	**19**	**0.53**	
2.00	**32**	**24**	**0.40**	
2.50	**34**	**28**	**0.24**	
3.00	**39**	**32**	**0.23**	**2.71**
4.00	**73**	**62**	**0.28**	
5.00	**110**	**98**	**0.24**	
6.00	**137**	**129**	**0.13**	
7.00	**159**	**150**	**0.13**	
8.00	**177**	**166**	**0.14**	
9.00	**189**	**180**	**0.10**	
10.00	**198**	**192**	**0.06**	**1.07**
12.00	**213**	**209**	**0.03**	
14.00	**225**	**220**	**0.04**	
16.00	**232**	**232**	**0.00**	
18.00	**237**	**236**	**0.01**	
20.00	**251**	**242**	**0.05**	**0.12**
Total Index of Performance S			**=**	**3.90**

SubIndex s1 **2.71**

SubIndex s2 **1.07**

SubIndex s3 **0.12**

Index of Performance S **3.90**