Certificate of Test

QUOTE No.: NC8391 **REPORT No.: FNC12604**

COMBUSTIBILITY TEST FOR MATERIALS IN ACCORDANCE WITH AS 1530.1-1994

TRADE NAME: Mineral Wool / Rock Wool

SPONSOR:
Delta Panels Pty Ltd
731 Boundary Road
RICHLANDS QLD 4077
AUSTRALIA

DESCRIPTION OF TEST SAMPLE: The sponsor described the tested specimen as a mineral wool insulation slab comprised of a silicate fibres, alkaline oxide, alkali earth oxide, Bakelite synthetic thermosetting resin binder and mineral oil.

Nominal thickness:	50 mm
Nominal density:	100 kg/m^3
Colour:	brown

TEST PROCEDURE: Five (5) samples were tested in accordance with Australian Standard 1530 Methods for fire tests on building materials, components and structures, Part 1- 1994: Combustibility Test for Materials.

An alternative suitable insulating material was used to fill the annular space between the furnace tubes, as specified in Clause 4.2 of ISO 1182:2010.

RESULTS: The following calculated results were obtained, refer also to Summary of measurements:

Arithmetic mean	$= \frac{\Sigma\, results}{5}$
Mean furnace thermocouple temperature rise **(°C)**	26.37
Mean specimen centre thermocouple temperature rise **(°C)**	253.80
Mean specimen surface thermocouple temperature rise **(°C)**	36.60
Mean duration of sustained flaming (s)	0
Mean mass loss (%)	6.04

DESIGNATION: The material is NOT deemed combustible according to the test criteria specified in Clause 3.4 of AS 1530.1-1994.

These test results relate only to the behaviour of the test specimens of the material under the particular conditions of the test and they are not intended to be the sole criterion for assessing the potential fire hazard of the material in use.

DATE OF TEST: 8 July 2020

Issued on the 24th day of July 2020 without alterations or additions.

Faustin Molina
Testing Officer

Stephen Smith
Team Leader, Reaction to Fire & Façade Fire Laboratory

End of Report

NATA Accredited Laboratory
Number: 165
Corporate Site No 3625
Accredited for compliance with ISO/IEC 17025 - Testing.

CSIRO INFRASTRUCTURE TECHNOLOGIES

14 Julius Avenue, Riverside Corporate Park, North Ryde NSW 2113 AUSTRALIA
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SUMMARY OF MEASUREMENTS AND OBSERVATIONS OF SAMPLES UNDER TEST C12604

Parameters	Symbol or expression	Unit symbol	Sample Number				
			1	2	3	4	5
Initial specimen mass	m_{si}	g	7.52	8.15	7.09	7.82	8.87
Final specimen mass	m_{sf}	g	7.03	7.58	6.49	7.81	8.15
Mass loss	$\Delta m = \frac{Msi - Msf}{Msi} \times 100$	%	6.52	6.99	8.46	0.13	8.12
Total duration of sustained flaming	Cumulative total of duration of flaming*	s	0	0	0	0	0
Initial furnace thermocouple temperature	T_{fi}	°C	748	747	746	754	748
Maximum furnace thermocouple temperature	T_{fm}	°C	816	802	818	803	798
Final furnace thermocouple temperature	T_{ff}	°C	782	781	785	782	775
Furnace thermocouple temperature rise	$\Delta Tf = Tfm - Tff$	°C	34	21	33	21	23
Maximum specimen centre thermocouple temperature	T_{cm}	°C	1017	994	1039	1015	1049
Final specimen centre thermocouple temperature	T_{cf}	°C	762	762	776	773	772
Specimen centre thermocouple temperature rise	$\Delta Tc = Tcm - Tcf$	°C	255	232	263	242	277
Maximum specimen surface thermocouple temperature	T_{cm}	°C	816	818	829	835	834
Final specimen surface thermocouple temperature	T_{sf}	°C	780	785	790	801	793
Specimen surface thermocouple temperature rise	$\Delta Ts = Tcm - Tsf$	°C	36	33	39	34	41
Test duration	-	min	40	30	55	30	30

- Any individual duration flaming less than 5 seconds was discarded

End of Test Certificate

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