

**Classification Report No. 7191271569-MEC21/03-JV**  
dated 26 Nov 2021

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PSB Singapore

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

**Sponsor:**  
Eco Building Solutions Pte Ltd  
1 Sunview Road  
#05-46, Eco Tech @ Sunview  
Singapore 627615

**Prepared by:**  
TÜV SÜD PSB Pte Ltd

**Product name:**  
Brand: "Lightherm" Model: "Lightherm Drymix – Lightweight Thermal Insulation Material" (52mm thick, 522.1 kg/m<sup>3</sup>) insulation material

This classification report consists of five pages and may only be used or reproduced in its entirety.



LA-2007-0380-A LA-2007-0386-C  
LA-2007-0381-F LA-2010-0464-D  
LA-2007-0382-B LA-2018-0702-B  
LA-2007-0383-G LA-2018-0703-G  
LA-2007-0384-G LA-2020-0747-L  
LA-2007-0385-E

The results reported herein have been performed in accordance with the terms of accreditation under the Singapore Accreditation Council. Inspections/Calibrations/Tests marked "Not SAC-SINGLAS Accredited" in this Report are not included in the SAC-SINGLAS Accreditation Schedule for our inspection body/laboratory.

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## 1. Introduction

This classification report defines the classification assigned to Brand: "Lightherm" Model: "Lightherm Drymix – Lightweight Thermal Insulation Material" (52mm thick, 522.1 kg/m<sup>3</sup>) insulation material in accordance with the procedures given in BS EN 13501-1: 2007 +A1: 2009.

## 2. Details of classified product

### 2.1. End use application

This product, Brand: "Lightherm" Model: "Lightherm Drymix – Lightweight Thermal Insulation Material" (52mm thick, 522.1 kg/m<sup>3</sup>) insulation material, is to be used for lightweight thermal insulation.

### 2.2. Product description

The product is fully described in the test reports in support of this classification listed in clause 3.1

## 3. Test reports and results in support of classification

### 3.1 Test reports

Name of laboratory	Name of sponsor	Test report reference	Test method
TÜV SÜD PSB Pte Ltd	Eco Building Solutions Pte Ltd	7191271569-MEC21/01-JV dated 26 Nov 2021	BS EN ISO 1716: 2010
TÜV SÜD PSB Pte Ltd	Eco Building Solutions Pte Ltd	7191271569-MEC21/02-JV dated 26 Nov 2021	BS EN ISO 1182: 2010

### 3.2. Results

Test method	Parameters	Number of tests	Test results	
			Continuous parameters (mean values)	Compliance parameters for A1
BS EN ISO 1716	PCS (MJ/kg)	3	0.48	≤ 2.0
BS EN ISO 1182	ΔT (°C)	5	2.3	≤ 30
	Δm (%)		19.68	≤ 50
	T <sub>f</sub> (sec)		0	0



#### 4. Classification and field of application

##### 4.1. Reference of classification

This classification has been carried out in accordance with clause 11 of EN 13501-1: 2007 +A1: 2009.

##### 4.2. Classification

The product, Brand: "Lightherm" Model: "Lightherm Drymix – Lightweight Thermal Insulation Material" (52mm thick, 522.1 kg/m<sup>3</sup>) insulation material, in relation to its reaction to fire behaviour meet the requirements to be classified as **A1**.

Therefore, the classification of the Brand: "Lightherm" Model: "Lightherm Drymix – Lightweight Thermal Insulation Material" (52mm thick, 522.1 kg/m<sup>3</sup>) insulation material, in accordance with BS EN 13501-1: 2007 +A1: 2009 is:

Reaction to fire classification: A1



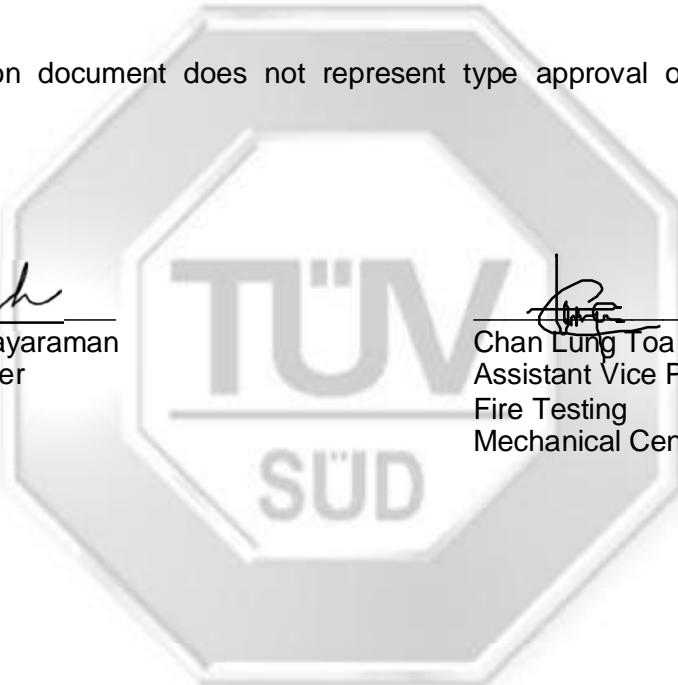
#### 4.3. End use application and product parameter

The classification in clause 4.2 only applies to the product described in clause 2 of this report and is only valid for the following parameters and applications:

- Lightweight thermal insulation

#### 5.0 Limitation

This classification document does not represent type approval or certification of the product.



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Vikneshwaran Jayaraman  
Assistant Manager

Chan Lung Toa  
Chan Lung Toa  
Assistant Vice President  
Fire Testing  
Mechanical Centre

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dated 26 Nov 2021



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Effective 26 January 2021