

## Reaction to fire classification report

### 1 Introduction

This classification report defines the classification assigned to the product “Spruce” in accordance with the procedure given in EN 13501-1:2007.

### 2 Details of classified product

#### 2.1 General

The product “Spruce” is defined as a FR treated wood panel. Its classification is valid for the end use application as surface lining.

#### 2.2 Product description

According to the client:

Wood panel made of spruce, surface treated with 300 g/m<sup>2</sup> FR agent called HR Prof (=Holz Prof). The treated panel is called “Spruce”.

### 3 Test reports

#### 3.1 Test reports

This classification is based on the test report listed below:

Name of laboratory	Name of sponsor	Test report ref no	Accredited test method
SP	HR Prof Oy	P906808	EN 13823 EN ISO 11925-2

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### 3.2 Test results

Test method	Parameter	Number of tests	Results	
			Continuous parameter mean (m)	Compliance with parameters
EN ISO 11925-2		12		
Edge/Surface flame attack**				
30 s exposure	$F_s \leq 150$ mm		(-)	Compliant
Flaming droplets/particles	Ignition of filter paper		(-)	No ignition of filter paper
EN 13823		3		
	$FIGRA_{0,2MJ}$ (W/s)		68	Compliant
	$FIGRA_{0,4MJ}$ (W/s)		36	Compliant
	$LFS < \text{edge}$		(-)	Compliant
	$THR_{600s}$ , (MJ)		2.4	Compliant
	$SMOGRA$ , ( $\text{m}^2/\text{s}^2$ )		1.6	Compliant
	$TSP_{600s}$ , ( $\text{m}^2$ )		39	Compliant
	Flaming droplets/particles		(-)	No flaming droplets/particles

\*\* : as required to the end use application of the product

**4 Classification and field of application**

**4.1 Reference and direct field of application**

This classification has been carried out in accordance with clause 11 and 15 of EN 13501-1:2007.

**4.2 Classification**

The product called “Spruce” in relation to its reaction to fire behaviour is classified:

**B**

The additional classification in relation to smoke production is:

**s1**

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

**d0**

The format of the reaction to fire classification for construction products excluding floorings and linear pipe thermal insulation product is:

Fire Behaviour		Smoke Production			Flaming Droplets	
<b>B</b>	-	<b>s</b>	<b>1</b>	,	<b>d</b>	<b>0</b>

**Reaction to fire classification: *B-s1,d0***

#### 4.3 Field of application:

This classification is valid for the following product parameters:

Nominal thickness:

- 20-22 mm.

FR-treatment of wood

- surface treated with 300 g/m<sup>2</sup> FR agent called HR Prof (=Holz Prof).

Type of wood

- spruce

This classification is valid for the following end use conditions:

Substrates

- Plaster board or any end use substrate of Euroclasses A1 or A2 at least 6 mm thick, having a density  $\geq 700$  kg/m<sup>3</sup>.

Mounting

- Horizontal panels mechanically fixed to vertical wooden scantlings.

Void

- Wood scantlings creating an air-gap, nominal 22 mm.

The sample was delivered by the client. SP Fire Technology was not involved in the sampling procedure.

#### 5 Limitations

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

**SP Technical Research Institute of Sweden**  
**Fire Technology - Fire Dynamics**



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