

## DECLARATION OF PERFORMANCE

No. 40339

Unique identification code of the product-type	PAROC Fire Steel Protect
Intended use/es	Thermal insulation for buildings
Manufacturer	Paroc Group, Energiakuja 3, FI-00180 Helsinki
System/s of AVCP	AVCP 1 for Reaction to fire, AVCP 3 for other properties
Harmonised standard	EN 13162:2012+A1:2015
Notified body/ies	No. 0809 – Eurofins Expert Services Ltd

The performance of the product identified above is in conformity with the set of declared performance/s. This declaration of performance is issued, in accordance with Regulation (EU) No 305/2011, under the sole responsibility of the manufacturer identified above.

Signed for and on behalf of the manufacturer by:

Helsinki 29.6.2018



Paroc Oy Ab, Building Insulation  
Susanna Tykkä-Vedder, Development Manager

### Declared Performance/s

PROPERTY	VALUE	ACCORDING TO
<b>DIMENSIONAL STABILITY</b>		
Dimensional Stability at Specified Temperature, DS(70,-)	≤ 1 %	EN 13162:2012 + A1:2015 (EN 1604)
<b>DURABILITY OF COMPRESSIVE STRENGTH AGAINST AGEING/DEGRADATION</b>		
Compressive Creep $CC(i_1/i_2/y)\sigma_c X_{ct}$	NPD	EN 13162:2012 + A1:2015 (EN 1606)
<b>DURABILITY OF FIRE AND THERMAL PROPERTIES</b>		
Durability of Reaction to Fire Against Heat, Weathering, Ageing/Degradation	The fire performance of mineral wool does not deteriorate with time. The Euroclass classification of product is related to the organic content, which cannot increase with time.	
Durability of Thermal Resistance Against Heat, Weathering, Ageing/Degradation	Thermal conductivity of mineral wool products does not change with time, experience has shown the fibre structure to be stable and the porosity contains no other gases than atmospheric air.	

## Declared Performance/s

PROPERTY	VALUE	ACCORDING TO
<b>REACTION TO FIRE</b>		
Reaction to Fire, Euroclass	A1	EN 13162:2012 + A1:2015 (EN 13501-1)
<b>CONTINUOUS GLOWING COMBUSTION</b>		
Continuous Glowing Combustion	NPD	EN 13162:2012 + A1:2015
<b>THERMAL RESISTANCE</b>		
Thermal Resistance	<a href="https://www.paroc.com/~media/Files/Solutions/%20and%20Products/thermal-resistance-table-INT.ashx">https://www.paroc.com/~media/Files/Solutions/%20and%20Products/thermal-resistance-table-INT.ashx</a>	EN 13162:2012 + A1:2015
Thermal Conductivity $\lambda_D$	0,038 W/mK	EN 13162:2012 + A1:2015
Thickness Tolerance, T	T5	EN 13162:2008 (EN 823)
<b>DIRECT AIRBORNE SOUND INSULATION INDEX</b>		
Air Flow Resistivity $A_{FR}$	NPD	EN 13162:2012 + A1:2015 (EN 29053)
<b>WATER PERMEABILITY</b>		
Water Absorption, Short Term $W_S$ , ( $W_p$ )	$\leq 1 \text{ kg/m}^2$	EN 13162:2012 + A1:2015 (EN 1609)
Water Absorption, Long Term $W_L(P)$ , ( $W_{lp}$ )	$\leq 3 \text{ kg/m}^2$	EN 13162:2012 + A1:2015 (EN 12087)
<b>WATER VAPOUR PERMEABILITY</b>		
Water Vapour Transmission MJ, $\mu$	1	EN 13162:2012 + A1:2015 (EN 12086)
Water Vapour Resistance Z	NPD	EN 13162:2012+A1:2015
<b>ACOUSTIC ABSORPTION INDEX</b>		
Sound Absorption	NPD	EN 13162:2012 + A1:2015 (EN ISO 354)
<b>IMPACT NOISE TRANSMISSION INDEX (FOR FLOORS)</b>		
Dynamic Stiffness SD	NPD	EN 13162:2012 + A1:2015 (EN 29052-1)
Compressibility	NPD	EN 13162:2012 + A1:2015+A1:2015
<b>COMPRESSIVE STRENGTH</b>		
Compressive stress at 10 % deformation $CS(10)$ , $\sigma_{10}$	NPD	EN 13162:2012 + A1:2015 (EN 826)
Compressive Strength $CS(Y)$ , $\sigma_m$	NPD	EN 13162:2012 + A1:2015 (EN 826)
Point Load PL(5)	NPD	EN 13162:2012 + A1:2015 (EN 12340)
<b>TENSILE/FLEXURAL STRENGTH</b>		
Tensile Strength Perpendicular to Faces TR, $\sigma_{mt}$	NPD	EN 13162:2012 + A1:2015 (EN 1607)
<b>RELEASE OF DANGEROUS SUBSTANCES TO THE INDOOR ENVIRONMENT</b>		
Release of Dangerous Substances	NPD	EN 13162:2012 + A1:2015