CERTIFICATE

Certified Passive House Component

Component-ID 1530sp02 valid until 31st December 2025

Passive House Institute
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64283 Darmstadt
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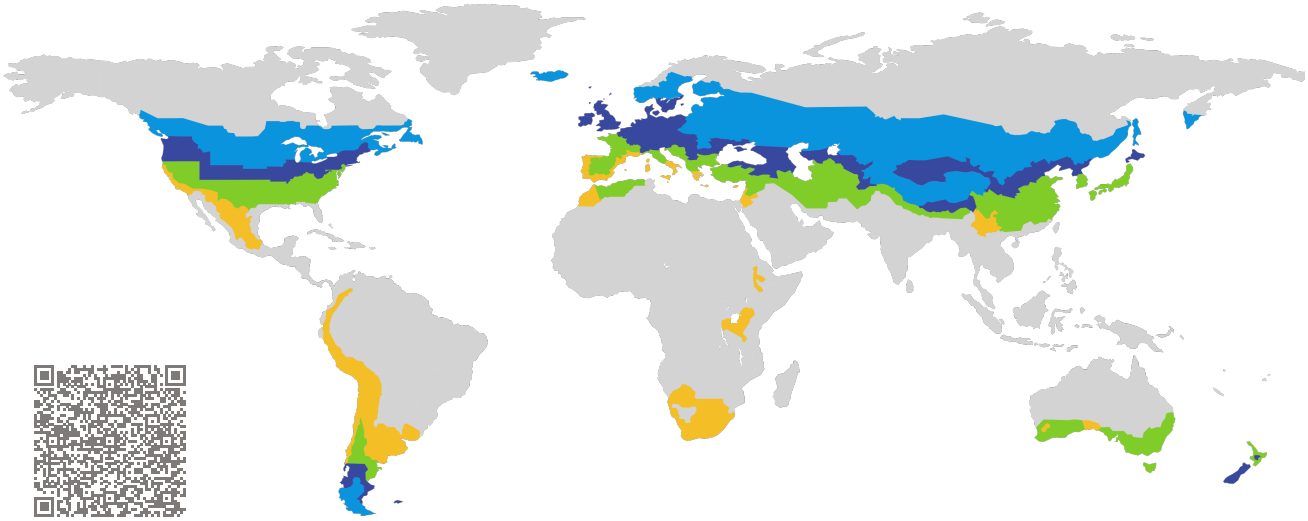

Category: **Edge-bond for low-E-glazing: Secondary seal**

Manufacturer: **Dow Silicones Belgium SPRL, Seneffe, Belgium**

Product name: **DOWSIL™ 3363 Insulating Glass Silicone Sealant**

Type
Silicone
Height of sealing
4 / 6 mm
Thermal conductivity of sealing
0.350 W/(m K)

This certificate was awarded based on the following criteria:

Depending on the climatic region, the spacer prevents high surface temperatures, which can cause mould. At least 3 out of the 7 reference frames fulfilled the spacer hygiene criteria for the relevant climatic region.

Hygiene $f_{Rsi} \geq 0.75$

The specific resistance of the spacer's edges is greater than the climate-independent minimum requirement.

Efficiency $R_E = 5.40$ m K/W ≥ 3.50 m K/W

DOWSIL™

silicones by Dow

cold climate

phB

CERTIFIED COMPONENT

Passive House Institute

Passive House efficiency class	phE	phD	phC	phB	phA	phA+

www.passivehouse.com

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Description

Secundary sealant based on silicone with increased strength for the edge of insulating glass units. Tested thickness of secondary seal: Windows: 4 mm, Curtain walls: 6 mm.

Thermal conductivity: 0.350 W/(m K)

Explanation

Sealants are categorized into different efficiency classes based on the resistance of their edges RE . For the certification of secondary sealants, the PHI-phA-reference spacer with a height of 7 mm and a thermal conductivity of 0.2 W/(mK) is used.

A detailed report with the calculations is available from either the manufacturer or the Passive House Institute.

The Passive House Institute has defined global component requirements for seven climate regions. In principle, components that have been certified for climates with higher requirements can also be used in climates with lower requirements. This may be economically advantageous.

Further information regarding certification is available on www.passivehouse.com and www.passipedia.org .

Reference frames calculated with Silicone					
Climate	Arctic	Cool ✓	Cool temperate ✓	Warm temperate ✓	Warm ✓
Glass	Quadruple	Triple	Triple	Triple	Double
Glass package	4/12/3/12/3/12/4	6/18/2/18/6	6/16/6/16/6	6/16/6/16/6	6/16/6
Glass U-value	0.35 W/(m^2 K)	0.52 W/(m^2 K)	0.70 W/(m^2 K)	0.70 W/(m^2 K)	1.20 W/(m^2 K)
Timber-aluminium integral frame					
U_f [W/(m^2 K)]	0.48	0.62	0.73	0.87	1.03
Ψ_g [W/(m K)]	0.310	0.330	0.330	0.032	0.038
f_{Rsi} [-]	0.79	0.75 ✓	0.71 ✓	0.70 ✓	0.60 ✓
Timber-aluminium					
U_f [W/(m^2 K)]	0.54	0.57	0.75	0.97	1.19
Ψ_g [W/(m K)]	0.033	0.035	0.035	0.035	0.041
f_{Rsi} [-]	0.76	0.73	0.69	0.66 ✓	0.54
Timber					
U_f [W/(m^2 K)]	0.51	0.53	0.78	0.86	0.99
Ψ_g [W/(m K)]	0.029	0.032	0.033	0.032	0.038
f_{Rsi} [-]	0.78	0.76 ✓	0.73 ✓	0.73 ✓	0.62 ✓
Vinyl					
U_f [W/(m^2 K)]	0.70	0.75	0.82	1.02	1.16
Ψ_g [W/(m K)]	0.034	0.036	0.037	0.038	0.042
f_{Rsi} [-]	0.78	0.75 ✓	0.73 ✓	0.69 ✓	0.61 ✓
Aluminium					
U_f [W/(m^2 K)]	0.60	0.61	0.71	0.73	1.17
Ψ_g [W/(m K)]	0.035	0.038	0.040	0.039	0.047
f_{Rsi} [-]	0.79	0.79 ✓	0.76 ✓	0.76 ✓	0.63 ✓
Curtain wall timber					
U_f [W/(m^2 K)]	0.60	0.65	0.66	0.71	1.11
Ψ_g [W/(m K)]	0.047	0.046	0.048	0.048	0.059
f_{Rsi} [-]	0.74	0.73	0.70 ✓	0.70 ✓	0.56 ✓
Curtain wall aluminium					
U_f [W/(m^2 K)]	0.67	0.73	0.75	0.79	1.33
Ψ_g [W/(m K)]	0.054	0.054	0.057	0.057	0.080
f_{Rsi} [-]	0.82 ✓	0.81 ✓	0.79 ✓	0.78 ✓	0.67 ✓