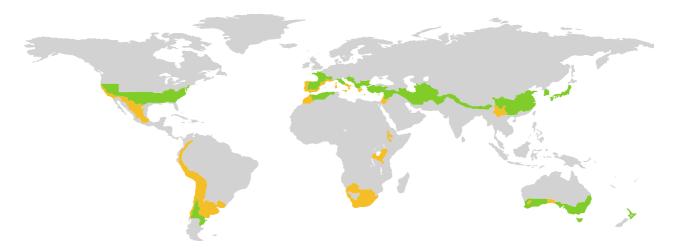
CERTIFICATE

Certified Passive House Component ID: 1426rc04 valid until 31. December 2025

Aditional thermal bridges

Name	Thermal bridge	f _{Rsi}	Description
RWBO/TO/SI 02	Ψ= 0,209 W/(mK)	0,84	Skylight variant 02
ROEJ 01	Ψ= -0,071 W/(mK	0,95	Roof expansion joint 01
ROEJ 02	Ψ= -0,055 W/(mK	0,98	Roof expansion joint 02



Category	Roof system Soli
Manufacturer	VEDAG (China) Tr
	200122 Shanghai
	CHINA
Product name	Passive House Ro

This certificate for the warm, temperate climate zone was awarded based on the following criteria

Hygiene criterion

The minimum temperature factor of the interior surface

Comfort criterion

The U-value of the installed windows is

Efficiency criteria

Heat transfer coefficient of building envelope Temperature factor of opaque junctions Thermal bridge-free design for key connection details

An airtightness concept for all components and connection details was provided

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warm, temperate climate



Passive House Institute Dr. Wolfgang Feist 64342 Darmstadt GERMANY

Solid construction with EIFS Trade Co. Ltd.

Roof System

ices is	$\mathbf{f}_{Rsi=0,25m^2K/W}$ ≥	0,65
	U _{w,i} ≤	1,05 W/(m²K)
s	U*f _{PHI} ≤ f _{Rsi=0,25m²K/W} ≥ Ψ ≤	0,30 W/(m²K) 0,82 0,01 W/(mK)
nection	warm, temper	ate climate
	CERTI	FIED

COMPONENT Passive House Institute

Opaque building envelope

The VEDAG Roof Waterproofing System ensures both comprehensive weather proofing and Passive House standard thermal protection. The system is intended to be used with reinforced concrete construction with EIFS and comprises an exterior insulation finishing system of G-EPS (0,033 W/mK) installed using compatible adhesive materials. VEDAG membranes are applied on top of the insulation to form the weather barrier. The system has been assessed according to the Passive House Institute's criteria for roof systems and has been validated as suitable for Passive House projects in the cool-temperate and warm-temperate climate zone.

Windows

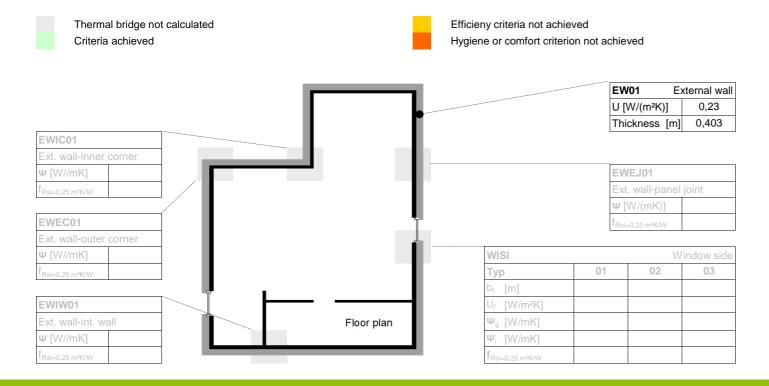
Analysis was undertaken for two separate roof window types; the 'Composite Glazing öffnungsfähiges Glasoberlicht' from Glas Trösch (Uw $= 0.94 \text{ W/m}^{2}\text{K}$ with Ug $= 0.75 \text{ W/m}^{2}\text{K}$) and the 'Nauheimer Lichtkuppel' from Hans Börner GmbH & Co. KG (Uw = $0.68 \text{ W/m}^2\text{K}$ with Ug = $0.89 \text{ W/m}^2\text{K}$), based on dimensions 1,5 x 1,5 m. The calculations undertaken demonstrate that the window installation locations are suited to the cool-temperate climate, with no risk of surface condensation and subsequent mould growth.

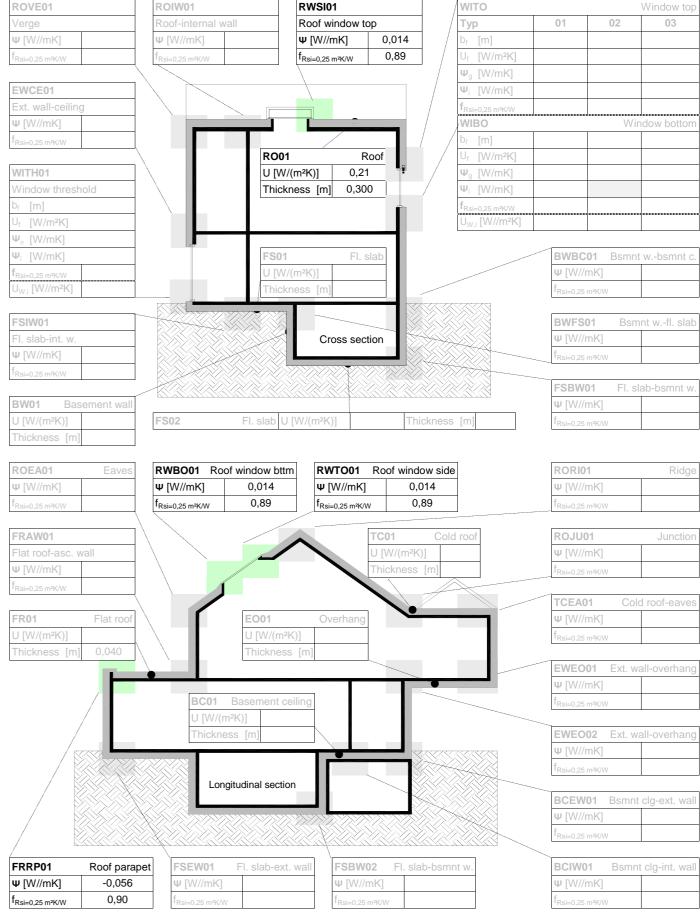
Airtightness concept

Air tightness is achieved by the following procedure: Roof windows are to be constructed with permanently elastic + tight materials. Internal surfaces are to be plastered over the entire surface; internal surfaces in lightweight construction are to be covered over the entire surface with continuous, airtight membranes; windows are to be properly connected with suitable airtight window connection membranes or profiles.

Explanatory notes

The Passive House Institute has defined international component criteria for seven climate zones based on hygiene-, comfort- and affordability criteria. In principle, components which have been certified for climate zones with higher requirements may also be used in climates with less stringent requirements. This use might make sense in certain circumstances.





RWSI01

ROIW01

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Passive House Roof System | ID: 1426rc04

WITO			Window top
Тур	01	02	03
b _f [m]			
U_f [W/m ² K]			
Ψ_{a} [W/mK]			
WIBO			dow botton
b _f [m]			
$U_{\rm f}$ [W/m ² K]			
Ψ_{α} [W/mK]			
1			
U _{w i} [W//m ² K]			
_	BWBC)1 Bsmnt	wbsmnt c
	-	-	
	101-0,2011		
	BWFS0	1 Bsmi	nt wfl. slat
	1101-0,2011		
	FSBW0	1 Fl. sla	ab-bsmnt w
		-	
	Typ br [m] Ur [W/m²K] Ψg [W/mK] Ψi [W/mK] fRsi=0.25 m²K/W WIBO br [m] Ur [W/m²K] Ψg [W/m²K]	Typ 01 br [m] Ur [W/m²K] Ψg [W/mK] Ψi [W/mK] Ψi [W/mK] Φi [W/mK] Ψi [W/mi] Ψi [W/mi] Ψi [W/mi] Ψi [W/mi] Ψi [Wi/mi] Ψi [Wi/mi] Ψi [Wi/mi] Ψi [Wi/mi] Ψi	Typ 01 02 br [m]

Roc	of window side	RORI01	Ridge
	0,014	Ψ [W//mK]	
	0,89	f _{Rsi=0,25} m²K/W	

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