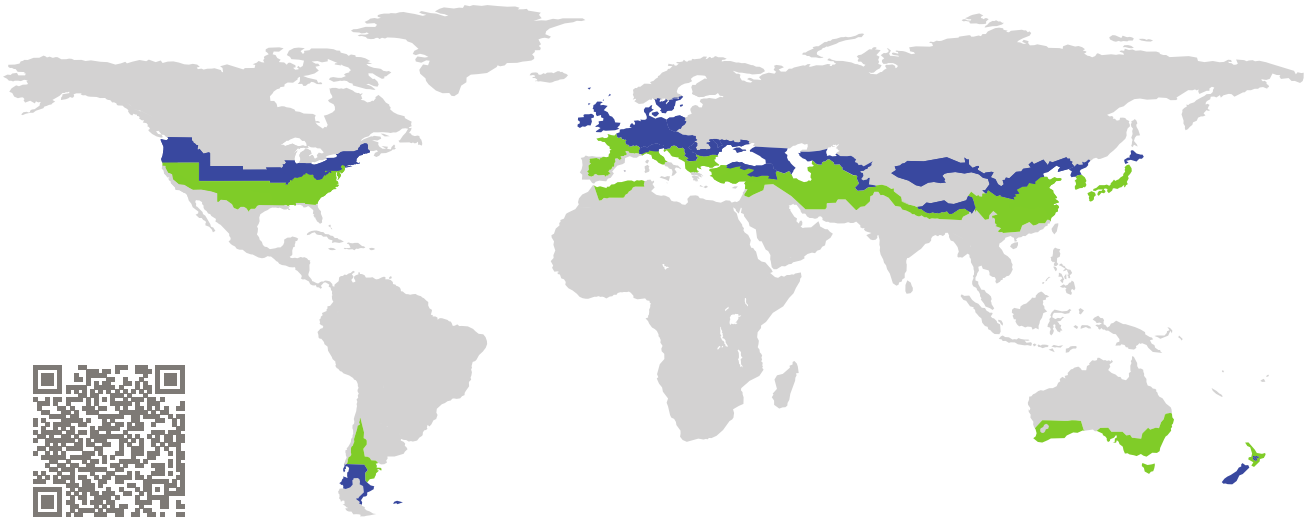
CERTIFICATE

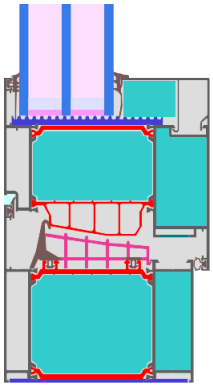
Certified Passive House Component

Component-ID 1167wi03 valid until 31st December 2018

Passive House Institute
Dr. Wolfgang Feist
64283 Darmstadt
Germany



Category:	**Window Frame**
Manufacturer:	**Baoding Jingyi Door & Window Manufacture Co. Ltd., Baoding, People's Republic of China**
Product name:	**JINGYI-A100 Window**



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

Comfort	U_W = 0.80	≤	0.80 W/(m² K)
	$U_{W,installed}$	≤	0.85 W/(m² K)
	with U_g	=	0.70 W/(m² K)
Hygiene	$f_{Rsi=0.25}$	≥	0.70

cool, temperate climate

phC

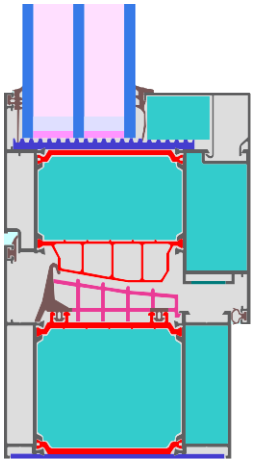
CERTIFIED COMPONENT

Passive House Institute

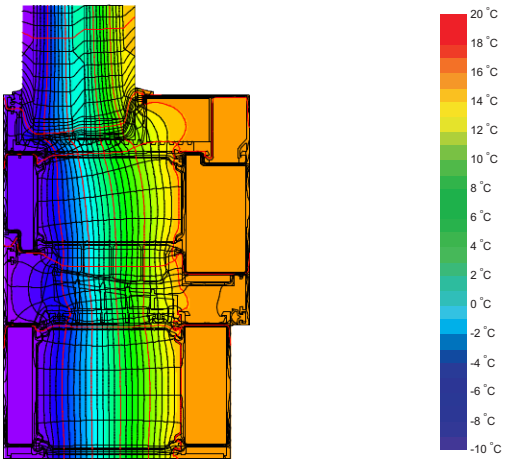
Passive House efficiency class	phE	phD	phC	phB	phA

www.passivehouse.com

Baoding Jingyi Door & Window Manufacture Co. Ltd.
4931 Tianwei West Road, 071000 Baoding, People's Republic of China
☎ +86-312-7131329 | ✉ jingyiwindows@163.com | 🖱 http://www.bdjymc.com |



Calculation model



Isothermal

Description

Thermally broken aluminium window frame insulated with PIR insulation (0,022 W/mK). Pane thickness of 50mm (5/17.5/5/17.5/5). Rebate depth of 20mm. Spacer: SWISSPACER Ultimate.

Explanation

The window U-values were calculated for the test window size of 1.23 m × 1.48 m with U_g = 0.70 W/(m² K). If a higher quality glazing is used, the window U-values will improve as follows:

Glazing	U_g =	0.70	0.64	0.58	0.52	W/(m² K)
		↓	↓	↓	↓	
Window	U_W =	0.80	0.76	0.73	0.69	W/(m² K)

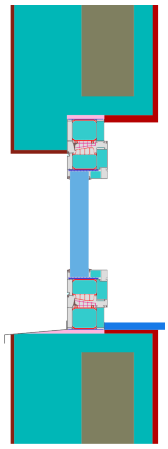
Transparent building components are classified into efficiency classes depending on the heat losses through the opaque part. The frame U-Values, frame widths, thermal bridges at the glazing edge, and the glazing edge lengths are included in these heat losses. A more detailed report of the calculations performed in the context of certification is available from the manufacturer.

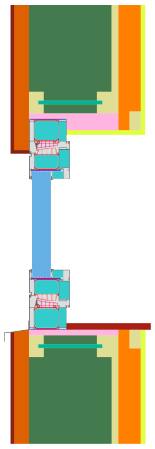
The Passive House Institute has defined international component criteria for seven climate zones. In principle, components which have been certified for climate zones with higher requirements may also be used in climates with less stringent requirements. In a particular climate zone it may make sense to use a component of a higher thermal quality which has been certified for a climate zone with more stringent requirements.

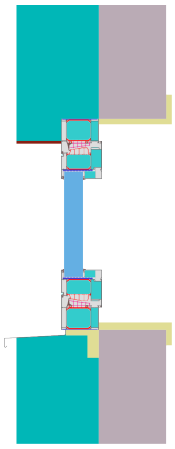
Further information relating to certification
can be found on www.passivehouse.com and passipedia.org.

Frame values		Frame width b_f mm	U-value frame U_f W/(m² K)	Ψ-panel edge Ψ_g W/(m K)	Temp. Factor $f_{Rsi=0.25}$ [-]
Top	(to)	161	0.77	0.029	0.78
Side	(s)	161	0.77	0.029	0.78
Bottom	(bo)	161	0.77	0.029	0.78
Mullion flying	(fm)	185	0.78	0.028	0.78
Spacer: SWISSPACER Ultimate			Secondary seal: Polysulfide		

Validated installations

Formwork blocks (operable)	
U_{Wall} = 0.15 W/(m² K)	
	
$\Psi_{install}$	W/(m K)
Top	0.011
Side	0.011
Bottom	0.021
$U_{W,installed}$ = 0.84 W/(m² K)	

Lighthweight timber top (operable)	
U_{Wall} = 0.13 W/(m² K)	
	
$\Psi_{install}$	W/(m K)
Top	0.012
Side	0.012
Bottom	0.025
$U_{W,installed}$ = 0.84 W/(m² K)	

Exterior insulation and finishing system (EIFS) (operable)	
U_{Wall} = 0.15 W/(m² K)	
	
$\Psi_{install}$	W/(m K)
Top	0.010
Side	0.010
Bottom	0.036
$U_{W,installed}$ = 0.84 W/(m² K)	