

**SAFEENERGY**

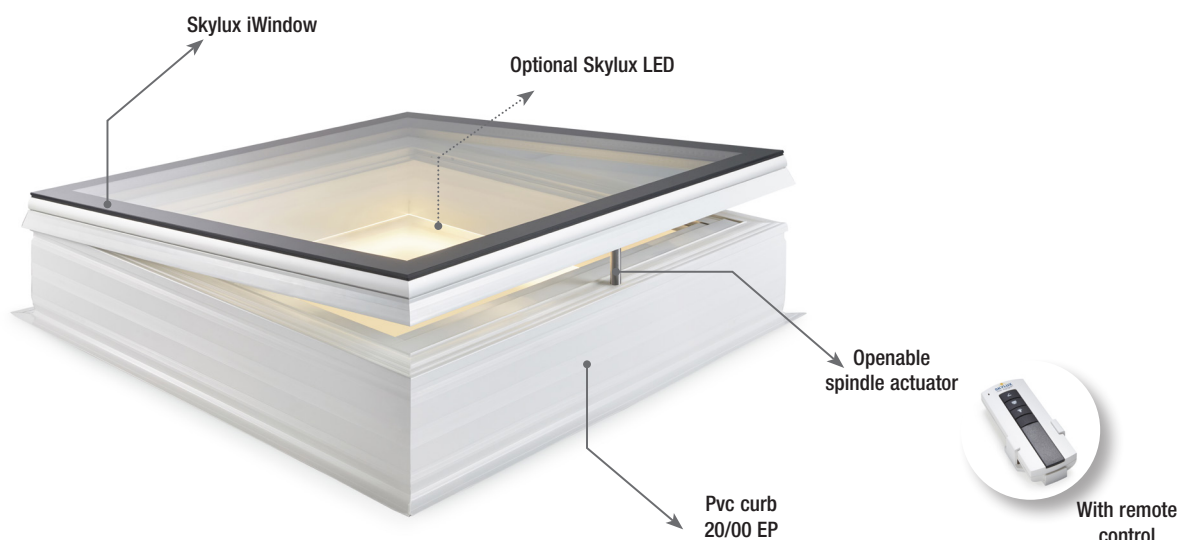
TECHNICAL FILE

# Skylux<sup>®</sup> iWindow2<sup>™</sup> & iWindow3<sup>™</sup>

Complete set glass skylight



**SKYLUX<sup>®</sup>**  
*Hello daylight!*



## General product description

The Skylux® iWindow is a super insulating flat glass skylight with a stern design, excellent U-values and an optimal light spread for applications in flat roofs. It's composed of a compact and insulating pvc frame with super insulating safety glass (iWindow2 with double safety glazing HR++/iWindow3 with triple safety glazing HR+++ ) and a stern anodised aluminium frame. The glass is tempered and has a ceramic rim to obtain an aesthetic and smooth visual integration into the roof.

The finished iWindow2 or iWindow3 as glass dome in **fixed (F)** or **openable (O)** model is premounted on a Skylux pvc curb 20/00 EP (+ 20/00 EP-S) and constitutes a **complete set**. The pvc curb has a built-in detection unit with remote control. The openable model (O) has a built-in spindle actuator and is suited for ventilation. Optionally you can also opt for a rain detector.

Possible options for both fixed (F) and openable (O) models are :

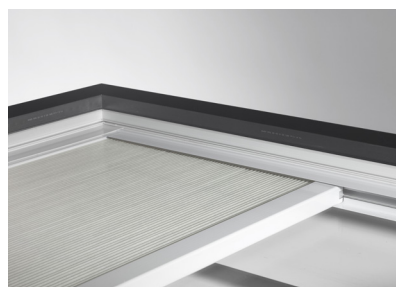
- the built-in LED lights with remote control(L):  
the LED lights are built-in in the groove underneath the pvc curb 20/00 EP, and are covered by an opal polycarbonate cover profile
- premounted electric inner sunblind with remote control (S):  
a premounted electric inner sunblinds keeps sunlight and sun warmth outside.

These options must be purchased when ordering the frame.

The built-in detection unit also has open contacts to connect fixed push-buttons, or to allow the functioning upon a domotic system. The Skylux iWindow20/00 EP (+ 20/00 EP-S) complete sets are suitable for flat roofs and for gradients between 0° and 25°. Installation under 5° is recommended to avoid the glass getting dirty and water stagnation.

### Different types:

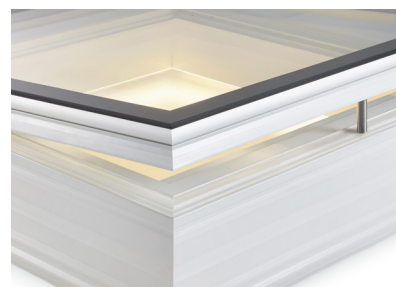
Types:	Fixed model (F)			Openable model (O)			
	FL	FS	FLS	O	OL	OS	OLS
Openable spindle actuator (O)	-	-	-	x	x	x	x
Built-in LED lights (L)	x	-	x	-	x	-	x
Premounted electric inner sun blind (S)	-	x	x	-	-	x	x



(S) electric inner sunblind



(O) openable with spindle actuator



(L) built-in LED lights

## Advantages

- complete rooflight product at any moment of the day
- maximum light spread equal to the daylight size
- built-in LED lights in option(L)
- exceptional insulation values (up to  $U_g = 0,50 \text{ W/m}^2\cdot\text{K}$ )
- good sound insulation
- air and water tight
- easy cleaning
- stern and elegant inside and outside finish
- premounted set, complete set
- burglar proof
- openable model available
- easy in use thanks to the remote control
- optional electric inner sunblind
- iWindow has a small thermal waste surface compared to the light spread surface



## Specific characteristics: Skylux iWindow2 & iWindow3 pvc frame

Mechanical characteristics	shock resistant pvc of frame quality type Benvic S white
Density according to ISO 1183	1450 kg/m <sup>3</sup>
Fire class according to EN 13501-1	E

## Specific characteristics: Skylux iWindow2 & iWindow3 glass

	Skylux iWindow2™	Skylux iWindow3™
Mechanical characteristics	HR++ double glazing	HR+++ triple glazing
Thickness	± 39 mm	± 61 mm
Weight	± 35 kg/m <sup>2</sup>	± 55 kg/m <sup>2</sup>
Light transmission according to EN 410	66,9 %	68,3 %
Solar factor according to EN 410	0,42	0,49
Sound insulation according to EN 717-1	39 (-3, -7) dB	41 (-2, -5) dB
$U_g$ value according to EN 673	1,0 W/m <sup>2</sup> K	0,5 W/m <sup>2</sup> K
Safety glazing NBN EN 356	min. type P2A (44.2)	min. type P2A (44.2)

## Specific characteristics: Skylux pvc 20/00 EP (+ 20/00 EP-S) curb

Mechanical characteristics	PVC of the type Benvic S white
Thermal characteristics	pvc with insulation
EN 10077-2:2012	$U_{up}$ -value 0,61 W/m <sup>2</sup> .K (insulation EPS separate with $\lambda = 0,035$ W/m <sup>2</sup> .K)
Sizes	Thickness: 62 mm (with bottom flange: 95 mm) Height: 20 cm (20/00 EP) / 40 cm (20/00 EP + 20/00 EP-S) Finished roof opening=daylight size + (4 cm) (Only with built-in LED lights )
Density	PVC: 1500 kg/m <sup>3</sup> (EPS insulation: 28 kg/m <sup>3</sup> )

\*  $U_{up}$ : U value (upstand) or insulation value of the curb according to EN 1873:2014+A1:2016 and determined with EN 10077-2:2012

## Specific characteristics: Skylux electric inner sunblind (S) optional

Functioning	24V DC
Functioning temperature	0°C to +60°C
Colour inside	light grey
Colour outside	light grey
Sunblind material	100% polyester, multi-layer (honeycomb) pleated fabric
Light transmission**	± 11% T (Transmitting)
Transmission of warmth**	± 12% T (Transmitting)

\*\* based on tests in combination with double layered glass; the sunblind is closed.

## Specific characteristics: Skylux LED lighting (L) optional

Functioning	24V DC
Functioning temperature	-10°C to +60°C
Colour	warm white ± 3000K
LED distance	120 LEDs/m
Flux	≥ 2400 lumen/5m
Durability	≥ 40.000 h
At the bottom of the pvc curb 20/00 EP	

## Specific characteristics: assembled system Skylux iWindow on pvc curb 20/00 EP (+ 20/00 EP-S)

	Skylux iWindow2™		Skylux iWindow3™	
	20/00EP+	20/00EP-S	20/00EP+	20/00EP-S
Urc***-value (W/m <sup>2</sup> .K)	0,93	0,84	0,63	0,62
Arc <sup>(1)</sup> surface (m <sup>2</sup> )	3,09	4,14	2,96	4,17

\*\*\* Urc = U value of the set (glass, frame and curb) and is determined for daylight size 120x120 according to EN 1873:2014+A1:2016

<sup>(1)</sup> Arc = surface of the skylight with curb, determined for daylight size 120x120 according to EN 1873:2014+A1:2016

## Specific characteristics: Skylux integrated spindle actuator (O)

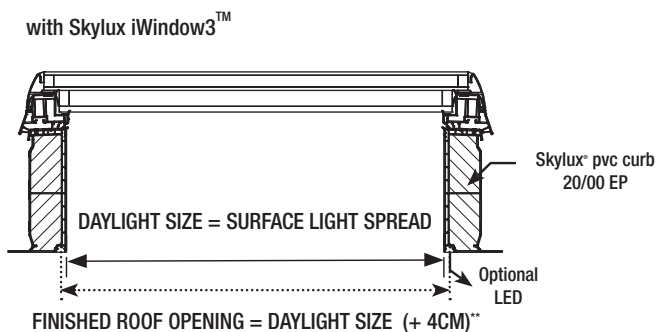
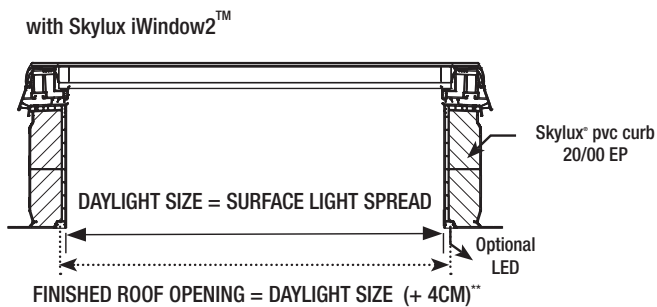
Opening height	± 10 cm
Tension	24V DC
Current	3A
Consumption	85W (of 0,5W in standby)
Ambient temperature	-20°C to +70°C
Engine force opening	1500N
closing	100N
locked position	1500N
Durability	10.000 open/close cycles
Functioning cycle	10%, max. 2min./18min.

## Available daylight sizes

Surface light spread (m <sup>2</sup> )	Daylight size (cm)	
	iWindow2™	iWindow3™
0,36	60 x 60	60 x 60
0,49	70 x 70	
0,64	80 x 80	80 x 80
0,81	90 x 90	90 x 90
1,00	100 x 100	100 x 100
1,44	120 x 120	120 x 120
1,50	100 x 150*	100 x 150*

\* the actuator is standard fixed on the long side

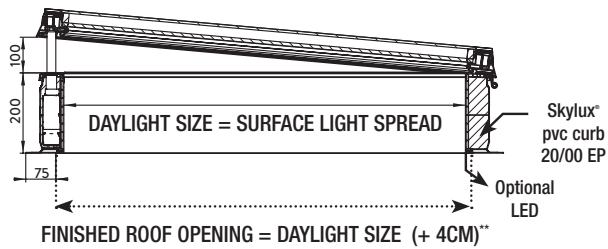
## Drawings fixed models



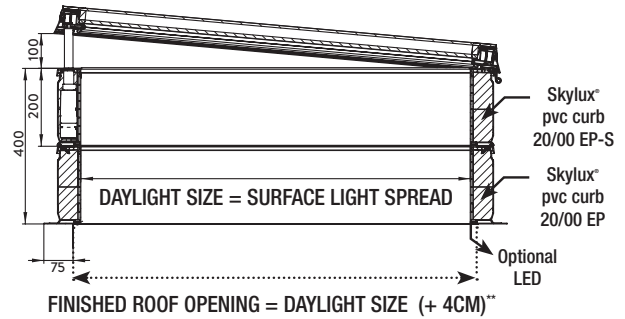
\*\* Only with built-in LED lights

## Drawings openable models (O)

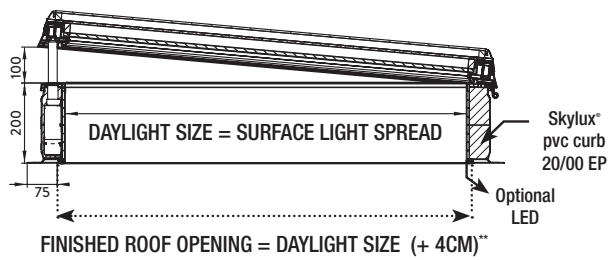
with Skylux iWindow2™



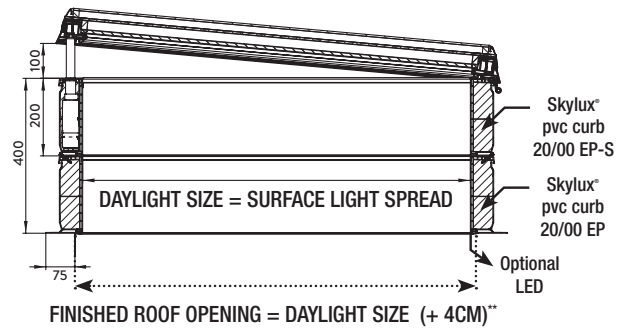
with Skylux iWindow2™



with Skylux iWindow3™



with Skylux iWindow3™



\*\* Only with built-in LED lights

## Attestations, certificates and documentation

- According to performances of EN 1873:2014+A1:2016, but no CE, as there is no specific norm for glass skylights

**BIM-ready  
files upon  
skylux.be**

*Hello daylight!*

OPEN & CLOSE  
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