# AERO® SKYE PRODUCT INFORMATION





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## SUN PROTECTION VENTILATION





# **DESCRIPTION**

Aluminium patio cover with a rotating and retractable bladed roof that perfectly blends in with the architecture of the existing support structure via integration or surface mounting.

- Fully retractable roof
- Durable rotation and sliding technology thanks to patented S-drive technology
- Fits perfectly with any existing or new architecture
- Can be joined in multiple parts on the span or pivot side
- Protection from the sun, rain and wind
- Controls via Renson® Connect app\*



One roof section



blades closed





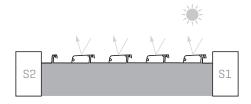


blades retracted

<sup>\*</sup> Full operation via the Renson Connect app is only possible in countries where Somfy io is legally allowed. In countries where only Somfy RTS is allowed, operation of Fixscreen, Led-lighting and heating is done via separate hand transmitter.

# **BENEFITS**

# Design



- 1 THE ROOF IS COMPLETELY FLAT WHEN CLOSED
- 2 MINIMAL GAPS BETWEEN THE BLADES
- **3 MINIMALIST DESIGN**
- **4 INVISIBLE SCREWS**

create an elegant and sleek structure

# Quality





#### 1 'TRAIN' SYSTEM (OTHER BRANDS ON THE MARKET)

Only the first blade (the locomotive) is driven, and all other blades (the carriages) are passively pulled along.

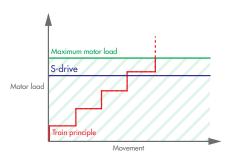
#### 2 SYNCHRONISED DRIVE ON **BOTH SIDES OF THE BLADES**

Even with an asymmetric load, the roof will open and close in one smooth movement

#### 3 RENSON® S-DRIVE

#### INNOVATION

Driven by a spindle that evenly distributes traction across all blades.





#### 4 SPINDLE FOR SLIDING BLADES

INNOVATION

#### **5 TROLLEYS ON RAILS ENSURE SMOOTH AND STABLE MOVEMENT**

Each blade is driven individually

- **6 HEXAGONAL AXLE FOR ROTATING BLADES**
- 7 STRONG, DOUBLE-WALLED BLADES **CAN HANDLE HEAVY SNOW LOADS**

#### 8 UNIQUE END CAPS

provide a solid corner connection and perfect water drainage

9 WELDED ALUMINIUM DRIPS, POWDER **COATED TO MATCH THE COLOUR OF** THE ROOF BLADES



#### **10 SPLASH PREVENTION**

Via integrated water channels with diffusers

#### 11 HIGH WATER DRAINAGE FLOW

Through the wide blade gutters

## **Customisation**

For more information about the possible accessories, see the 'Accessories' section and/ or the product information for the various accessories.



## **Comfort**

#### **1 MAXIMUM NATURAL LIGHT**

The blades not only rotate through 135°, they can also be fully retracted.

#### 2 SPECIALLY DEVELOPED GUTTER BORDER

#### INNOVATION

Prevents your patio and furniture from getting wet when the blades are opened following a rain shower

#### 3 SILENT AND SOFT CLOSING MECHANISM BY ADDING A BRUSH TO THE BLADES

#### **4 QUICK INSTALLATION**

Thanks to maximum pre-assembly and the modular structure of the various junctions.





# **TECHNICAL DETAILS**



Dimensions	
Span	Min. 1800* – max. 4500 mm
Pivot	Min. 3250 – max. 6200 mm
Passage height	N/A
Total height with blades closed	260 mm (= frame height)
Total height with blades 90° open	355 mm (= frame height 260 + 95 mm)
Blade rotation	Max. 135°
Minimum number of water drainage points < 16 m²	1
Minimum number of water drainage points > 16 m²	2
Operating methods	
Renson Connect app **	✓
Renson Connect + remote control ***	✓
Home automation ready	✓

<sup>\*</sup> Smaller dimensions (span min. 1800 mm) possible by special request to presales – drawing office.

## **Electrical bladed roof drive**

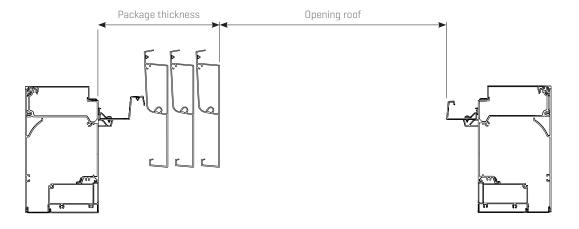
Parameters	Value
Supply voltage	230 Volt AC, 50 Hz
Transformer current range	0 – 3.5 Ampère
Transformer power	2 x 150 W
Motor voltage	24 Volt DC
Motor nominal current	6 Ampère
Protection rating	IP 65
Maximum running time with continuous use	Approx. 10 minutes
Automatic	16 A Curve C

<sup>\*\*</sup> Full operation via Renson Connect app, for countries where Somfy io is legally allowed.

<sup>\*\*\*</sup> For countries where only Somfy RTS is allowed, operation of the roof is via Renson Connect app and operation of LED and/or heating is via hand transmitter.

# Overview stacked package and opening roof

Pivot in mm	Number of blades	Thickness package in mm	Opening roof in mm
3250	13	768	2125
3410	14	818	2260
3625	15	868	2425
3840	16	918	2590
4055	17	968	2755
4270	18	1018	2920
4485	19	1068	3085
4700	20	1118	3250
4915	21	1168	3415
5130	22	1218	3580
5345	23	1268	3745
5560	24	1318	3910
5775	25	1368	4075
5990	26	1418	4240
6200	26	1463	4270



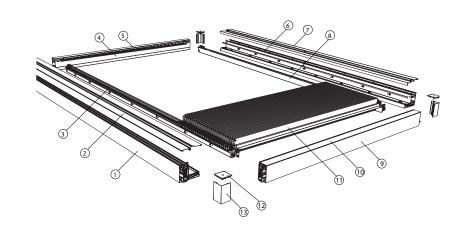


# Standard configuration

- Roof structure to be placed on the top of or to be integrated in an existing support structure.
- Customisation of the span and pivot with mm precision.
- Patented S-drive motor

# Finishing:

- Seaside Quality A
- Monocolour or dual colour according to Renson standard colours
- Integrated water drainage (incl. anti-splash diffusers in the gutter)



1	Pivot beam 2 + front cover
2	Top cover (2 parts)
3	Skye mechanism P2
4	Span beam 1
5	Top cover (1 part)
6	Pivot beam 1 + front cover
7	Top cover (2 parts)
8	Skye mechanism P1
9	Span beam 1 + front cover
10	Top cover (1 part)
11	Blades
12	Top cover
13	Corner cover

# Aero Skye weight

				Total weight	t (kg) of entire Aero Sky	ye		
					Span			
# blades	# blades	1500	2000	2500	3000	3500	4000	4500
3250	13	235	268	300	333	366	398	431
3410	14	245	279	313	347	382	416	450
3625	15	257	292	328	364	400	435	471
3840	16	268	306	343	380	418	455	492
4055	17	280	319	358	397	436	475	514
4270	18	292	333	373	414	454	494	535
4485	19	304	346	388	430	472	514	556
4700	20	316	360	403	447	490	534	577
4915	21	328	373	418	463	508	553	598
5130	22	340	386	433	480	526	573	620
5345	23	352	400	448	496	544	593	641
5560	24	364	413	463	513	563	612	662
5775	25	375	427	478	529	581	632	683
5990	26	387	440	493	546	599	652	704
6200	26	396	449	502	555	607	660	713

The table above shows the weight of the Skye structure.

Pivot beam weight	16.82844	kg/m
Span beam weight	12.54315	kg/m
Skye beam weight	3.7	kg/m
Blade weight	3.1	kg/m
Fixed blade weight	0.59	kg

# Aero Skye snow load

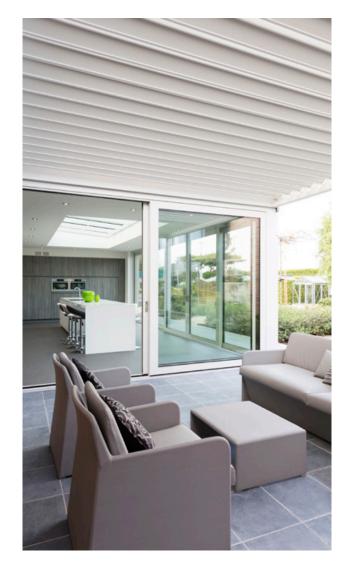
# Single Aero Skye

For span lengths < 3625 mm, the load-bearing capacity is determined by the pivot length. For span lengths > 3625 mm, the load-bearing capacity is no longer determined by the pivot dimensions, but exclusively by the span length (blade length) instead.

	Aero Skye maximum snow load (kg/m²)											
						Spa	n					
	Dimensions in mm	2000	2250	2500	2750	3000	3250	3500	3750	4000	4250	4500
	4000	866	563	385	273	199	149	113	87	68	53	41
	4250	866	563	385	273	199	149	113	87	68	53	41
	4500	866	563	385	273	199	149	113	87	68	53	41
	4750	862	563	385	273	199	149	113	87	68	53	41
Pivot	5000	727	563	385	273	199	149	113	87	68	53	41
P	5250	619	536	385	273	199	149	113	87	68	53	41
	5500	530	459	385	273	199	149	113	87	68	53	41
	5750	457	395	348	273	199	149	113	87	68	53	41
	6000	396	342	301	268	199	149	113	87	68	53	41
	6200	354	306	269	240	199	149	113	87	68	53	41



# **ACCESSORIES**



Sideways inserts	Comfort pack		Reorder
Algarve Fixscreen	Fixscreen + Lineo LED	-	-
Algarve Fixscreen	Sideways inserts		
Lapure Fixscreen	Integrated Fixscreen	-	-
Triangle	Algarve Fixscreen	-	-
Loggia® sliding panels	Lapure Fixscreen	-	-
Loggiascreen Canvas sliding door       -       -         Glass sliding panels       -       -         Linius wall       -       -         Linarte wall       -       -         Outdoor curtains       -       -         Comfort       -       -         Lighting       -       -         Lineo LED       -       -         UpDown LED       -       -         Lapure LED       -       -         Comfort and design       -       -         Beam Heat 8 Sound*       ✓       ✓         Lineo Luce       -       -         Lineo Fix       -       -         Lineo Heat       -       -         Waterproof wall mounting       -       -         Protecto protective profile       -       -         Automation       ✓       ✓         Wind sensor **       -       -         Rain sensor       ✓       ✓	Triangle	-	-
Class sliding panels	Loggia® sliding panels	-	-
Linius wall	Loggiascreen Canvas sliding door	-	-
Linarte wall	Glass sliding panels	-	-
Comfort           Lighting           Lineo LED         -	Linius wall	-	-
Comfort         Lighting       - <t< td=""><td>Linarte wall</td><td>-</td><td>-</td></t<>	Linarte wall	-	-
Lineo LED  Lineo LED  Lineo LED  Lineo LED  Lineo LED  Colomno LED  Lapure LED  - Lapure LED  - Comfort and design  Beam Heat & Sound*  Lineo Luce  - Lineo Fix  - Lineo Heat  Waterproof wall mounting  - Protecto protective profile  Automation  Wind sensor **  Rain sensor	Outdoor curtains	-	-
Lineo LED	Comfort		
UpDown LED	Lighting		
Colomno LED	Lineo LED	-	-
Lapure LED  Comfort and design  Beam Heat & Sound*  Lineo Luce  - Lineo Fix  - Lineo Heat  Waterproof wall mounting  - Protecto protective profile  Automation  Wind sensor **  Rain sensor  -  -  -  -  -  -  -  -  -  -  -  -  -	UpDown LED	✓	✓
Comfort and design         Beam Heat & Sound*       ✓         Lineo Luce       -         Lineo Fix       -         Lineo Heat       -         Waterproof wall mounting       -         Protecto protective profile       -         Automation         Wind sensor **       -         Rain sensor       ✓	Colomno LED	-	-
Beam Heat & Sound*       ✓         Lineo Luce       -         Lineo Fix       -         Lineo Heat       -         Waterproof wall mounting       -         Protecto protective profile       -         Automation         Wind sensor **       -         Rain sensor       ✓	Lapure LED	-	-
Lineo Luce	Comfort and design		
Lineo Fix  - Lineo Heat  - Waterproof wall mounting  - Protecto protective profile  - Automation  Wind sensor **  - Rain sensor	Beam Heat & Sound*	✓	✓
Lineo Heat  Waterproof wall mounting  - Protecto protective profile  -  Automation  Wind sensor **  - Rain sensor  -  -  -  -  -  -  -  -  -  -  -  -  -	Lineo Luce	-	-
Waterproof wall mounting         -         -           Protecto protective profile         -         -           Automation         -         -           Wind sensor **         -         -           Rain sensor         ✓         ✓	Lineo Fix	-	-
Protecto protective profile  -  Automation  Wind sensor **  -  Rain sensor  ✓  ✓  ✓	Lineo Heat	-	-
Automation           Wind sensor **         -         -           Rain sensor         ✓         ✓	Waterproof wall mounting	-	-
Wind sensor **         -         -           Rain sensor         ✓         ✓	Protecto protective profile	-	-
Rain sensor ✓	Automation		
	Wind sensor **	-	-
Sun sensor	Rain sensor	✓	<b>√</b>
	Sun sensor	-	-

<sup>\*</sup> Beam only possible on span side, not on pivot side

<sup>\*\*</sup> No physical wind sensor needed as can be set as for frost and snow during installation. Works based on the set country and zip code through an online weather server.

Styling		Reorder
Classic Line	-	-
Wooddesign roof blades	✓	✓
Columns		
Extra column	-	-
Shifted column	-	-
Adjustable wall column	-	-



# **CERTIFICATES & TESTING**

#### **CE - DoP documents**

CE / UKCA / DoC / DoP / ETA

#### Certificates

- REACH / seaside/coastal powder coating quarantee
- RoHS / AluEco
- VMRG sun protection

#### **Declarations**

- Declaration of material codes
- Declaration of powder coating
- Declaration of anodisation layer thickness
- Declaration of glass properties
- Declaration of fire resistance / reaction
- Declaration of endurance cycles
- Declaration of ashestos
- Declaration of UV resistance / gtot + others

#### Test reports - calculations

- Environmental statement (recycled aluminium)
- Anchoring requirements
- Wind (load) testing / verification certificate

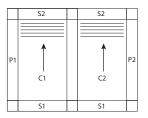
Wind guarantee of roof with blades closed	up to 120 km/h
Wind guarantee of roof with blades retracted	up to 160 km/h
Wind guarantee with blades extended and rotated to a vertical position (90°)	up to 120 km/h
Fixscreen wind guarantee when closed	N/A
Roof operation	up to max. 50 km/h
Water drainage flow	150 l/m².h
Load-bearing capacity	100 kg/m <sup>2</sup>

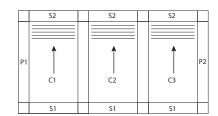
#### **Application in sandy environments**

The abrasive effect of sand can cause blockages of the Skye mechanism. Therefore the application of Skye systems is not allowed at less than 200 meters from sandy environments such as sandy beaches, dunes, deserts...



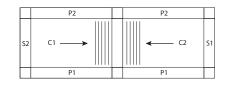
# **CONFIGURATION**





- Two-part or three-part joined
- Blade retraction: same direction for all roof sections
- For surface mounting or integration

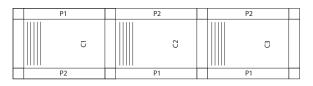
	P2	P2	
S2	<b>←</b> C1	C2	S1
	P1	P1	





- Two-part or three-part joined
- Blade retraction: same direction, towards one another, away from one another
- For surface mounting or integration

The blades of the two roof sections will rotate differently relative to one another in the two setups below:









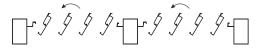


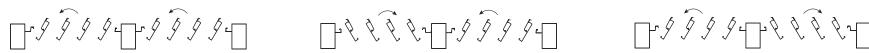


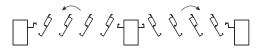




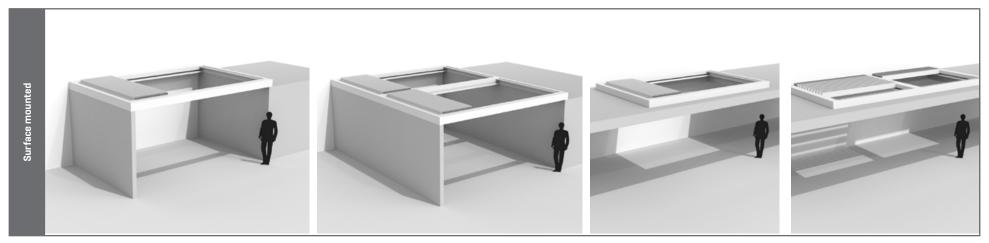




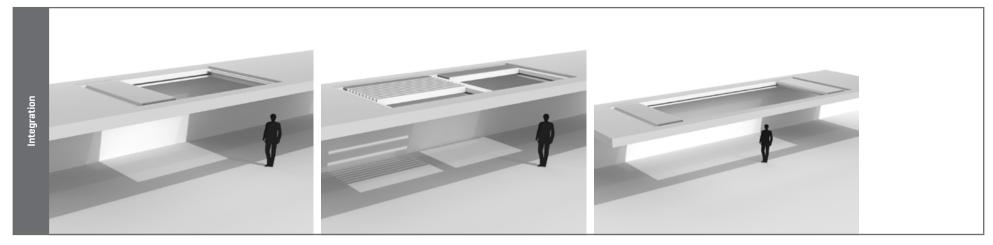




# **Construction method**

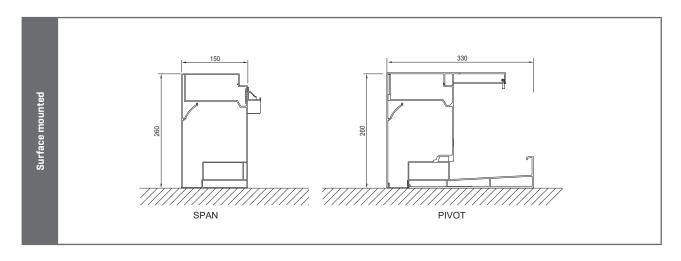


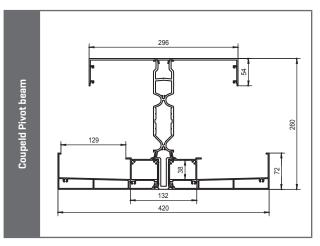
In this construction method, the frame is placed on an existing structure. The installer will need to drill the required installation holes.

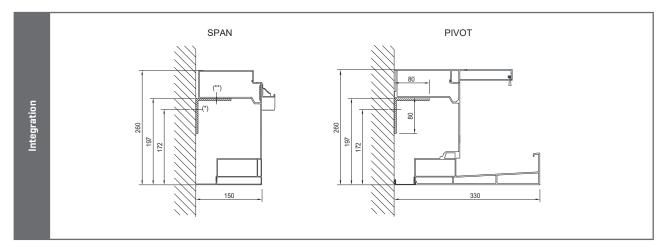


If the frame is to be integrated into an existing opening, it will be affixed sideways in the opening.

# **Profiles**







## Outer corner finishing cover

When ordering, please specify the construction method for each span and pivot side.

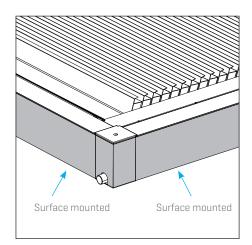
Depending on which one of the two construction methods you opt for, there is also a significant difference in terms of the finishing cover supplied for the outer corner.

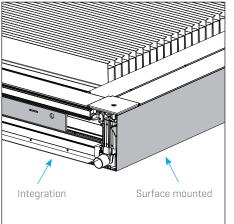
- Surface mounted: includes finishing cover for the side in question
- Integrated: no finishing cover for the side in question and no front cover on the integration side(s), as these are replaced by an L-shaped wall-mounting profile.

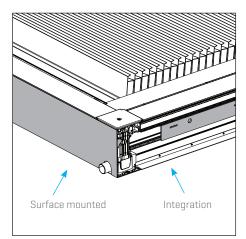
## **Bottom finishing cover**

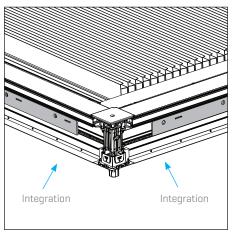
The bottom finishing cover protrudes a few mm from the underside of the structure. If you place Aero Skye on top of another structure, you have the possibility to do so without the bottom finishing cover. That way, the bottom of the profiles fit nicely against the support structure.

If the bottom of the frame profiles is to be finished with another material and will ultimately no longer be visible, there is no need to place a finishing cover on the bottom corners.









# **Blade orientation**

### Installation

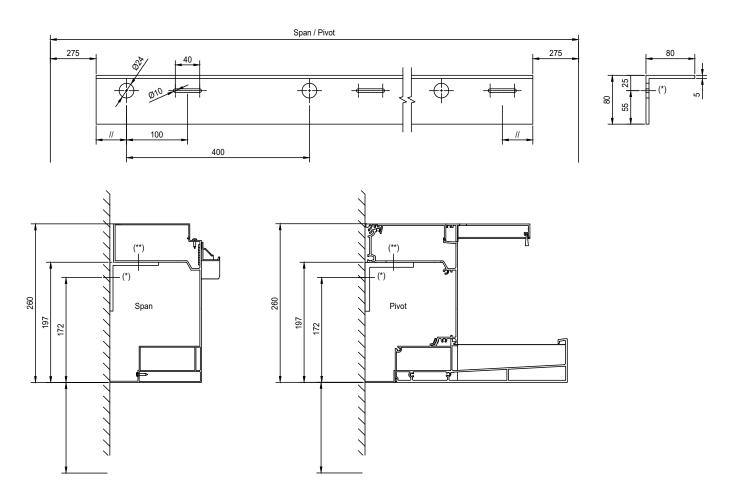
For Aero Skye, you must select the construction method for each side [span [S] - pivot [P]] when ordering. You can choose between integration and surface mounted when doing so.

#### **Surface mounted**

No screws are supplied as these need to be suitable for the supporting structure, which differs from situation to situation.

## Integration

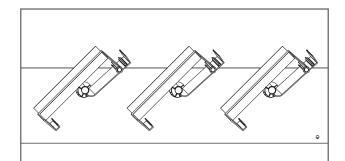
A wall-mounting profile is supplied if Aero Skye is to be integrated. Only the screws required to fasten the frame profile to the wall-mounting profile are supplied. No screws are supplied to fasten the frame profiles to the existing structure, as these need to be suitable for the supporting structure, which differs from situation to situation.



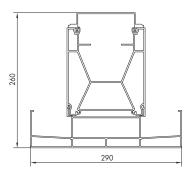
# Water drainage

## Water drainage direction

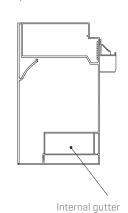
The blades are double-walled, with part serving as a gutter. The blades sit at an angle of 3 cm. From the wide blade gutter, water will mainly drain to the lowest side and flow into the structure's integrated gutters. The structure is fitted with an integrated gutter all around.



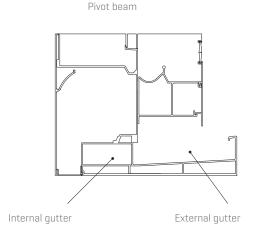
The specially developed gutter border prevents your patio and furniture from getting wet when the blades are opened following a rain shower.

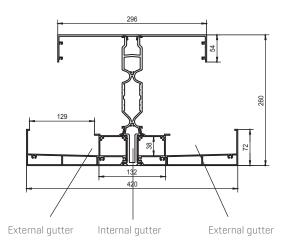


Coupeld Pivot beam



Span beam

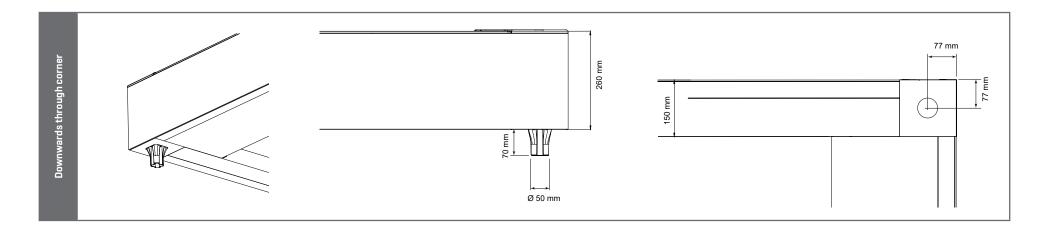


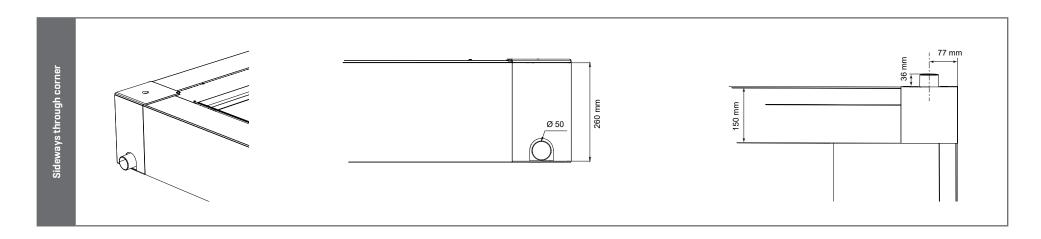


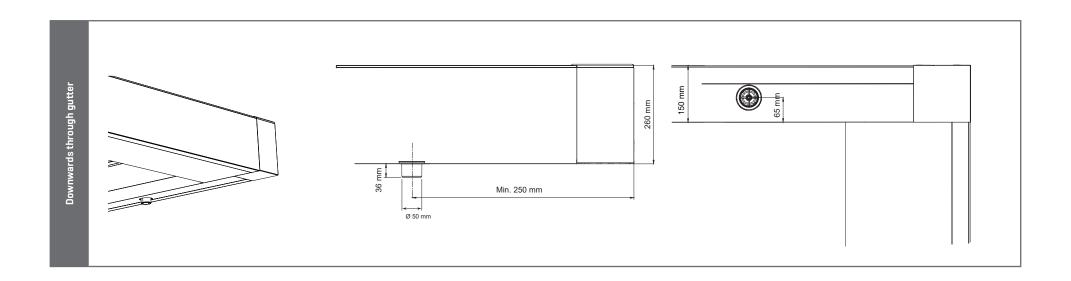
# Water drainage types

Water drainage can occur in three ways:

- Downwards through corner
- Sideways through corner
- Downwards through gutter







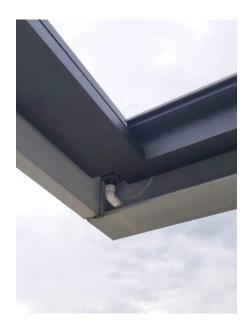
# Number of water drainage points

Water will be drained down an integrated drainpipe in the columns of your choice. Starting at 16 m², a minimum of two water drainage outlets must be provided for each roof section, of which at least one drain must be on the lowest side of the blades (not on the motor side). For all other dimensions, at least one drain must be arranged on the lowest side of the blades (not on the motor side).

#### Please note!

If there is only one water drainage column and the surface area is greater than 16 m², the drainage capacity of the roof will only be 90 litres per hour  $[0.025 L/m^2.s].$ 

# **Surface-mounted installation**

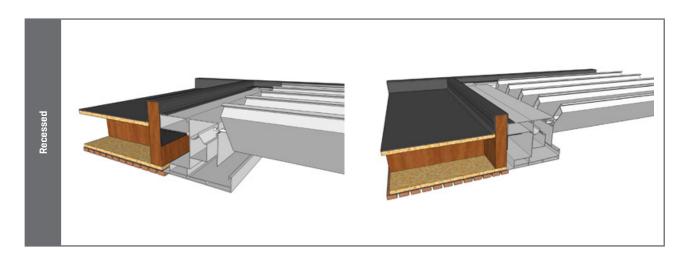


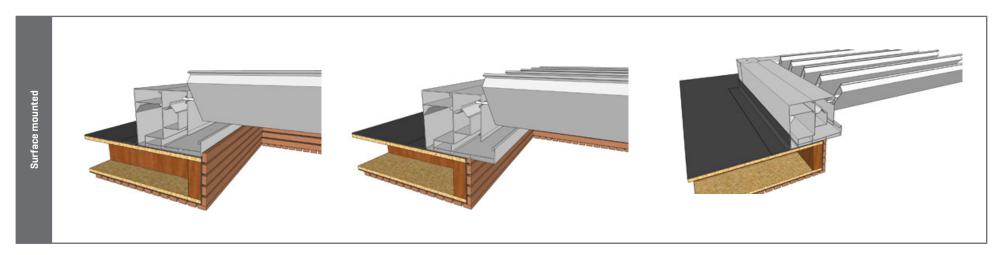






# Finishing







# **OTHER TOOLS**

Want to find out more? Visit the **Professional Portal on our website** (www.renson.eu) to access the following tools.

- Technical drawings
- Training documents
- Installation manual
- User manual
- Digital photo book & social media