

// THE ENGINEERING //

CERO
the invisible window





// CERO – THE INVISIBLE WINDOW. MORE THAN JUST A SLIDING WINDOW //

The generously sized CERO glass panels don't just offer countless options for design and architectural freedom, but have also been thought through down to the tiniest technical detail. Solarlux is the market leader in the folding glass door field, and as one of the company's brands, CERO guarantees precision, clever technical details, continuous further development and solid technical support with planning questions. Needless to say, CERO, like every other Solarlux product, is „Made in Germany“. Anyone who chooses to include „CERO – the invisible window“ in their building projects expects more than simply reliability, more than technical sophistication, and more than problem-free assembly. And whoever uses CERO expects more than just a sliding window of maximum size.

// SYSTEM //

Horizontally movable, large-area glass panels combined with fine, elegant frames and highly thermally insulating aluminium sections are what makes CERO the invisible window. Maximum architectural freedom is achieved thanks both to versatile possibilities for combining the sliding and fixed elements and to corner solutions. This means that almost every requirement can be implemented equally well.



Design freedom

- / Floor-to-ceiling glazing with elements of up to 4 x 6 metres in size
- / Sliding and fixed elements can be combined as desired
- / Almost unlimited opening possibilities
- / Free-standing corner solutions: no post is left standing when opened
- / Independent colour choice for the interior and exterior sides
- / Panel sections almost completely integrated into the surround frame
- / Surround frame fits flush against the wall, ceiling and floor
- / All-glass corners of staged insulated glass can be implemented

Face widths

- / Panel frame: 52 mm, of which 34 mm are visible
- / Surround frame: 79 mm, can be fully covered
- / Stile sections: 34 mm
- / Handle sections: 34 mm

Element sizes

- / Panel width up to 4000 mm
- / Panel height up to 6000 mm
- / Panel area up to 15 m²
- / Panel weight up to 1,000 kg

Handles

- / Continuous handles over the entire panel height
- / Linear, functional form
- / Fastened unobtrusively to the glass frame

Sun protection

Every CERO system can be combined without difficulty with equipment that ensures individually optimised light entry. Slatted blinds and vertical awnings are just two of the ways in which optimum control of incoming sunlight and shade can be achieved – according to situation and conditions.

// CONSTRUCTION & TECHNOLOGY //

All the experience gathered by Solarlux in the fields of sections and sliding technology, drainage and window construction over more than 30 years of the company's history have contributed to the construction and technology of CERO. Always bearing in mind the special demands that come with the use of a maximum-size sliding window.

Section installation depth

- / Panel frame: 72 mm (glass thickness maximum 54 mm)
- / Surround frame: 91 mm (1-runner), 197 mm (2-runner), 303 mm (3-runner)
- / Large panel installation depth permits the use of anti-fall glazing when required

Sliding technology

- / Stainless steel carriages integrated into the panel ensure even force distribution
- / Sliding technology in the panel protected against soiling and impacts, therefore low wear and tear
- / Carriages easily replaced if necessary
- / Double-row deep groove ball-bearings for low-noise running
- / Panel slides smoothly with minimum applied force

Runners

- / Integrated stainless steel runners in the floor tracks
- / Easily cleaned
- / Partially folding for runner drainage

Seals

- / Reinforced brush seals ensure seamless impermeability
- / Two additional sealing layers in the stile region

Drainage

The drainage system corresponds to that of a folding glass door. The panel sections are not glued tight, but are pushed on. In contrast to conventional Sliding Systems, this means that controlled drainage is possible for the first time.

- / High water resistance through lowered drainage duct
- / Hidden drainage
- / A drainage gutter can be attached
- / Ventilation of the glazing rebate for controlled back-ventilation of the panel edge structure



// PROPERTIES //

It's the details of the construction and engineering that make CERO what it is: an invisible window which, of course, satisfies all the demands of comfortable, open living. The company's own test laboratory, and the in-house research and development department at Solarlux, test and develop CERO continuously, so that it meets the toughest demands.



Thermal insulation

- / Thermal insulation through glass-fibre reinforced polyamide cross-pieces in the surrounding and panel frames
- / Uw values depend on the particular implementation and on the glazing used

Sound insulation

- / Improved sound insulation through the use of sound insulating glazing (dB values on request)

Driving rain watertightness

- / Driving rain watertightness through multiple sealing layers and optimum drainage ducts inside the sections

Air permeability

- / The high requirements according to DIN EN 12207 are fulfilled by constructively designed sealing levels

Resistance to wind load

- / With the largest possible area, the system withstands the wind strength according to DIN EN 12210

Security

- / Two-point locking mechanism as standard, with locking spigots above and below in adjustable closing parts
- / Optional use of lock monitoring (reed contact)
- / Can be extended with a variety of signalling systems such as glass breakage detectors with integrated alarm system, bolt sensing for correct locking
- / Connection can be made to higher-level control and monitoring systems

// GLASS & SURFACE //

Glass is the characteristic theme of CERO. It is the glass itself that makes CERO the invisible window and, at the same time, so evidently secure. Individual colouring and surface treatment on the inside and outside are possible in the design of the frame sections, so that unique accents can be set for every building project, or the new façade can be perfectly matched to what already exists.



Panes

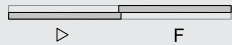
- / Triple glazing
- / Pane thicknesses up to 54 mm (50 mm standard)
- / Special function glasses can be used
- / Tempered safety glass used exclusively
- / Extremely high mechanical strength (flexural strength of 120 N/mm²)
- / Functional glasses protecting against break-ins, bullets and noise can be used

Individual colour design and coating

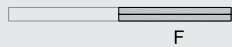
- / Two-colour implementation possible
(separate inside and outside colours)
- / Special colours, anodised protective coating if desired
- / Powder coating in all RAL and DB colours, with highly weatherproof special-effect or metallic pigments if desired
- / Anodised protective layer in all standard colours and usual processing techniques (E0 to E6)
- / Pre-anodisation for improved corrosion protection

// SYSTEM SECTIONAL VIEWS //

Closed



Open

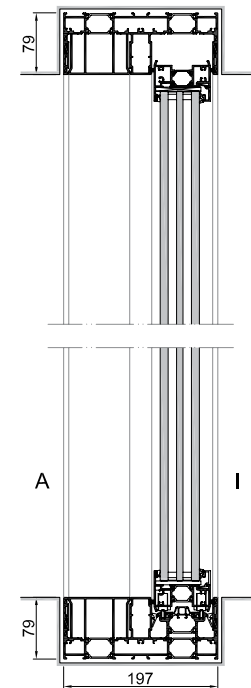
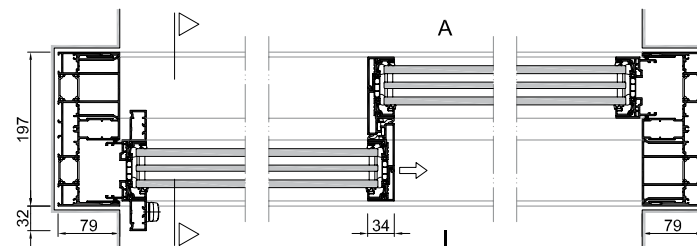


Variants



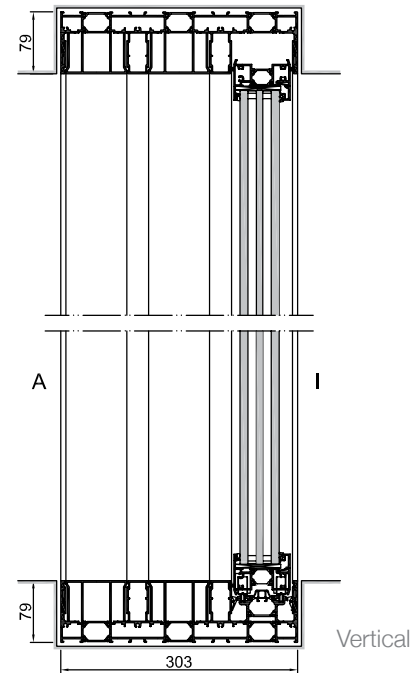
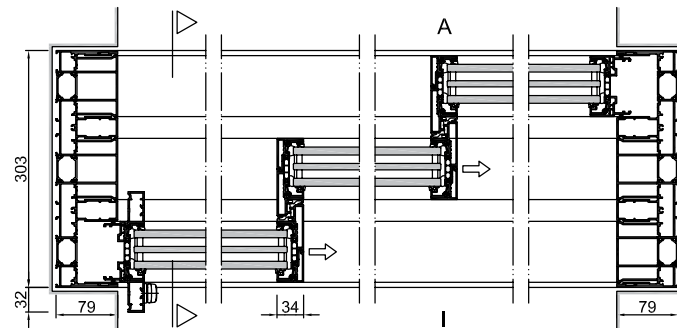
- / 2-runner
- / Sliding and fixed element
- / Also as fixed glazing

Horizontal



Vertical

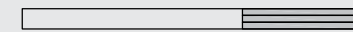
Horizontal



Closed



Open



Variants



/ 3-runner

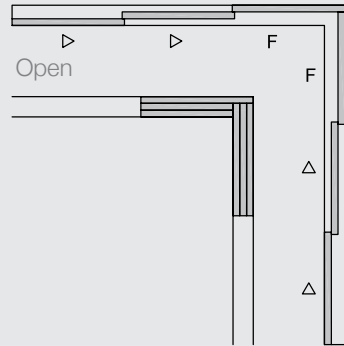
/ Sliding and fixed element

/ Also as fixed glazing

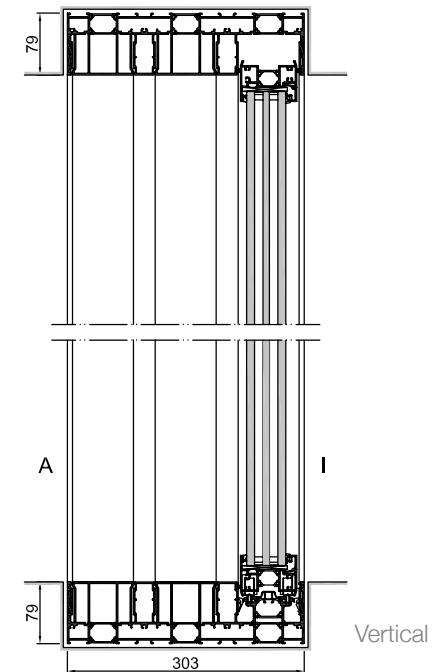
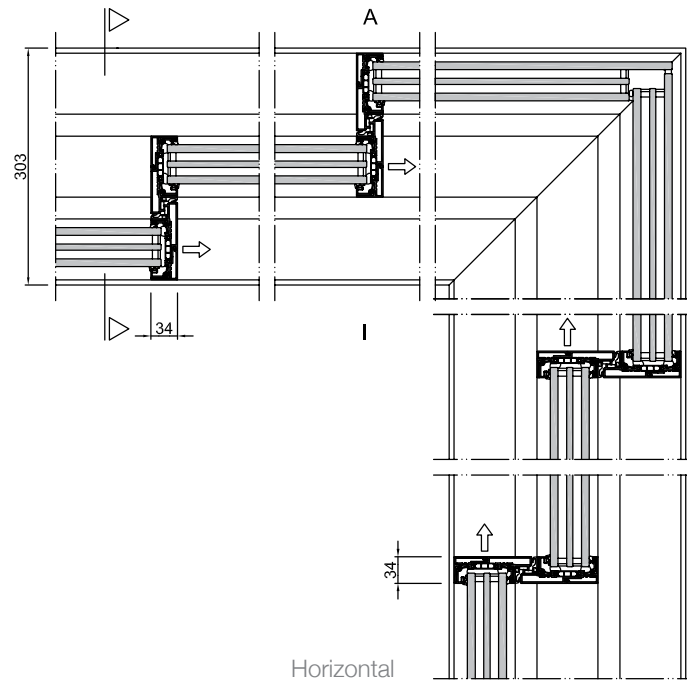
// SYSTEM SECTIONAL VIEWS //

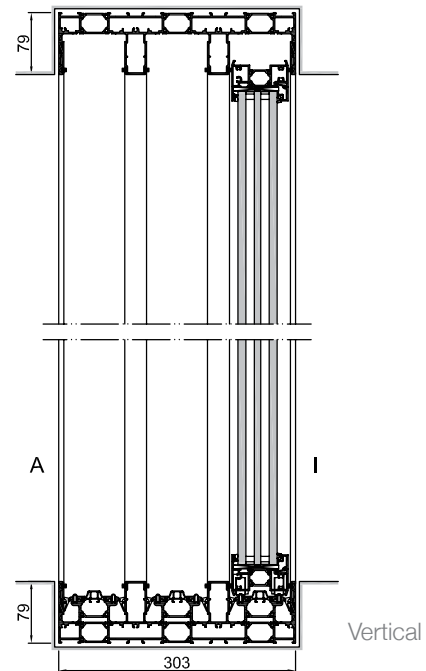
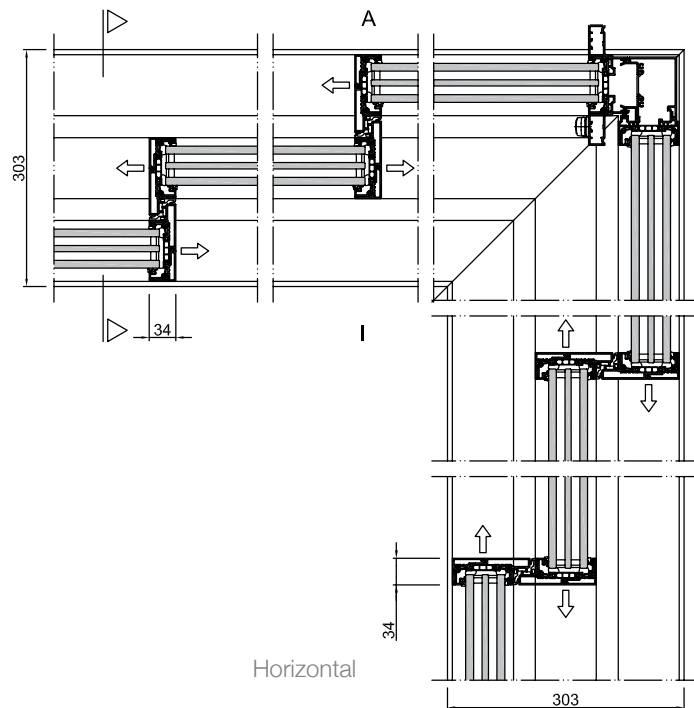
Closed

Open



- / 3-runner
- / Sliding and fixed elements
- / All-glass corner





Closed

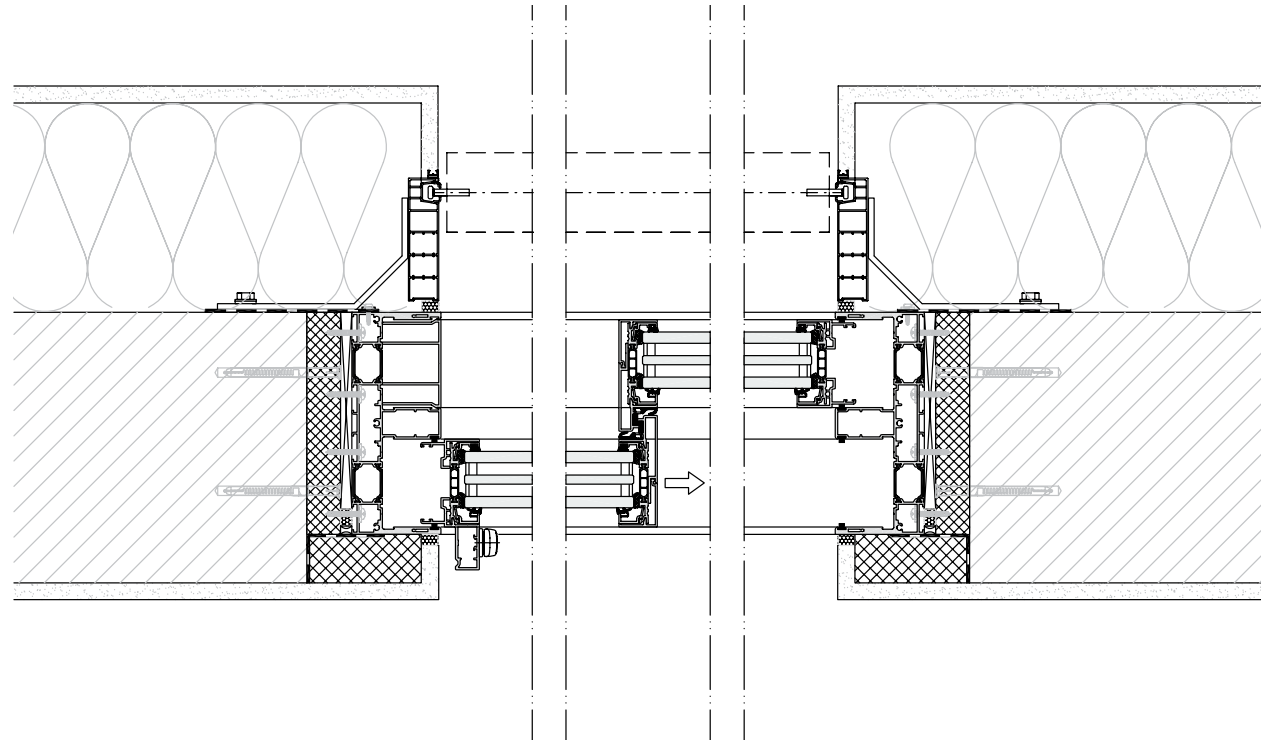
Open

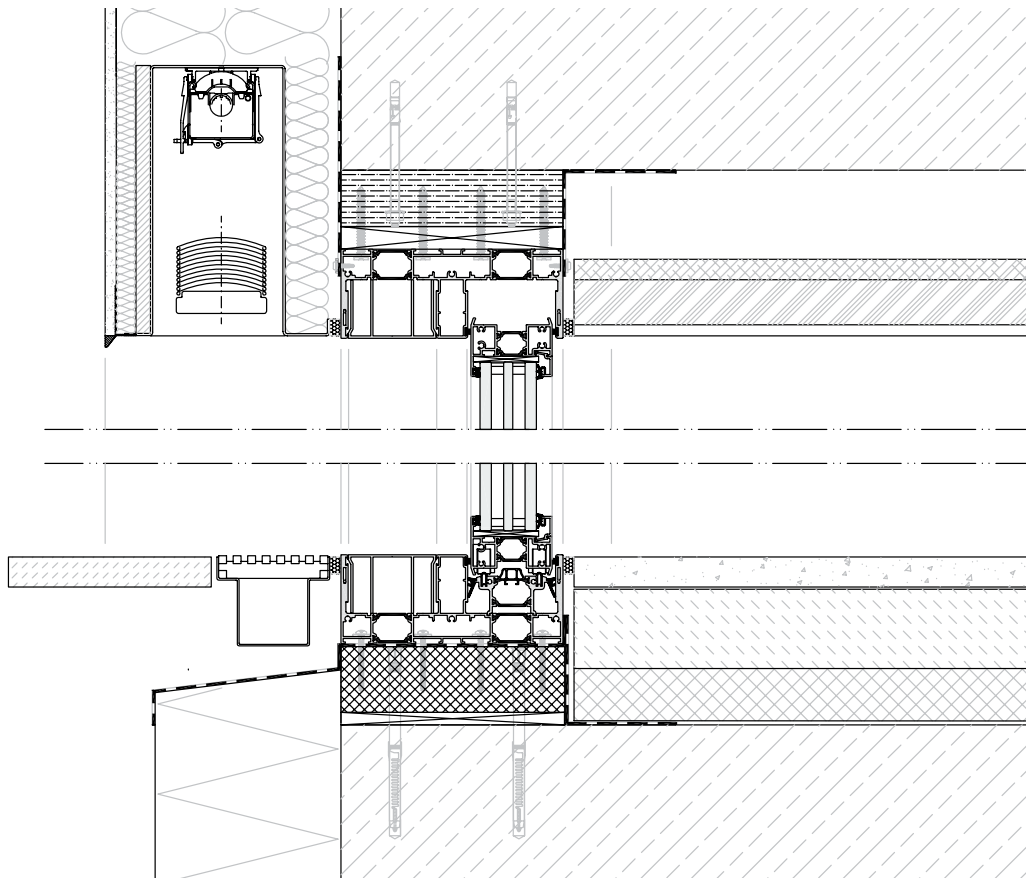
/ 3-runner

/ Removable corner for maximum transparency

// STRUCTURAL CONNECTIONS //

- / Side connection
- / Inner sealing layer (impermeable)
- / Outer sealing layer (permeable and proof against driving rain)

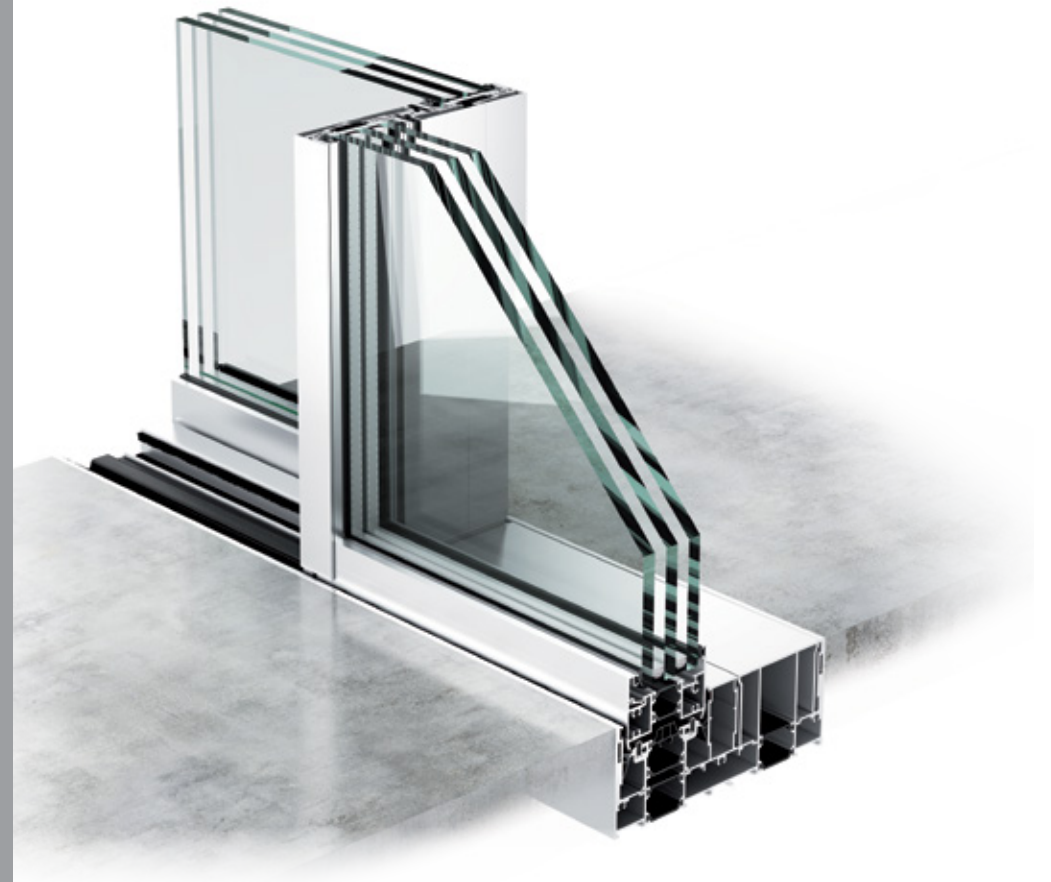


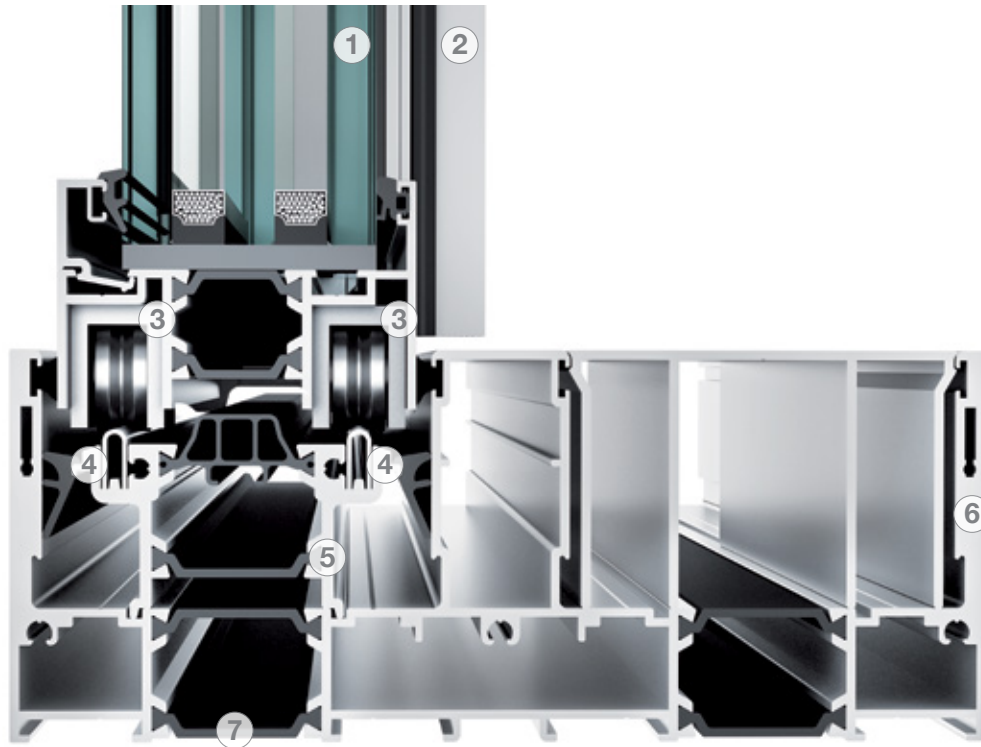


- / Lower/upper connection
- / Inner sealing layer
(impermeable)
- / Outer sealing layer
(permeable and proof
against driving rain)

// PERFECTION DOWN TO THE FINEST DETAIL //

The floor track is entirely recessed in the floor. The sliding technology integrated into the panel distributes the force evenly, which keeps susceptibility to wear to low levels. The slim panel section is only 34 mm thick. As one of the brands from Solarlux, CERO is entirely „Made in Germany“ and guarantees perfect service from one source.





- 1 / Panel thicknesses 50 – 54 mm
- 2 / Continuous handle
- 3 / Stainless steel carriage
- 4 / Stainless steel track
- 5 / Track section element
- 6 / Surround frame can be installed flush with the wall and floor
- 7 / Glass-fibre reinforced polyamide cross-pieces

