

# heroal S 42 Sliding systems



# Sliding systems

Top-quality materials, technical perfection down to the smallest detail and a wide variety of design options distinguish the efficient system technology available from heroal. These are benefits that speak for themselves.

For decades, heroal has been the reliable partner of architects, building constructors and processors thanks to its innovative solutions made of aluminium and aluminium composite materials for the building shell.

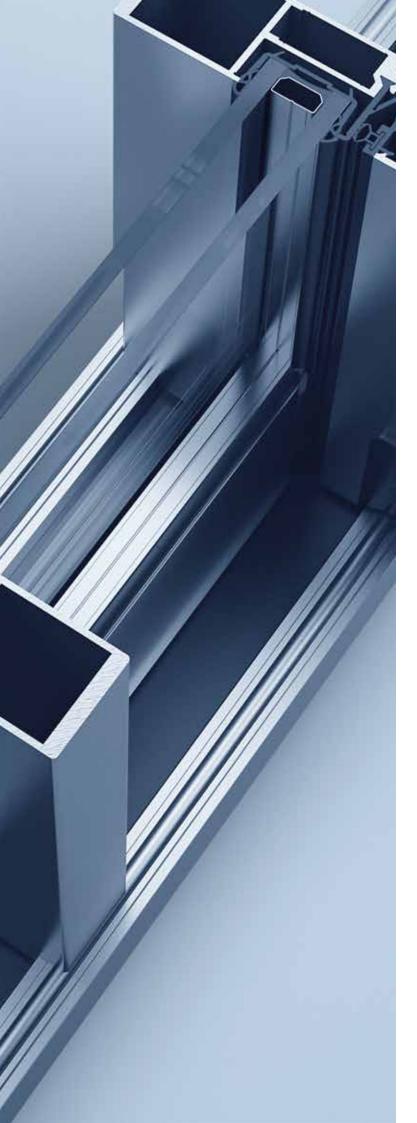
Planners appreciate the variety of design options, building constructors can realise their individual wishes with a reliable system and our partners benefit from the economical and efficient heroal system solutions.

As with all innovative heroal systems, the high-quality heroal S 42 sliding systems combine a long service life and superb functionality with top-quality design and numerous design options for large opening elements. They fulfil all criteria for sustainable, energy-efficient building and always satisfy the most stringent requirements.

heroal also represents innovation with this system: the heroal central joint and compound technology complement the outstanding performance properties.

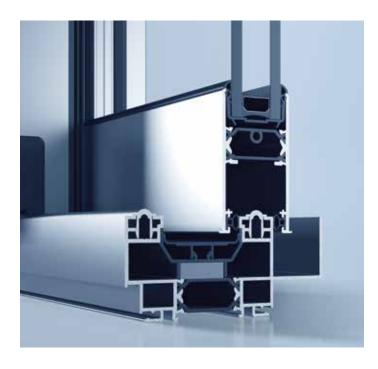
Discover the variety of sliding systems!

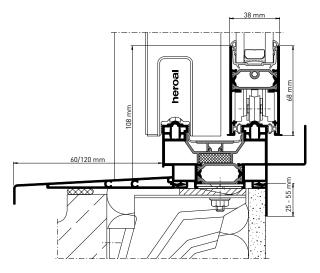




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#### Efficient and functional





heroal S 42, 2-track, lower structural attachment

The heroal S 42 sliding system sets the standard in terms of heat insulation, sustainability, economy and processing. One reason for this is the system's innovative construction details.

A range of technologies are used with the heroal S 42 sliding system: the benefits and strengths of heroal's compound, corner angle, connection and fitting technologies are combined to best effect within this system.

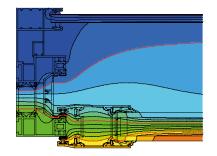
The impeccable attention to detail and the high level of efficiency and functionality enable the provision of flawless double hung sashes and sliding doors for private and commercial buildings. heroal S 42 opens up new large dimensions and guarantees maximum transparency.

#### **System properties**

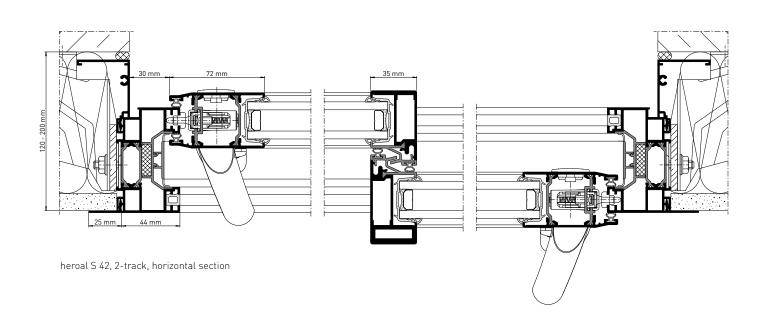
- » Installation depths: frame 72/79 mm, casement 38/42 mm, casement bars 38 mm
- » View widths: frame from 48 mm, casement from 68 mm, casement bars 68 mm
- » Max. casement leaf height: 2600 mm
- » Max. casement leaf width: 2500 mm
- » Max. thickness of infill panel/glass: 24–28 mm
- » Max. casement weights: 80/160 kg
- » Locks: 1- to 3-way, can be lockable
- » Heat insulation: U<sub>w</sub> ≥ 1.4 W/m²K
- » Air permeability: class 4
- » Tightness against driving rain: 8A
- » Wind load resistance: B2
- » Soundproofing: up to 37 dB

- » Opening types: 2- or 3-track with up to 6 sliding casements
- » 90° corner design for inner and outer corners
- » Element couplings possible with heroal W 72
- » Combination with heroal W 65 and heroal W 72 as insert frame
- » Accessible threshold design with concealed, controlled drainage via drainage system
- » Compatible with the heroal C 50 curtain wall system and the heroal IS insect screen system
- » Variety of surface designs, including for interior and exterior element side
- » Colour design in high-quality hwr powder coating

Window, 2-track, $4.6 \times 2.3 \text{ m}$ ; $U_{\rm f} = 3.0 \text{ W/m}^2\text{K}$ ; $A_{\rm g}/A_{\rm w} = 0.849$										Light trans-	Total (solar) energy			
Areal thermal resistance U <sub>w</sub> [W/m²K]								[%]	transmitt	ance [%]				
Thickness of infill panel/glass [mm]	Ug	T <sub>L</sub>	g	RW	RW, p		Alumin- ium	High- grade steel	TGI Spacer	Swiss- pacer V	Swiss- pacer U		Sw <sub>0,4</sub>	Sw <sub>1</sub>
4/16/4 = 24	1.0	0.71	0.50	(29)	(26)		1.5	1.5 1.4	1.4	1.4	1.3	0.61	0.43	0.45
6/16/4 = 26		0.70	0.49	(32)	[29]							0.60	0.43	0.44
8/16/4 = 28		0.70	0.48	(34)	(31)								0.60	0.42
4/16/4 = 24	1.1	0.80	0.63	[29]	(26)	•••	1.6	1.5	1.5	1.4	1.4	0.68	0.55	0.56
6/16/4 = 26		0.79	0.61	(32)	[29]							0.68	0.53	0.54
8/16/4 = 28		0.78	0.59	(34)	(31)							0.67	0.51	0.52

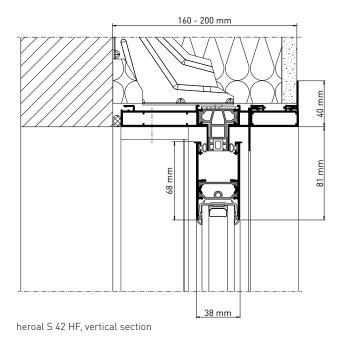


Temporary protection from roller shutters $[\mathbf{U}_{\mathrm{wf}}, \mathbf{U}_{\mathrm{jn}}]$											
heroal Roller	ΔR	U <sub>wf</sub> -/ U <sub>jn</sub> Window incl.	$\rm U_w$ -value of the sliding element [W/m²K]								
shutter slat		Roller shutters [W/m²K]	2.0	1.8	1.6	1.5	1.4	1.3	1.2	1.1	1.0
RS 41	0.19	U <sub>wf</sub>	1.4	1.3	1.2	1.2	1.1	1.0	0.98	0.91	0.84
		U <sub>jn</sub>	1.7	1.6	1.4	1.3	1.3	1.2	1.1	1.0	0.92

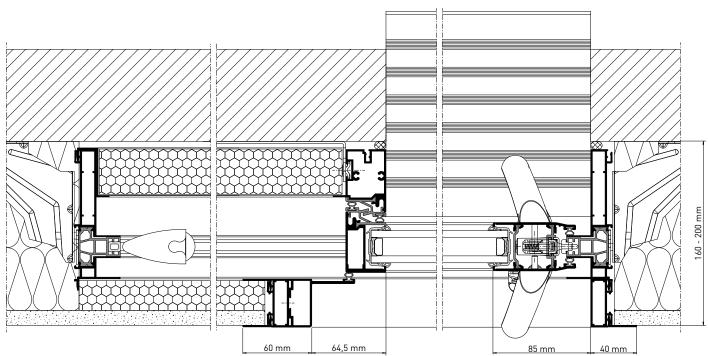


## heroal S 42 HF

## Transparent and frame-free



heroal S 42 HF opens up new large dimensions and guarantees maximum transparency with its unique innovative frame construction integrated into the masonry. The sliding casements completely disappear into a double-insulated pocket in the wall, creating a unique spatial experience with maximum transparency.



heroal S 42 HF, horizontal section

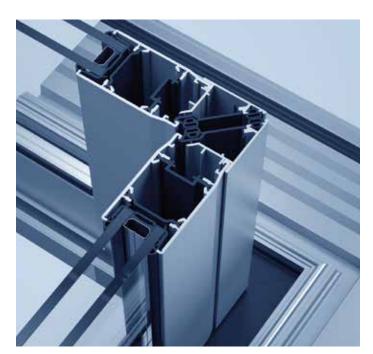


#### **System properties**

- » Installation depths: frame 113 mm, casement 38/42 mm, casement bars 38 mm
- » View widths: frame concealed, casement from 68 mm, casement bar 68 mm
- » Max. casement leaf height: 2600 mm
- » Max. casement leaf width: 2500 mm
- » Max. thickness of infill panel/glass: 24–28 mm
- » Max. casement weights: 80/160 kg
- » Locks: 1- to 3-way, can be lockable

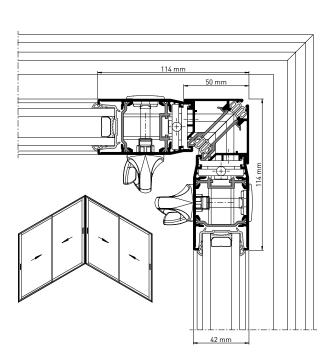
- » Types of opening as monorail (1-track) with 1 to 2 sliding casements
- » 90° corner design with 1 to 2 sliding casements
- » Accessible threshold design with concealed, controlled drainage via drainage system
- » Cladding profiles for insulation zone superstructure of 160–200 mm
- » Variety of surface designs, including for interior and exterior element side
- » Colour design in high-quality hwr powder coating

## Architecturally eye-catching 90° corner solution

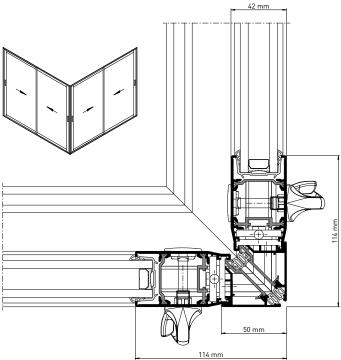


heroal S 42 enables sliding doors with large openings in the corner area thanks to the 90° corner solution. The innovative and sophisticated design option of the heroal S 42 sliding system completely satisfies the increasing demand for more transparency in architecture.

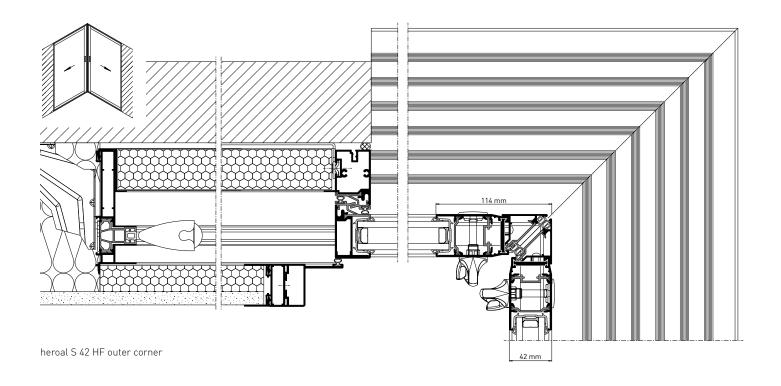
- » Opening types:
  - 1-track (heroal S 42 HF) with 1 to 2 sliding casements
- 2-track with up to 4 sliding casements
- » Can be designed for inner or outer corners
- » Accessible threshold design with concealed, controlled drainage via drainage system
- » Variety of surface designs for interior and exterior element side
- » Colour design in high-quality hwr powder coating

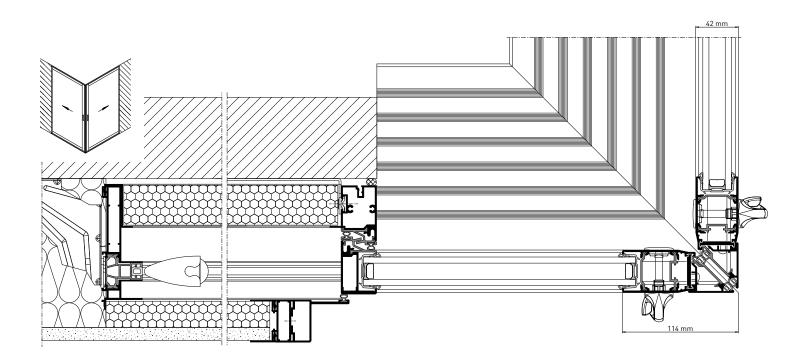


heroal S 42 outer corner



heroal S 42 inner corner





heroal S 42 HF inner corner

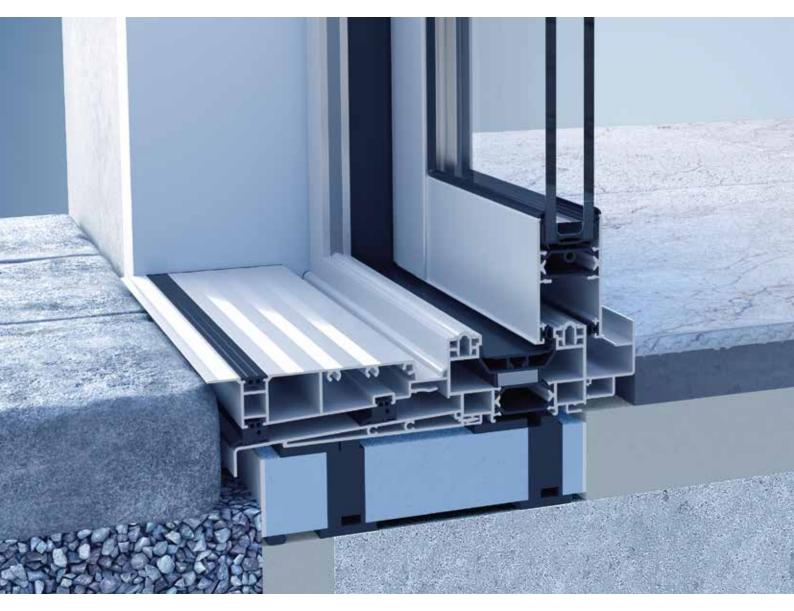
## heroal S 42 UD

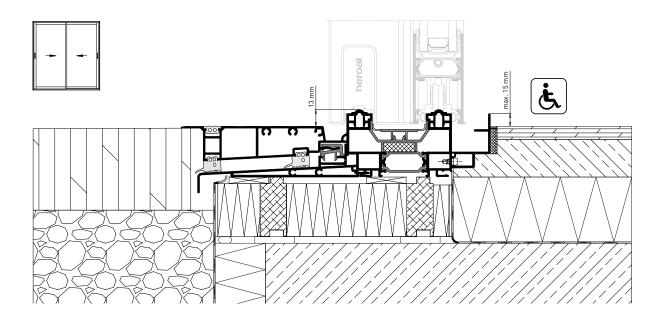
### Accessible system solutions

heroal S 42 UD enables accessible, large-area sliding elements for more comfortable living. Level thresholds to access patios, balconies and conservatories offer safety and freedom of movement.

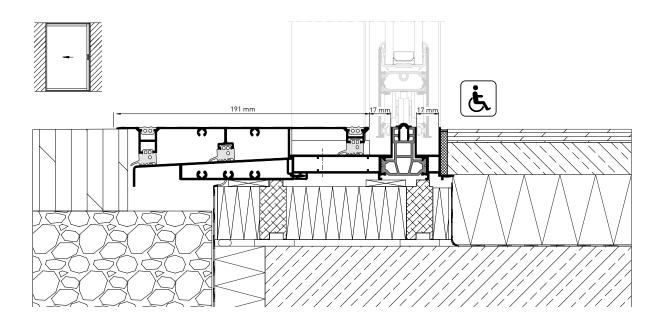
The heroal threshold solutions meet the legal accessibility requirements through incorporation into the building in the correct manner. To implement accessible thresholds in the area of sliding elements while offering protection from moisture damage indoors, particular measures need to be taken. One possible solution is to use the heroal drainage system for the heroal S 42 UD sliding system. This system solution enables effortless integration of structures in new buildings as well as renovations.

- » Opening types: 1-track (heroal S 42 HF) with 1 to 2 sliding casements. 2- or 3-track with up to 6 sliding casements
- » Accessible threshold design with concealed, controlled drainage via drainage system
- » Variety of surface designs for interior and exterior element side
- » Colour design in high-quality hwr powder coating



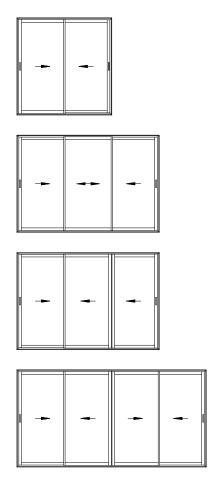


heroal S 42 UD, accessible

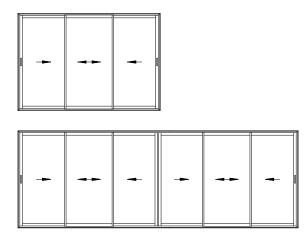


heroal S 42 HF, accessible

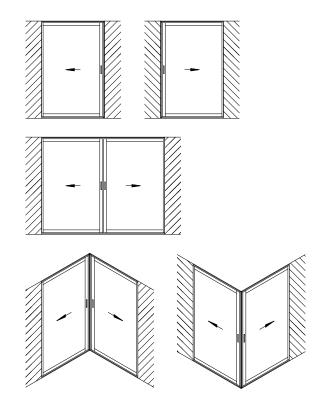
## Types of openings and design options



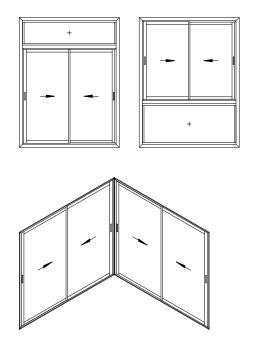
heroal S 42, 2-track



heroal S 42, 3-track

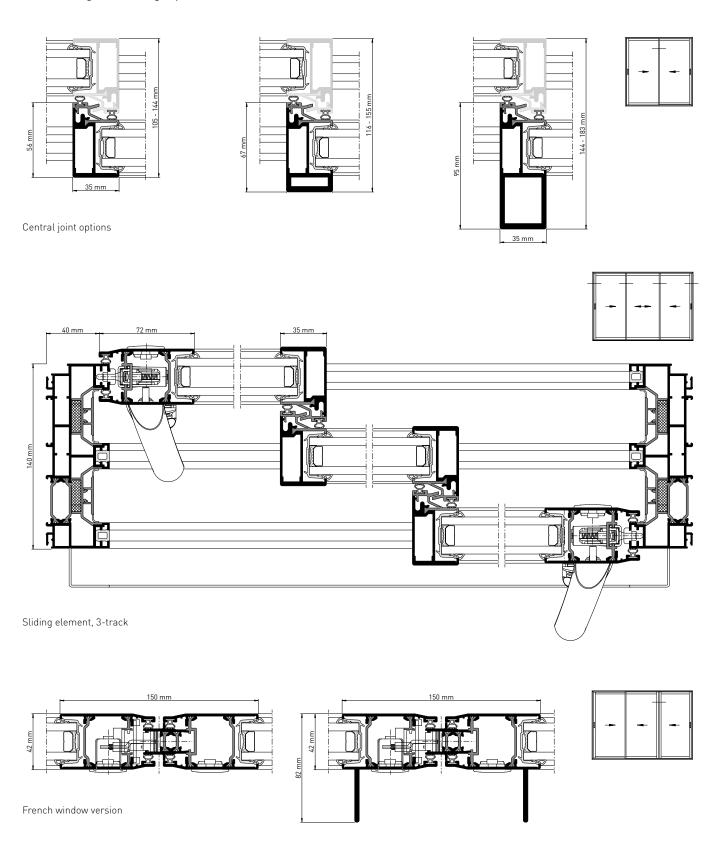


heroal S 42 HF pocket door



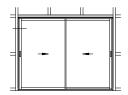
heroal S 42, fanlight and sublight, 90° corner solution

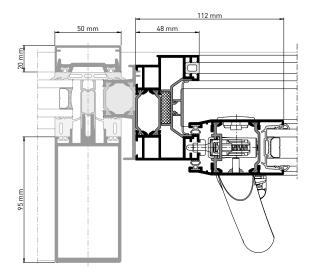
## Wide range of design possibilities



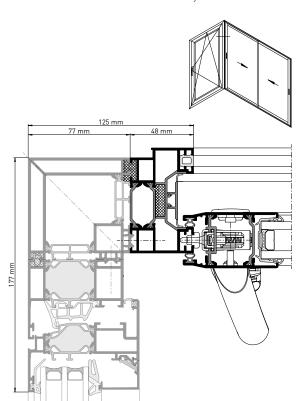
French window version with static profiles

## Wide range of design possibilities

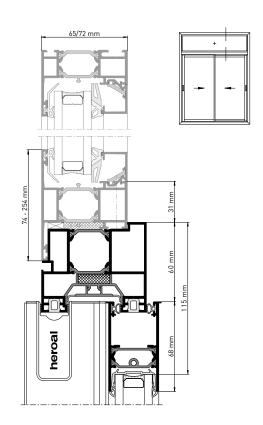




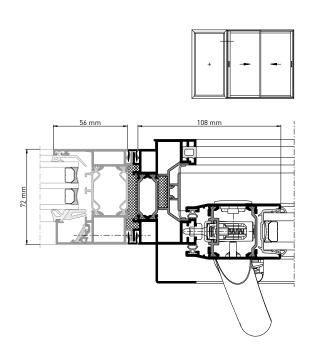
Insert element in heroal C 50 curtain wall system



90° element coupling



Insert element in heroal W 65/heroal W 72 window systems

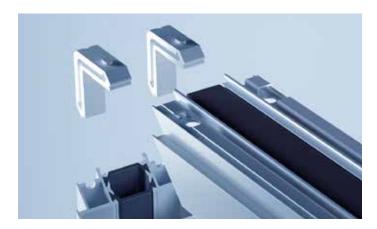


Element coupling with heroal W 72 window system

### Production technology

The heroal S 42 sliding system sets new standards in the fields of heat insulation, sustainability and economy. The completely new concept for an aluminium coupled design offers perfect system solutions for every range of application. heroal S 42 combines minimal energy consumption in production with maximum energy conservation throughout the entire service life.

The design advantages of this new generation of sliding systems, particularly the heroal compound, corner angle, connection and fitting technologies, result in significant time savings during production.



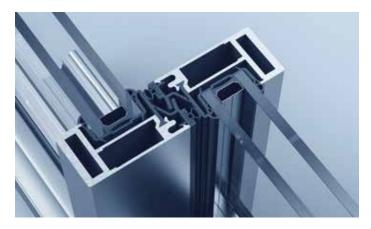
#### heroal corner angle technology

To support customised manufacturing options, alongside the heroal corner angle technology with sealant injection, heroal also offers a connection option by means of a screw-fixed corner angle in the frame. The connection technologies enable more efficient manufacturing processes that save time.



#### heroal casement connection technology

Thanks to the heroal design, the casement profiles can be connected by screw even more easily and faster by means of the T-joint procedure. After cutting to size, only the vertical casement profiles require processing. During the subsequent installation, the casement profiles are aligned automatically.



#### heroal compound technology

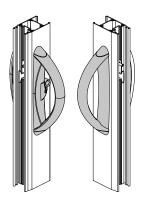
The new optimised profile geometry combines heroal's innovative strength and production technology in a single construction. Using this profile geometry, heroal has succeeded in providing the required static performance features across two profile cross-sections whilst ensuring optimum levels of heat insulation and minimum distortion.

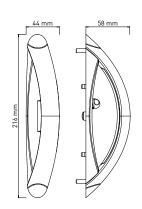
## Sliding fittings



#### heroal "Versus" sliding fitting

- » A combination of comfort, security, aesthetics, ergonomics and colour variety
- » A simple, practical central lock that can be extended or modified to a 3-way lock
- » Locks in manual or automatic version
- » Adjustable carriage made from aluminium for long-term operation for a casement weight of up to 80 kg and 160 kg
- » Value-for-money and efficient processing and fitting assembly:
  - Outside handle recesses are clipped on
  - Inside design handle screwed together with the lock case
  - Lock case can be used for all applications. Compatible with a wide selection of handle recesses and design handles



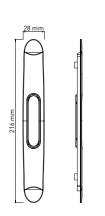


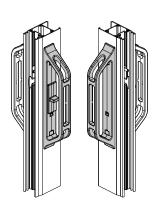
- » Considerable scope for creativity and design freedom thanks to extensive range of recess handles and design handle bars.
- » Handle options can be combined on the interior and exterior element side
- » Colour variety thanks to customised colour coating of handle bars and handle recesses

heroal handle bar

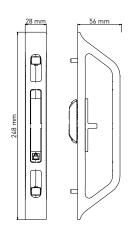










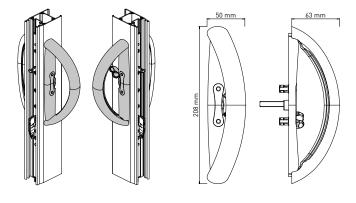


### Sliding fittings



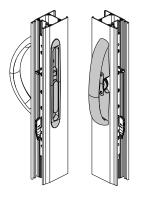
#### heroal "Chronos" sliding fitting

- » Design, ergonomics and flexibility combined
- » The "Chronos" sliding fitting is a locking bar system designed to meet security demands
- » Design variants as 1-, 2-, and 3-way lock with claw bolt
- » Reliably secure thanks to self-locking screws
- » Gearbox with 43 mm bolt-on axle and 7 mm square mounting
- » Affordable and efficient installation

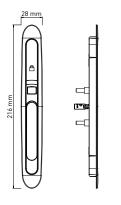


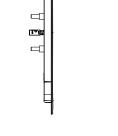
- » High level of flexibility and design freedom thanks to extensive range of handles
- » Extensive range of handle versions with choice of half-moon or design handles
- » Handle options can be combined on the interior and exterior element side
- » Colour variety thanks to customised colour coating of handle bars

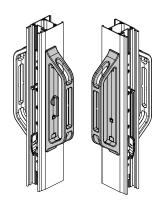
heroal handle bar

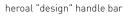


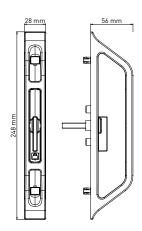
heroal handle recess











# System properties and performance features

## System dimensions

Description			heroal S 42	heroal S 42 HF		
		2-track	3-track	French window	1-track	French window
Profile installation depth (mm)	Frame profiles	72/79	132/139	72/79 132/139	131	131
	Casement profiles	42/38	42/38	42/38	42/38	42/38
	Central joint/labyrinth	105 - 183	105 - 183	105 - 183	105	105
	Casement bars	38	38	38	38	38
Profile view widths (mm)	Frame profile	48	48	48	Concealed	Concealed
	Casement profiles	68 - 72	68 - 72	68 - 72	68 - 72	68 - 72
	Central joint/labyrinth	35	35	35	35	35
	Casement bars	68	68	68	68	68
Max. thicknesses of infill panel/glass (mm)		24 - 28	24 - 28	24 - 28	24 - 28	24 - 28
Max. casement weights (kg)	160	160	160	160	160	
Max. casement leaf heights (mm)		2600	2600	2600	2600	2600

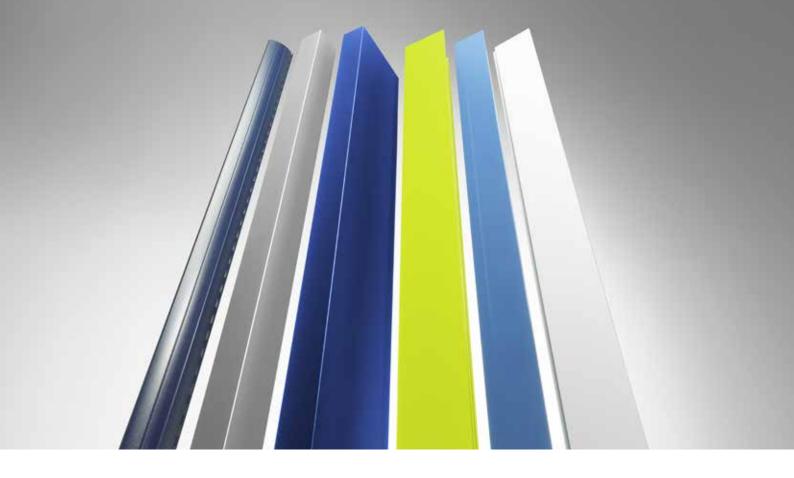
## System properties

Heat insulation (W/m²K)	U <sub>w</sub> <sup>1]</sup>	≥1.3	≥1.5	≥1.4	≥1,2	≥1,2
Element size (mm)		4600 x 2300 mm	3450 x 2180 mm	4600 x 2180 mm	2.350 x 2.180 mm	4.600 x 2.180 mm
Air permeability	DIN EN 12207	4	4	4	4	4
Tightness against driving rain 3)	DIN EN 12208	8A	7A	6A	8A	6A
Element size (mm)		3000 x 2400 mm	3500 x 2400 mm	3500 x 2400 mm	2.350 x 2.180 mm	4.600 x 2.180 mm
Wind load resistance	DIN EN 12210	C1/B2	C2	C2	C2	C2
Soundproofing class (SSK)	EN ISO 717-1	3	3	3	3	3

## Opening types/design

Max. number of moveable sliding casements		4	6	6	1	2
Accessible sliding element DIN 18040		•	•	•	•	•
Drainage system	•	•	•	•	•	
Insert elements	heroal C 50	•	•	•	-	-
	heroal W 72	•	-	-	-	-
	heroal W 65	•	-	-	-	-
	heroal W 50 C	•	-	-	-	-
	heroal CR	•	-	-	-	-
hwr powder coating	One/two colours	•	•	•	•	•
Eloxal coating	•	•	•	•	•	
Decorative film		-	-	-	-	-

 $<sup>^{1]}</sup>$   $U_{w}\text{-}value$  according to EN ISO 10077-1;  $U_{q}$  = 1.0 W/m²K;  $\psi_{q}$  = 0.031 W/m²K



# heroal surfaces

Surface finishing is an integral part of heroal system components. heroal offers optimally matched systems for windows, doors, façades, as well as roller shutters, roller doors and sun protection. With our heroal hwr powder coating, we rely on quality from our own coating plants. The award as the official GSB Premium coater and the Qualicoat quality seal underline the quality leadership! Apart from the powder coating, heroal also offers its customers Eloxal surfaces and laminations. A twin-coat thick coating is used in the roller shutter field in particular. heroal delivers its entire product portfolio directly exworks, thus ensuring the shortest delivery times for its partners.





# Our service is consistently geared to your needs

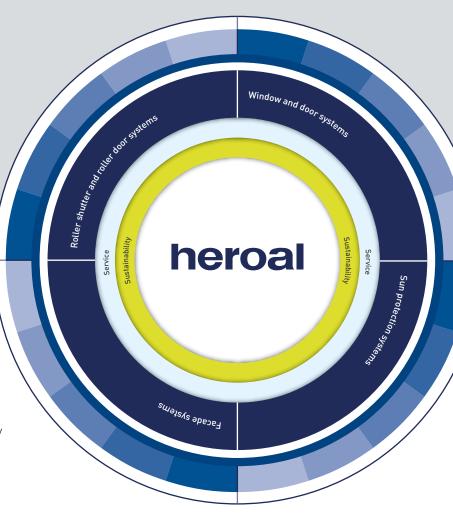
Alongside its extensive system portfolio with perfectly coordinated products, heroal also provides a service that is unique and the most efficient in the sector – founded on a consistent focus on customers' requirements, wishes and needs. The basis of heroal service – alongside the trained team of employees - is the in-house, energy-efficient production, made in Germany with an unparalleled manufacturing range and process reliability, which ensures optimum product quality for sustainable, cost-effective and value-enhancing construction for processors, architects and constructors. This is also ensured by the new heroal logistics centre, covering an area of around 40,000 m<sup>2</sup>, and the company truck fleet. The heroal service portfolio is rounded off by the testing centre for roller shutters, roller doors, sun protection, windows, doors and façades, which is certified by ift Rosenheim and can also be used by customers, as well as by the efficient, in-house profile bending and edging service: heroal is the only systems supplier in the sector to offer such a service to its customers.

# heroal – the aluminium systems supplier

As one of the leading aluminium systems suppliers, heroal develops and produces perfectly coordinated systems for windows, doors, façades, roller shutters, roller doors and sun protection, complemented by louvre and sliding shutters, insect protection and terrace roofs and carports. By minimising energy consumption during production, maximising energy conservation during usage and ensuring optimum profitability during system processing and building improvement, heroal system solutions make a significant contribution to sustainable construction.

# Innovation, service, design, sustainability

The heroal brand represents system solutions that unite practical innovations, industry-leading service and high-quality design that can be sustainably integrated into any architecture.



Roller shutters | Roller doors | Sun protection | Windows | Doors | Façades | Service