



External Venetian Blinds

HunterDouglas® External Venetian Blinds enhance **natural daylighting**, reduce glare and regulate thermal gain to **ensure comfort** and **increased productivity**. The blinds can be raised and lowered depending on weather conditions and their tilt angle can be regulated to keep direct sunlight out and let natural daylight in creating complete user flexibility.



HunterDouglas

WINDOW COVERINGS

HunterDouglas

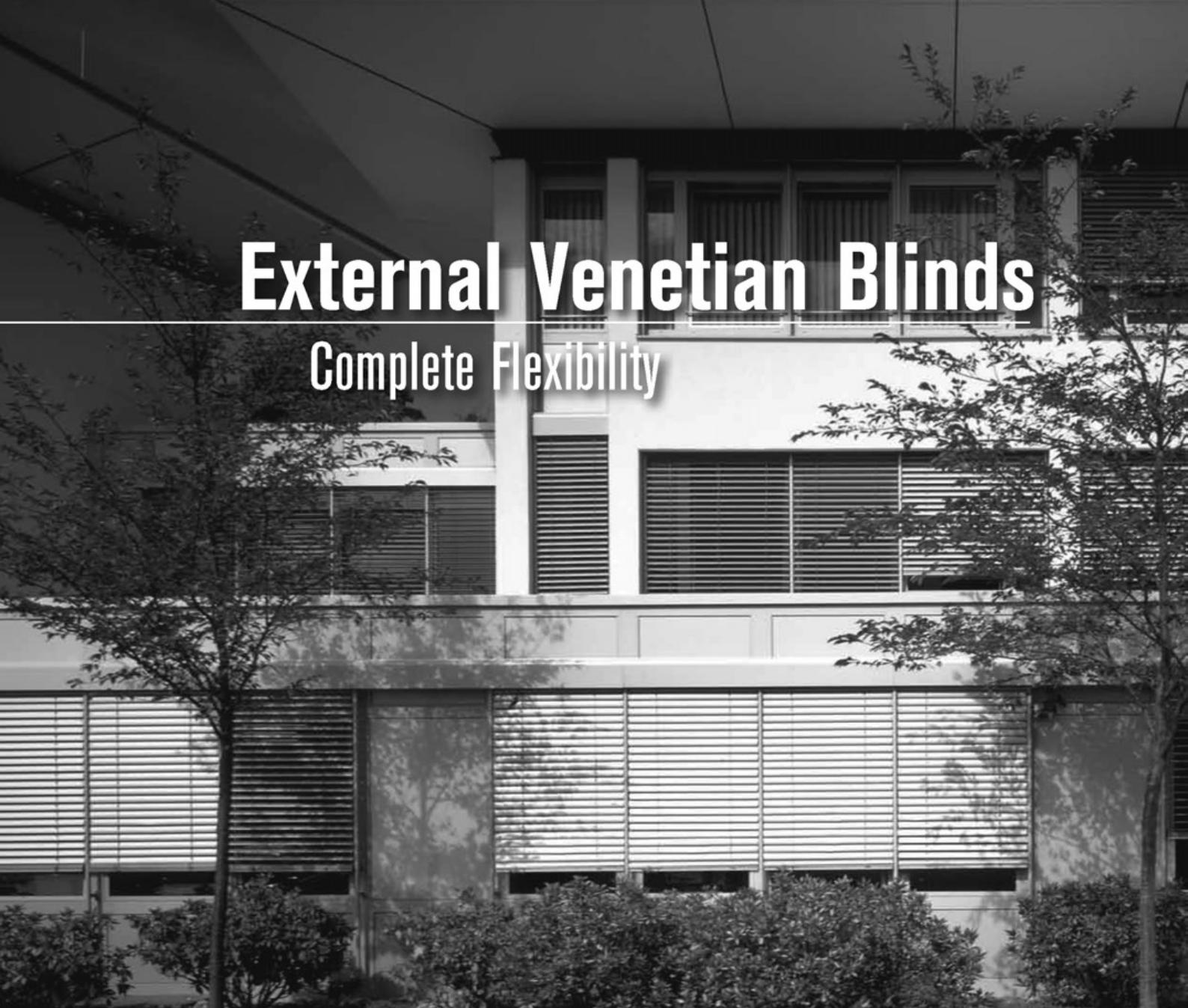
Technical Information Catalogue

External Venetian Blind Systems

English Version 2.0

External Venetian Blinds

Complete Flexibility



EFFECTIVE AND FLEXIBLE

The Venetian Blind is possibly the quintessential solar blind. It can be lowered and raised while the slats can be tilted for optimal visual conditions: that is total flexibility. As an external application it is sturdy yet discrete and one of the most effective methods of solar shading.

Available in a range of slat widths and an endless variety of colours, it can add to the building aesthetics without overpowering it.

PROVIDING COMFORT

HunterDouglas® External Venetian Blinds enhance natural daylighting, reduce glare and regulate thermal gain to ensure comfort and increased productivity. The blinds can be raised and lowered depending on weather conditions and their tilt angle can be regulated to keep direct sunlight out and let natural daylight in.

By keeping out direct sunlight external blinds can keep out 90% of total solar radiation on the window, contributing to comfortable working conditions and considerably reducing cooling loads.



ENERGY & LIGHT

HunterDouglas® External Venetian Blinds are designed to improve indoor environmental quality and conserve energy. These systems help create built environments that are comfortable, healthy, productive, and sustainable. Our engineering and production processes minimise embodied environmental impact while meeting the highest standards for commercial, hospitality, industrial, institutional, and commercial applications. In order to obtain the optimal shading performance for a building and its occupants our project support team can analyse, visualise and optimise window covering solutions for specific project solutions.

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Innovative Products Make Innovative Projects



HunterDouglas



Effective and flexible, the HunterDouglas® External Venetian Blinds offer a choice of slat types and colours mounted in durable, powerful operating systems. They are a versatile and reliable choice to control light and heat in a wide range of manual and motorised applications.

External Venetian Blinds

FEATURES

- Heavy duty operating mechanisms
- Side guides, lift tapes and ladders designed to prevent vibration due to wind
- Choice of cable guiding or various aluminium side guiding channels
- Head rail fixed to ceiling or supported by side guiding channels
- Choice of manual crank operation or motorised operation
- Slats widths: 50, 60, 80, 88 and 100 mm
- Flexible slat types for compact stacking, beaded slat types for strength and rigidity
- Wide standard colour range, any colour available on request
- Optional perforation: to maintain exterior views even when blinds are fully closed (please note: advised for non-corrosive environments only)
- Optional lowering at 40° slat angle (normal lowering in closed position)
- Optional SlowMotion motor for more accurate tilting to exact angles
- Dual Light Control option: upper and lower blind sections at different angles
- Quick raise option for emergency exit situations
- Optional reinforcements for extra wind stability.



Sustainable Comfort

HunterDouglas® External Venetian Blinds contribute to sustainable comfort in many ways:

- High performance sun control system
- Optimal light control with individual operation
- Retractable for outward view and natural daylighting when shading is not required
- Reduce solar heat gain by 90% - creating considerable energy savings in cooling
- Use solar heat in winter - creating energy savings in heating
- Tilt slats to balance shading, daylighting and outward view
- Reduce glare on screens and workspaces
- Automated options for optimised comfort and energy savings
- Recycled content rate of 92% for HD5050 alloy



Materials

SLATS

- All slats are pre-coated with Anorcoat® conversion coating system
- Colour coated with stove enameled polyester paint with painted edges in the length of the slats
- 50F mm rollformed aluminium slats, thickness 0.2 mm, alloy EN AW-5182
- 60 / 60F mm rollformed aluminium slats, thickness 0.45 mm / 0.4 mm, alloy HD5050
- 80 / 80F mm rollformed aluminium slats, thickness 0.4 mm, alloy HD5050
- 88 mm rollformed aluminium slats, thickness 0.45 mm, alloy HD5050
- 100F mm rollformed aluminium slats, thickness 0.4 mm, alloy HD5050
- Optional Luxacote® colour coating with stove enameled polyurethane paint
- Optional alloy AA3005 with Luxacote® colour coating (not for 50F slat) for more corrosive environments



LADDER CORDS

- Ladder cords for 50F slats consist of UV and weather resistant high tenacity polyester material (colour: grey and black).
- Ladder cords for 60(F), 80(F) and 100mm slats consist of UV and weather resistant Aramid-reinforced high tenacity polyester material (colour: black).
- Ladder cords (ball tapes) for 88mm slats consist of UV and weather resistant high tenacity polyester material (colour: grey). Slats individually connected to the tape by special clips in the bead of the slat (colour grey).



LIFT TAPE

- Made of durable UV and weather resistant pre-shrunk polyester (6 x 0.28 mm, colour gray and black).
- Alternative: 88 KV-ELV types with integrated lift tape made of durable UV and weather resistant plastic (dymetrol), 15.2 x 1.27 mm (colour: black).

Product selection

Choosing the right system for the application means making a series of system choices. Depending on the project situation certain features may become a priority; in most cases the following steps can be followed.

SLAT TYPE

A slat type is normally selected on aesthetics, system width and available installation space. Available system depth on the façade (inside window, between window and façade) will determine maximum slat width. Necessary stacking space above the window may be reduced by choosing a compact flexible slat type but this will also reduce the maximum system width.

SIDE GUIDING

External Venetian Blinds are available with various options in side guiding, from discrete cable guiding via the slim standard aluminium side channels to the more sturdy aluminium side channels that need less fixing points and can also support the weight of the head rail if required.

OPERATION SYSTEM

All External Venetian Blind systems can be operated manually with a crank or with a motor. Crank operation requires an open connection for the crank rod through the façade. Motorised systems use a 230V IP54 (splash proof) motor that is placed inside the head rail. Both operation options can be used to control a group of coupled systems; in this case motor operation will allow the largest total system surface. Motorised systems allow automated or centralised controls and wind protection.

SYSTEM DIMENSIONS

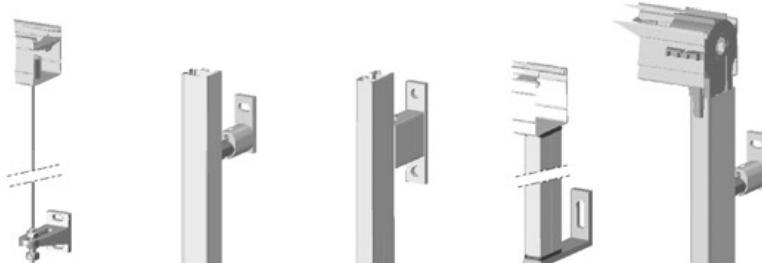
Maximum system width and height are limited by the combination of slat type, side guiding, operation type and potential group installation. A system type can be selected on functional and aesthetical requirements and must then be checked for maximum system dimensions.

ACCESSORIES

Based on the installation situation at hand and dependent on the selected system type, the suitable bracket types and possibly pelmets can be chosen and added to the order.

COLOUR

Dependent on the selected slat type there is a choice of standard available colours. Please refer to colour swatch. Any slat colour is available on request. Bottom rail and side channels can be silver anodised or powder coated to match the slats with proviso for a slight colour deviation.



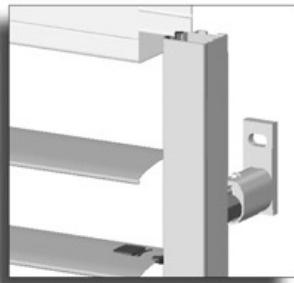
| | system A | system AS | system ASK | system ASS | system V88AS |
|----------|--|-----------|------------|------------|--------------|
| BRACKETS | (re)adjustable brackets | X | X | | X |
| | larger distance possible to the wall | | | X | |
| | mounting with 1 bracket (at the bottom) | X | | | X |
| | mounting on the wall | X | X | X | X |
| | mounting on the side | | X | | |
| | mounting at the bottom | X | | | |
| | less brackets per height | | | X | |
| CHANNELS | applicable for small mounting spaces (narrow window frame) | | | X | X |
| | small light gap | | | X | X |
| | possible mounting 'free hanging blind' | | | X | |
| | two-sided channel for coupled blinds | | X | X | X |
| | round channels possible (design) | | | X | X |
| | no lift tapes visible | | | | X |
| | no holes in the slats | | | | X |

Side guiding options



TYPE A: CABLE GUIDING

- Stainless steel cable ø3 mm with transparent nylon jacket
- Visually discrete
- Requires tensioning point at bottom of system but no fixings along the sides



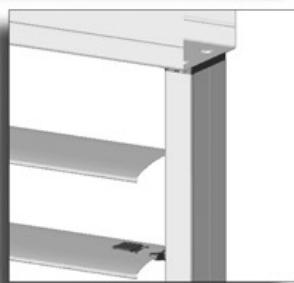
TYPE AS: STANDARD SIDE CHANNEL GUIDING

- Slim aluminium extruded side channels
- Simple adjustable wall brackets
- Side channels fixed to side or back
- Double sided channel for adjacent systems
- Head rail fixed to ceiling



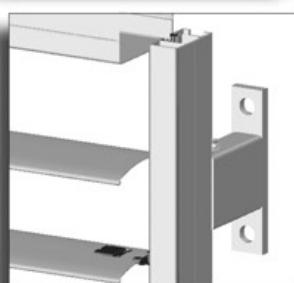
TYPE ASC: "CLICK" SIDE CHANNEL GUIDING

- Head rail pre-assembled including pelmet
- Mounted as complete pre-installed system via clip-on side guiding channels
- Click brackets can be pre-fitted to façade mullion profiles for quick installation on site
- Reduced light gap between side channel and slats
- No light gap between side channel and façade
- Available for 60 and 80 mm slats (flexible or beaded) and for 88 mm slat
- Motorised operation only



TYPE ASS: PUSH-ON SIDE CHANNEL GUIDING

- Heavy duty side channels, square with slim front appearance or round
- Side channels to a height of 1800 mm fixed between head rail and bottom bracket
- Reduced light gap between side channel and slats
- Quick installation, reduced drilling in façade



TYPE ASK: CLAMP-ON SIDE CHANNEL GUIDING

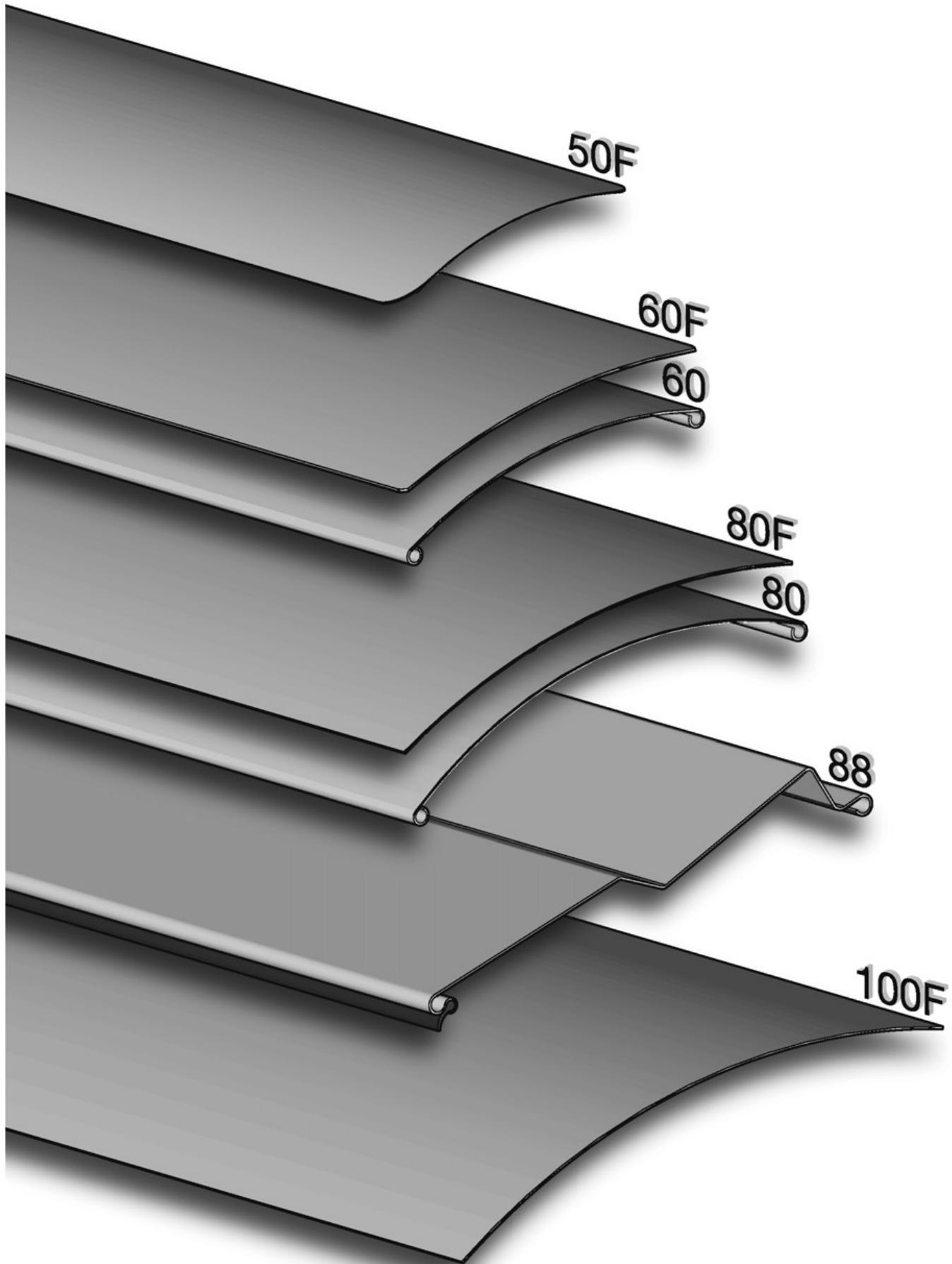
- Heavy duty side channels, square with slim front appearance or round
- Brackets with clamp-on connection, suitable for fixation on threaded rods in façade mullions
- Heavy duty brackets with clamp-on connection
- Head box can be supported by side channels up to width of 2500 mm (option)
- Reduced light gap between side channel and slats
- Larger distance from façade (up to 500mm) possible

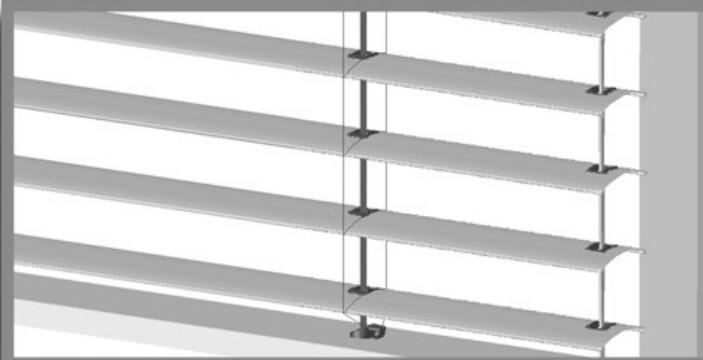


TYPE V-AS: INTEGRATED LIFT TAPE GUIDING

- 88 mm slat only
- Crank or motor operation
- Lift tape integrated in side channel
- No lift tape holes in slats; improved privacy and obscuration
- Bottom rail secured against lifting by wind or hand

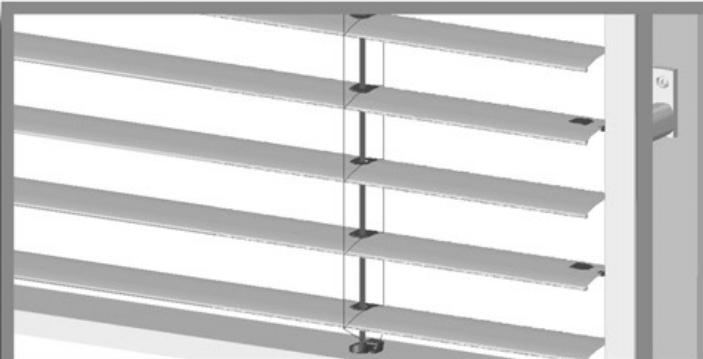
Type overview





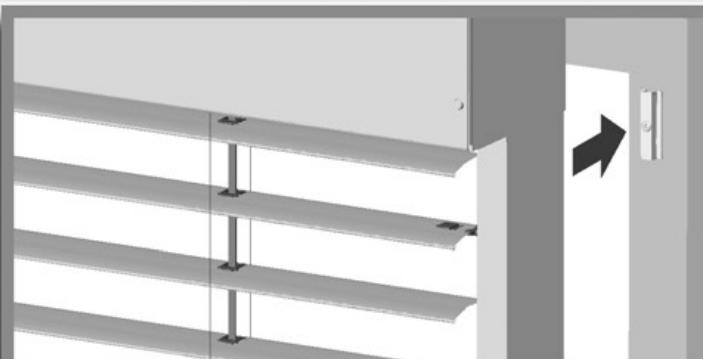
Cable guiding

| | | Motor | Crank |
|-------------|------|-----------|-----------|
| 50A | page | 10 | 12 |
| 60A | page | 14 | 16 |
| 80A | page | 32 | 34 |
| 100A | page | 68 | 70 |



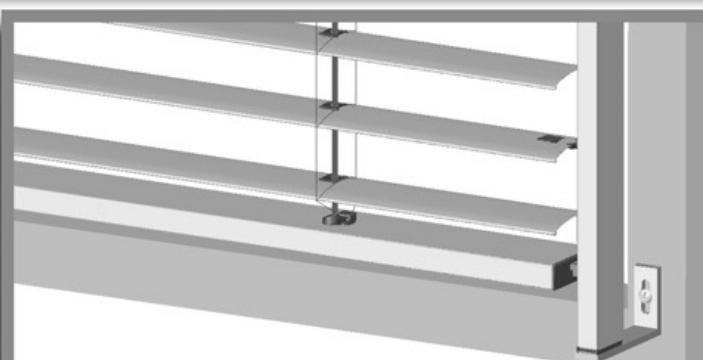
Standard side guiding channels

| | | Motor | Crank |
|-------------|------|-----------|-----------|
| 60AS | page | 18 | 20 |
| 80AS | page | 36 | 38 |
| 88AS | page | 50 | 52 |



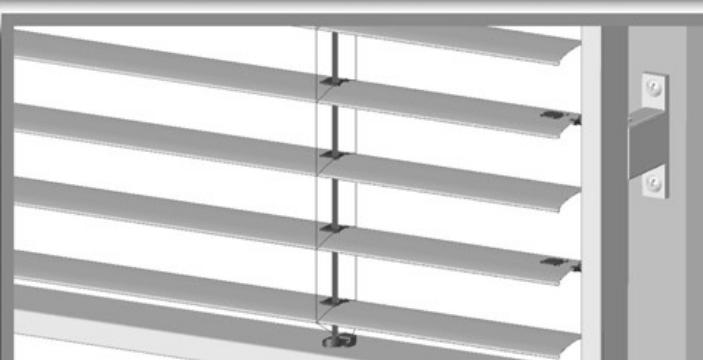
Click

| | | Motor |
|--------------|------|-----------|
| 60ASC | page | 22 |
| 80ASC | page | 40 |
| 88ASC | page | 54 |



Push on side guiding channel

| | | Motor | Crank |
|--------------|------|-----------|-----------|
| 60ASS | page | 24 | 26 |
| 80ASS | page | 42 | 44 |
| 88ASS | page | 56 | 58 |



Channel with clamping brackets

| | | Motor | Crank |
|--------------|------|-----------|-----------|
| 60ASK | page | 28 | 30 |
| 80ASK | page | 46 | 48 |
| 88ASK | page | 60 | 62 |

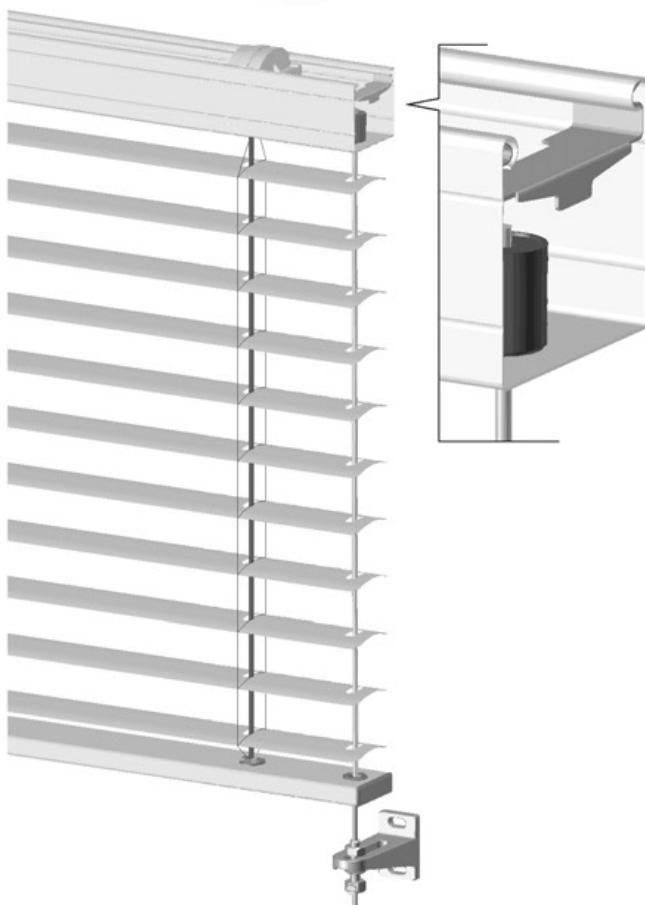
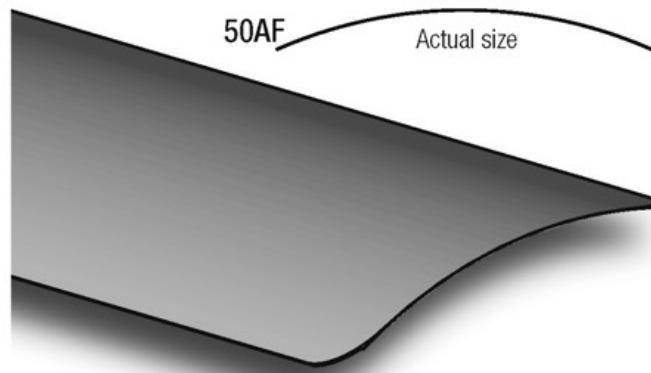
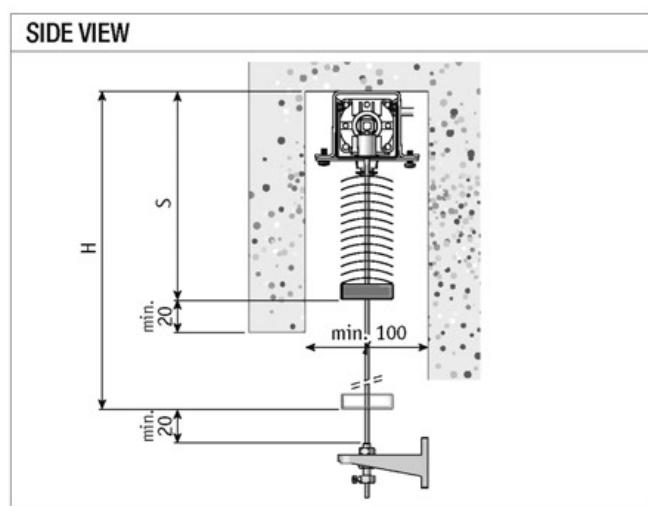
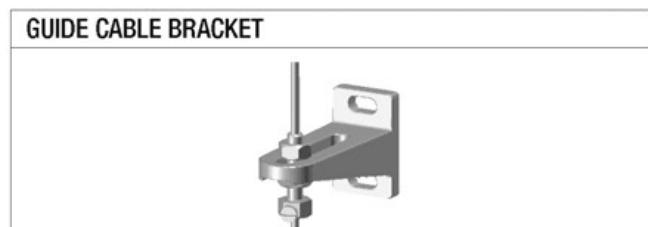
EVB EL50AF

MOTOR OPERATED EXTERNAL VENETIAN BLIND
50 MM SLATS WITH SIDE GUIDING CABLES

EL50AF: flexible 50 mm slats

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats closed
- Roll formed coil coated flexible slats 50 mm of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 50 x 15 mm
- Tensioned stainless steel cable Ø 3 mm with transparent nylon jacket
- Black bottom rail end caps, lift tape and polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



SIZE LIMITATIONS

| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 50 AF | 51 | 400 | 400 | 16 |
| Group | EL 50 AF | | 800 | 400 | 20 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S | Blind height H | Stacking height S |
|-------------------|----------------------|-------------------|----------------------|
| 1000 | 127 | 3000 | 177 |
| 1500 | 140 | 3500 | 192 |
| 2000 | 152 | 4000 | 207 |
| 2500 | 165 | | |

OPTIONS EVB EL50AF

GUIDE CABLE BRACKETS

3 sizes (X, mm);
27 - 73
67 - 133
124 - 173

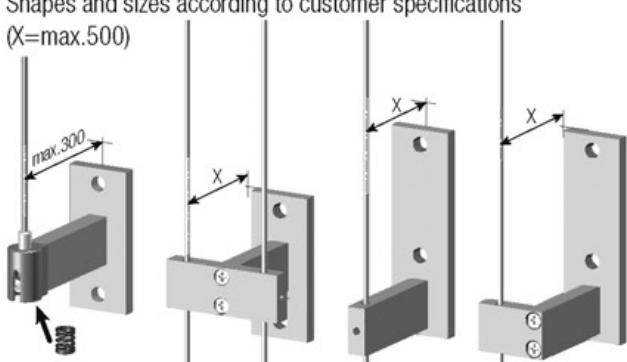


GUIDE CABLE BRACKETS, IDEFIX

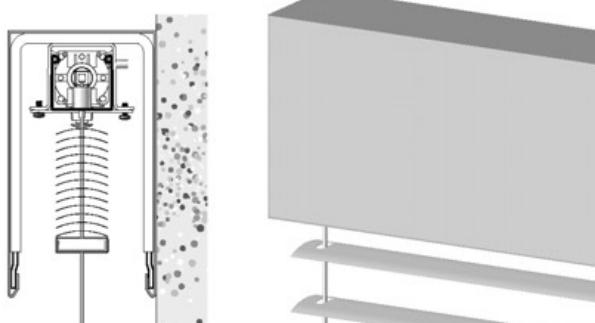
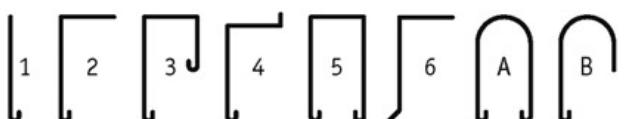


HEAVY DUTY CABLE BRACKETS

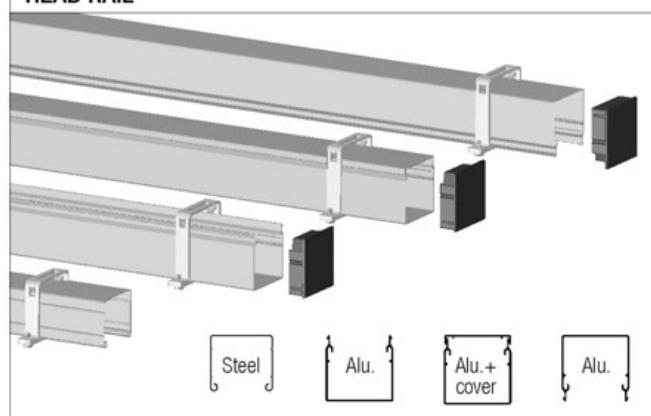
Shapes and sizes according to customer specifications
(X=max.500)



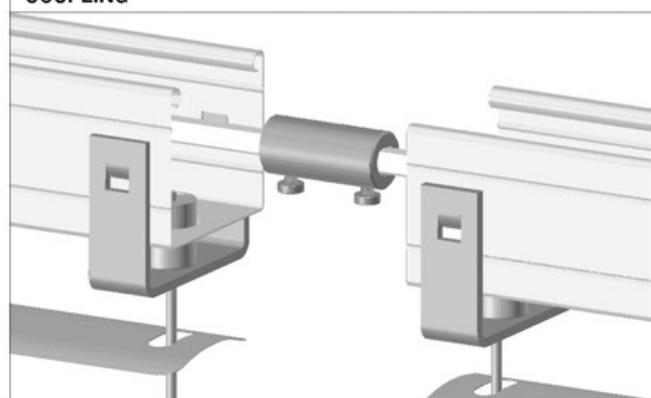
PELMET



HEAD RAIL



COUPLING



FURTHER OPTIONS (Additional information on page 73)

- Slow motion motor for more precise slat tilting
- Lift tape and ladder cords in grey
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

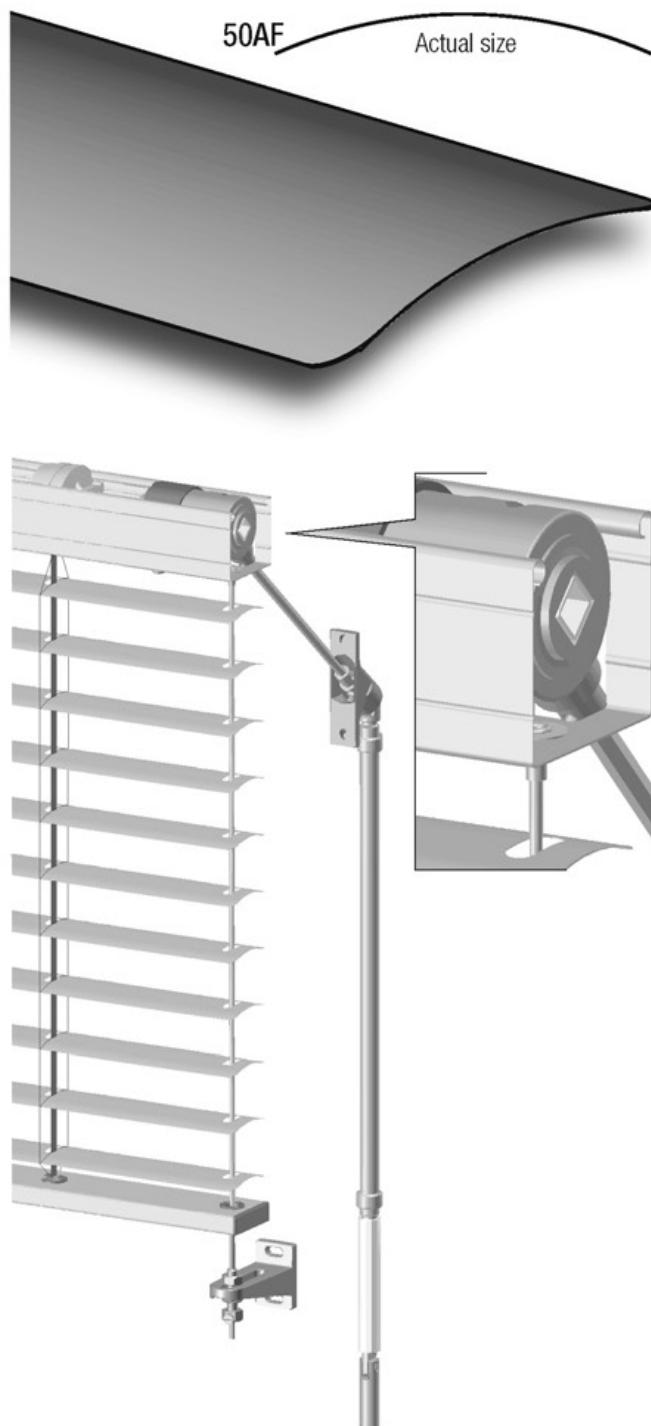
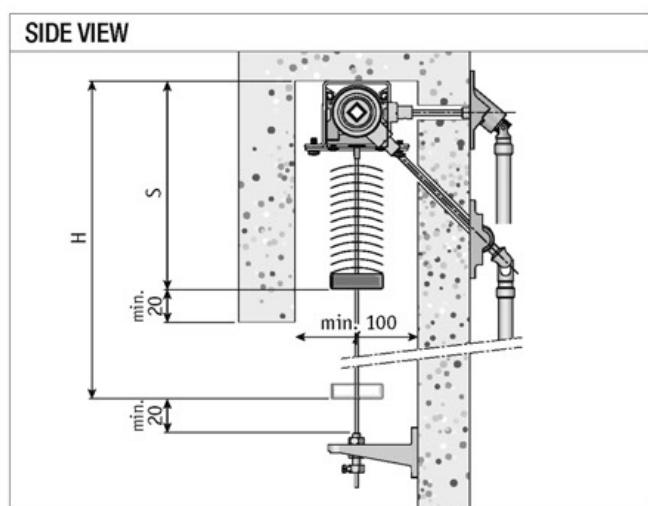
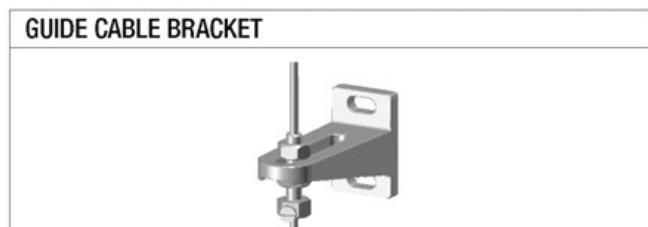
EVB K50AF

CRANK WAND OPERATED EXTERNAL VENETIAN BLIND
50 MM FLEXIBLE SLATS WITH SIDE GUIDING CABLES

K50AF : flexible 50 mm slats

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats closed
- Roll formed coil coated 50 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 50 x 15 mm
- Tensioned stainless steel cable Ø 3 mm with transparent nylon jacket
- Black bottom rail end caps, lift tape and polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size, intermediate cables and controls



SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|----------------|-----------------|-----------------|------------------|--------------------------------|
| Single K 50 AF | 45 | 400 | 400 | 12 |
| Group K 50 AF | | 800 | 400 | 16 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S | Blind height H | Stacking height S |
|----------------|-------------------|----------------|-------------------|
| 1000 | 117 | 3000 | 167 |
| 1500 | 130 | 3500 | 182 |
| 2000 | 142 | 4000 | 197 |
| 2500 | 155 | | |

OPTIONS EVB K50AF

GUIDE CABLE BRACKETS

3 sizes (X, mm);
 27 - 73
 67 - 133
 124 - 173

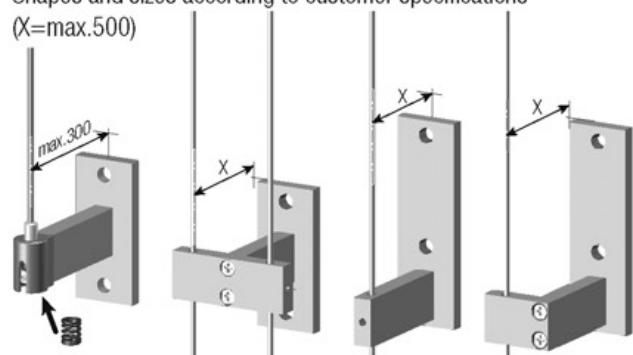


GUIDE CABLE BRACKETS, IDEFIX

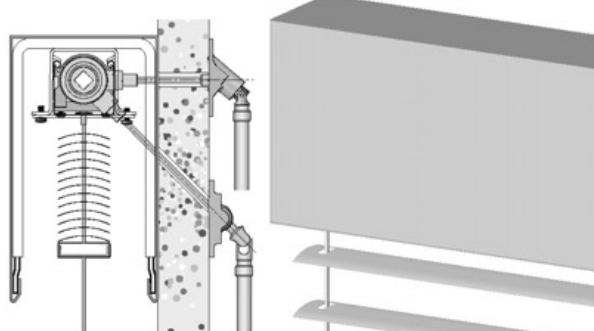
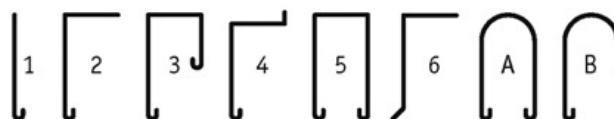


HEAVY DUTY CABLE BRACKETS

Shapes and sizes according to customer specifications
 (X=max.500)

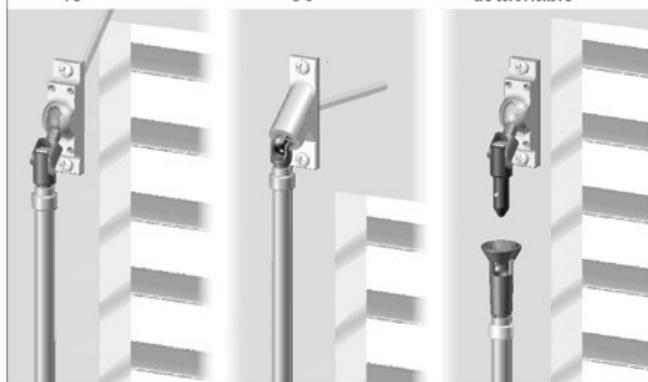


PELMET

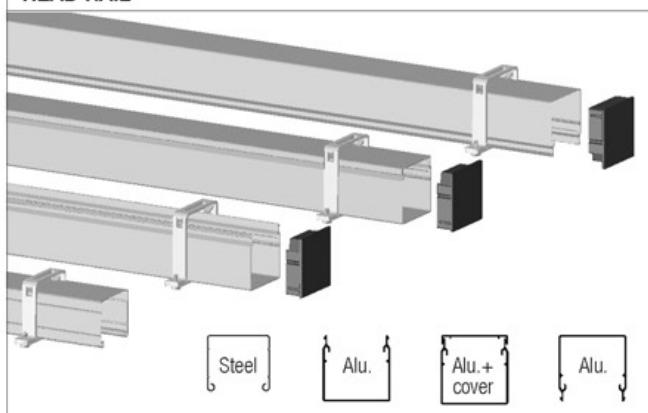


CRANK WAND

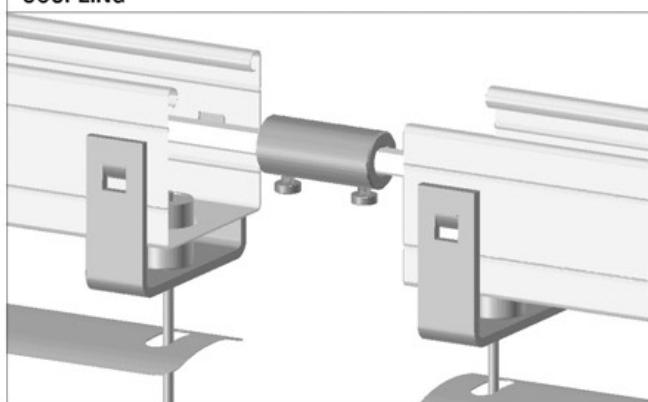
45° 90° detachable



HEAD RAIL



COUPLING



FURTHER OPTIONS

(Additional information on page 73)

- Spindle stop
- Lift tape and ladder cords in grey
- Perforated slats
- Additional guiding cable(s)

EVB EL60A, EL60AF

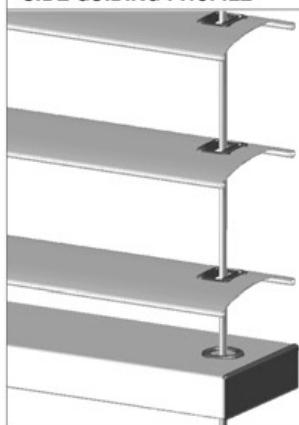
MOTOR OPERATED EXTERNAL VENETIAN BLIND
60 MM SLATS WITH SIDE GUIDING CABLES

EL60A : beaded 60 mm slats
EL60AF: flexible 60 mm slats

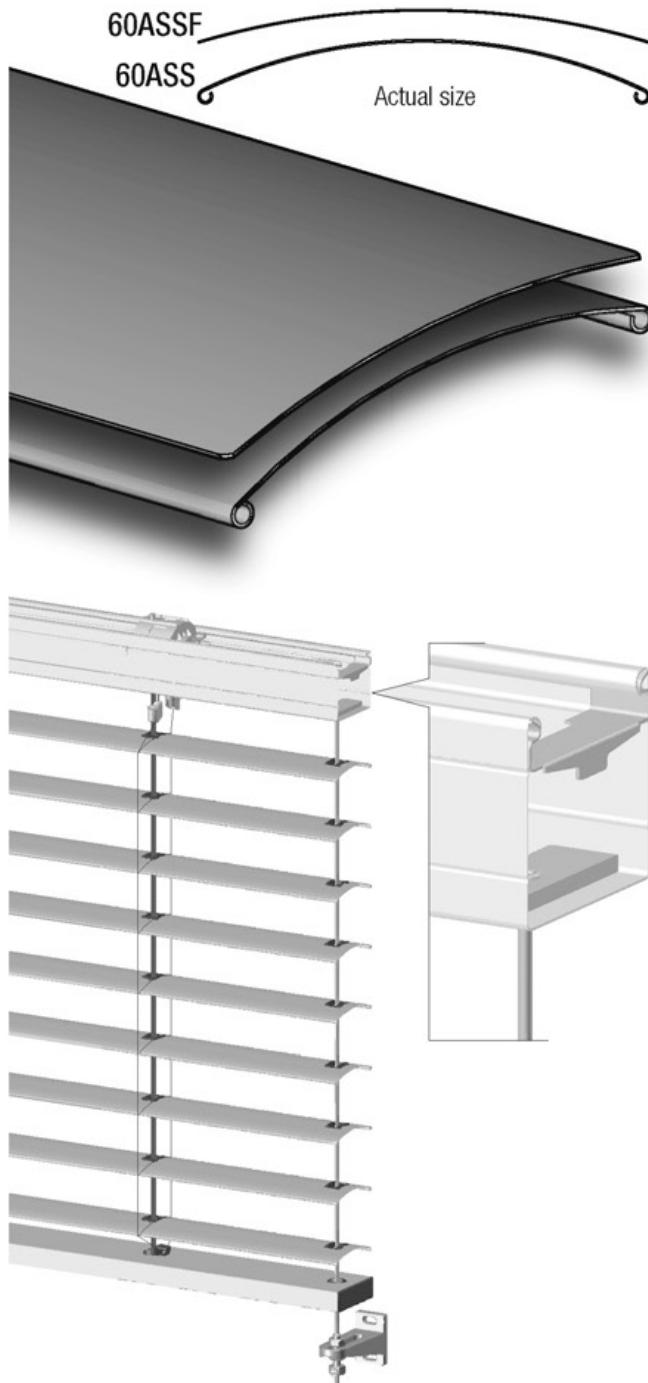
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Tensioned stainless steel cable ø 3 mm with transparent Nylon jacket
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

SIDE GUIDING PROFILE



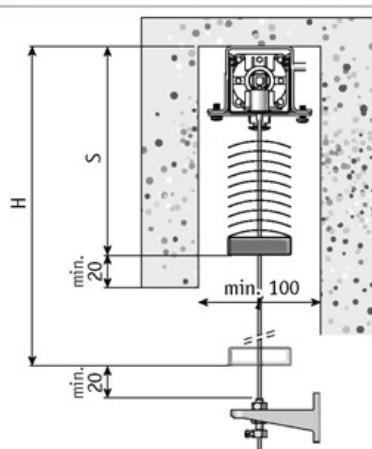
INTERMEDIATE GUIDING



GUIDE CABLE BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 60 A | 51 | 500 | 450 | 16 |
| Single | EL 60 AF | 51 | 500 | 400 | 16 |
| Group | EL 60 A | | 1000 | 450 | 20 |
| Group | EL 60 AF | | 1000 | 400 | 20 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S 60A | Stacking height S 60AF | Blind height H | Stacking height S 60A | Stacking height S 60AF |
|----------------|-----------------------|------------------------|----------------|-----------------------|------------------------|
| 1000 | 183 | 142 | 3000 | 340 | 225 |
| 1500 | 222 | 164 | 3500 | 380 | 242 |
| 2000 | 260 | 185 | 4000 | 420 | 256 |
| 2500 | 297 | 205 | 4500 | 460 | X |

OPTIONS EL60A, EL60AF

GUIDE CABLE BRACKETS

3 sizes (X, mm);
 27 - 73
 67 - 133
 124 - 173

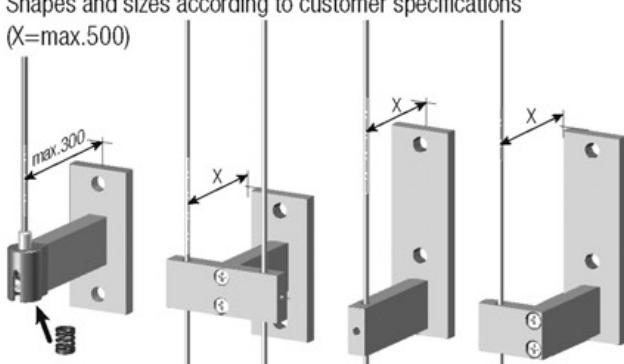


GUIDE CABLE BRACKETS, IDEFIX

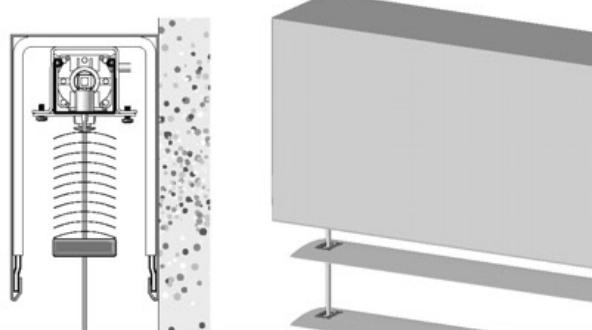
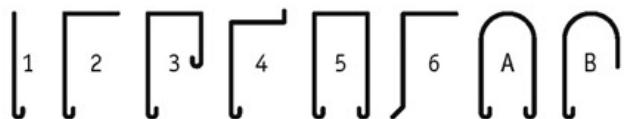


HEAVY DUTY CABLE BRACKETS

Shapes and sizes according to customer specifications
 (X=max.500)

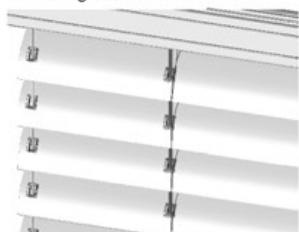


PELMET

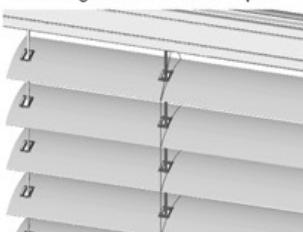


40° TIMER

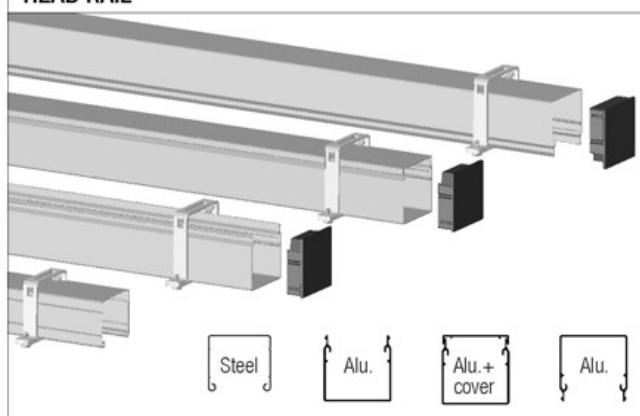
Standard;
 lowering with closed slats



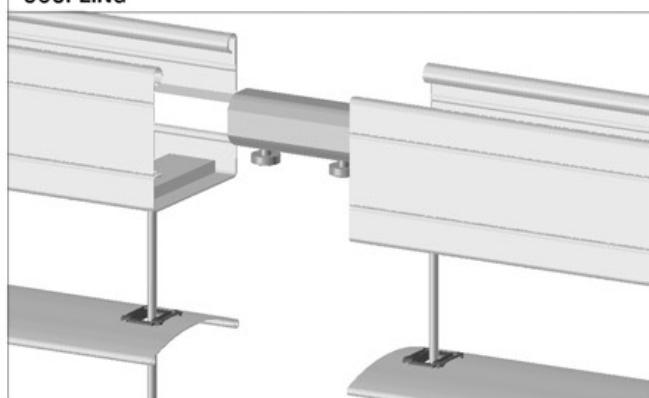
40° Timer;
 lowering with slats 40° open



HEAD RAIL



COUPLING



FURTHER OPTIONS (Additional information on page 73)

- Quick raise system for emergency situations (EL60AN, EL60AFN)
- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

EVB K60A, K60AF

CRANK OPERATED EXTERNAL VENETIAN BLIND
60 MM SLATS WITH SIDE GUIDING CABLES

K60A : beaded 60 mm slats
K60AF : flexible 60 mm slats

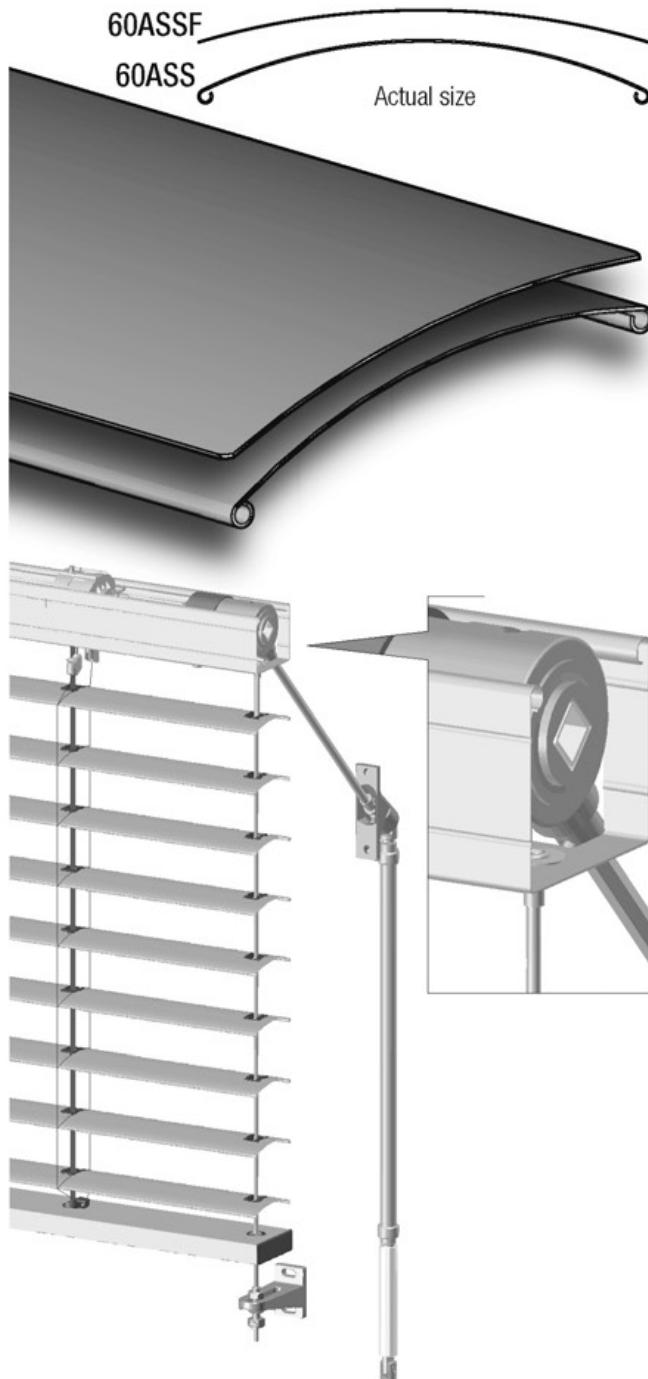
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Tensioned stainless steel cable ø 3 mm with transparent Nylon jacket
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

SIDE GUIDING PROFILE



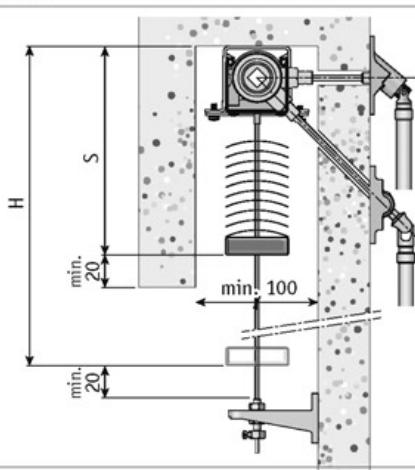
INTERMEDIATE GUIDING



GUIDE CABLE BRACKET



SIDE VIEW



SIZE LIMITATIONS

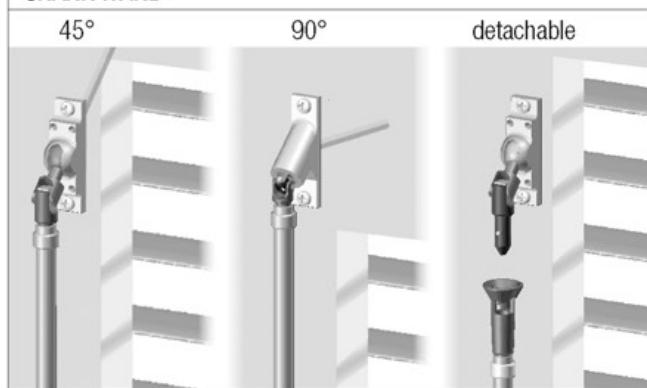
| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|---------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | K 60 A | 45 | 500 | 450 | 12 |
| | K 60 AF | 45 | 500 | 400 | 12 |
| Group | K 60 A | | 1000 | 450 | 12 |
| | K 60 AF | | 1000 | 400 | 12 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S 60A | Stacking height S 60AF | Blind height H | Stacking height S 60A | Stacking height S 60AF |
|----------------|-----------------------|------------------------|----------------|-----------------------|------------------------|
| 1000 | 173 | 132 | 3000 | 330 | 215 |
| 1500 | 212 | 154 | 3500 | 370 | 232 |
| 2000 | 250 | 175 | 4000 | 410 | 246 |
| 2500 | 287 | 195 | 4500 | 450 | X |

OPTIONS K60A, K60AF

CRANK WAND



GUIDE CABLE BRACKETS

3 sizes (X, mm);
27 - 73
67 - 133
124 - 173

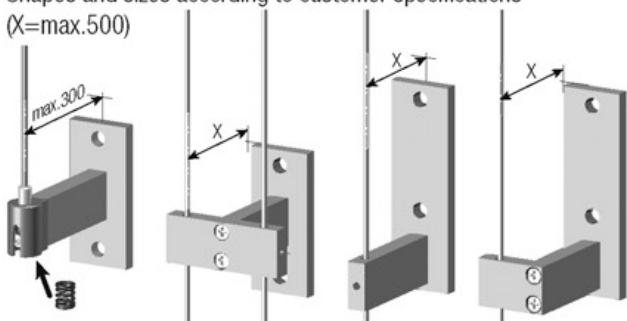


GUIDE CABLE BRACKETS, IDEFIX

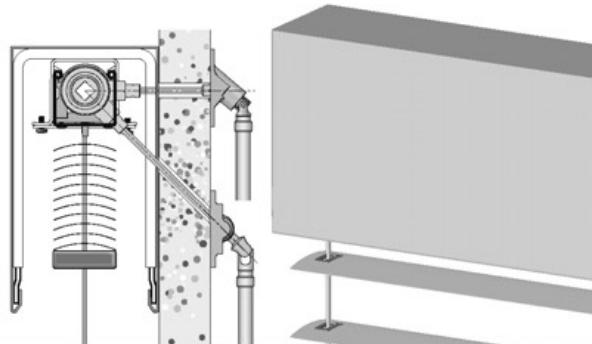
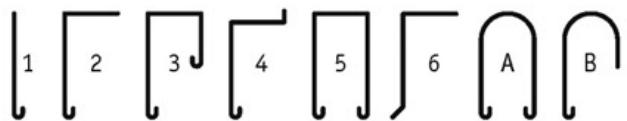


HEAVY DUTY CABLE BRACKETS

Shapes and sizes according to customer specifications
(X=max.500)

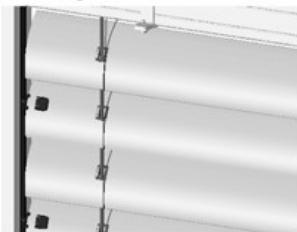


PELMET

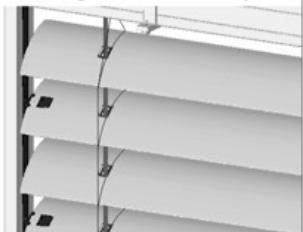


40° TIMER

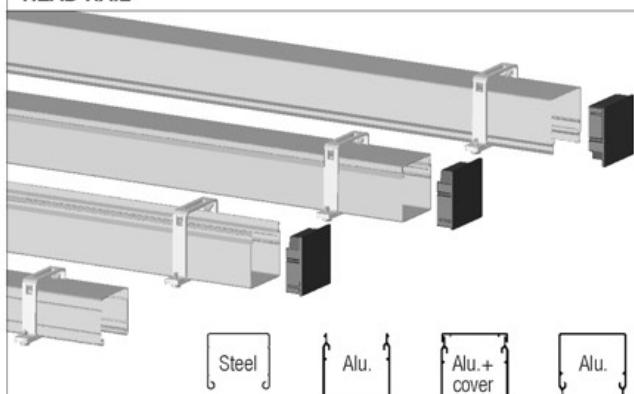
Standard;
lowering with closed slats



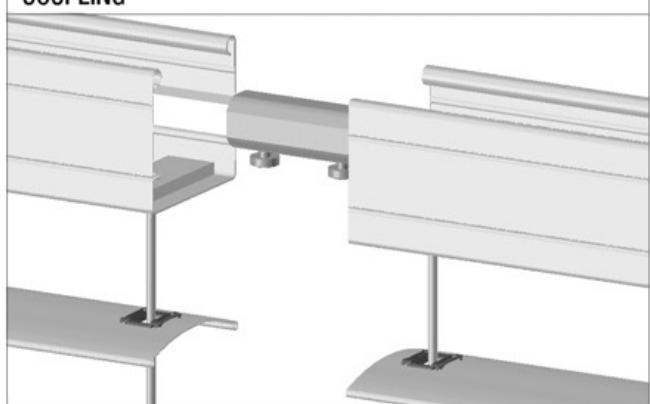
40° Timer;
lowering with slats 40° open



HEAD RAIL



COUPLING



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Spindle stop
- Perforated slats
- Additional guiding cable(s)

EVB EL60AS, EL60ASF

MOTOR OPERATED EXTERNAL VENETIAN BLIND

60 MM SLATS WITH STANDARD SIDE GUIDING CHANNELS

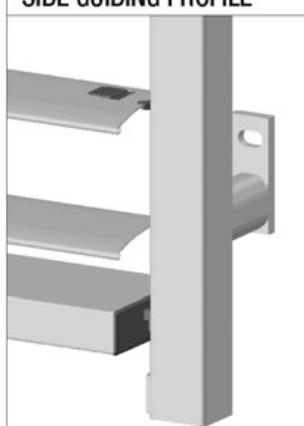
EL60AS : beaded 60 mm slats

EL60ASF : flexible 60 mm slats

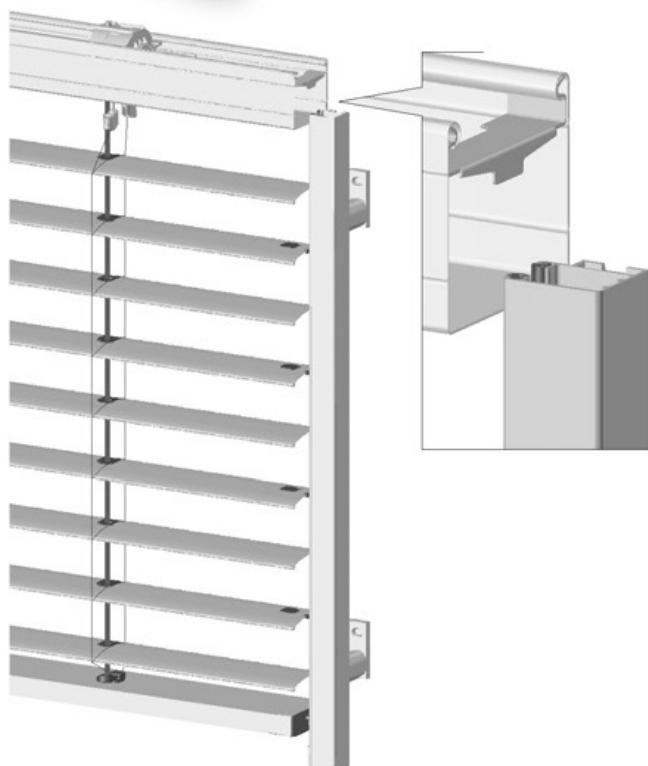
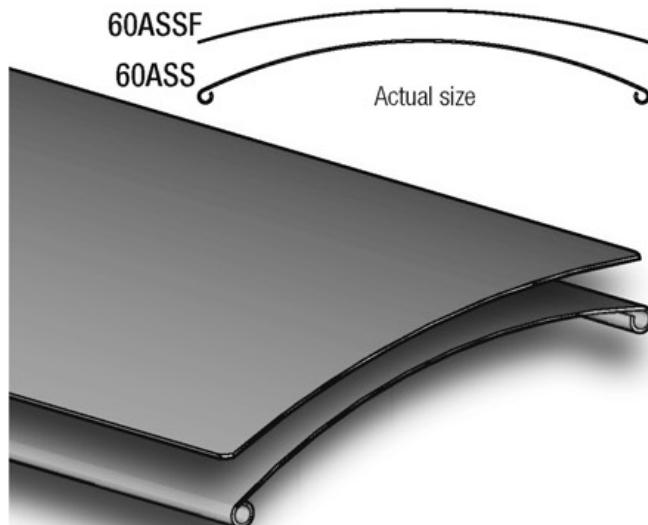
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Extruded side guiding channels 27 x 24 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

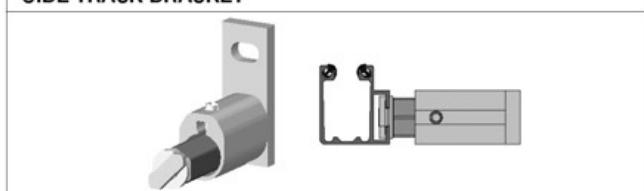
SIDE GUIDING PROFILE



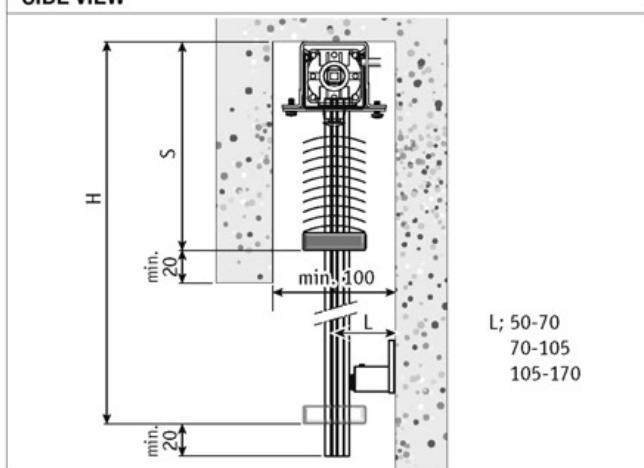
INTERMEDIATE GUIDING



SIDE TRACK BRACKET



SIDE VIEW



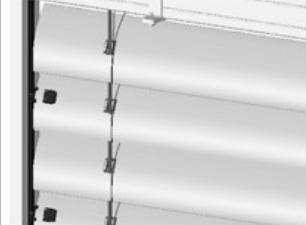
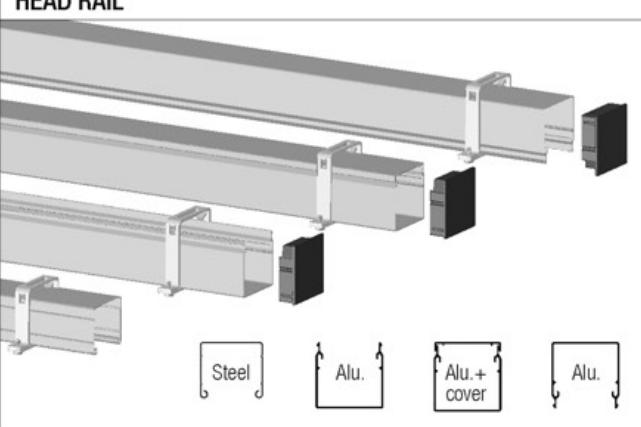
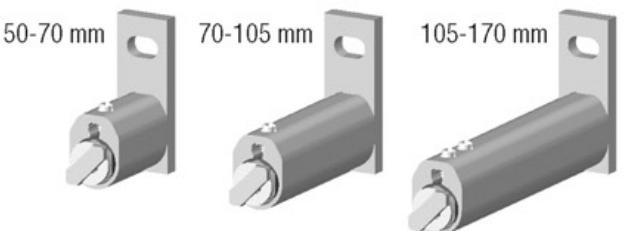
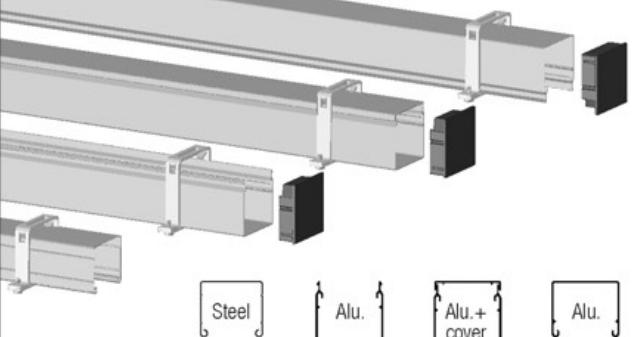
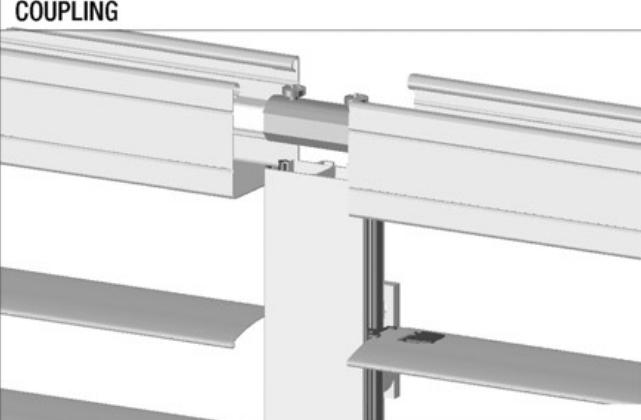
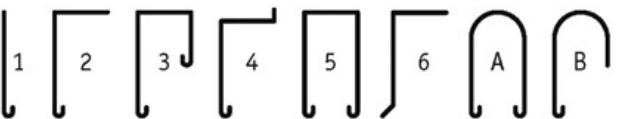
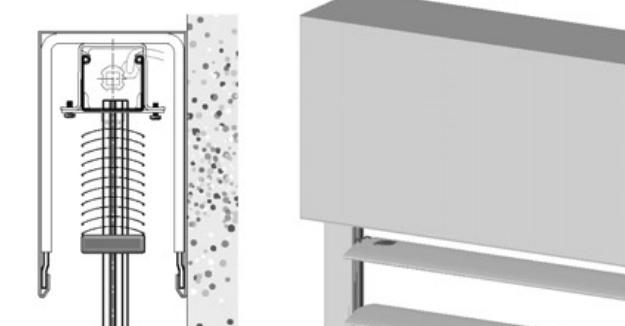
SIZE LIMITATIONS

| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|-----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 60 AS | 58 | 500 | 400 | 16 |
| | EL 60 ASF | 58 | 300 | 400 | 12 |
| Group | EL 60 AS | | 1000 | 400 | 20 |
| | EL 60 ASF | | 1000 | 400 | 20 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S 60AS | Stacking height S 60ASF | Blind height H | Stacking height S 60AS | Stacking height S 60ASF |
|-------------------|------------------------------|-------------------------------|-------------------|------------------------------|-------------------------------|
| 1000 | 183 | 142 | 3000 | 340 | 225 |
| 1500 | 222 | 164 | 3500 | 380 | 242 |
| 2000 | 260 | 185 | 4000 | 420 | 256 |
| 2500 | 297 | 205 | | | |

OPTIONS EL60AS, EL60ASF

| | | | |
|--|--|--|--|
| | | 40° TIMER | |
| Standard; lowering with closed slats | | 40° Timer; lowering with slats 40° open | |
|  | |  | |
| HEAD RAIL | | | |
|  | | | |
| SIDE TRACK BRACKETS | | SIDE TRACKS | |
|  | |  | |
| COUPLING | | | |
|  | | | |
| PELMET | | FURTHER OPTIONS (Additional information on page 73) | |
|  | | <ul style="list-style-type: none"> • Quick raise system for emergency situations (EL60ASN) • Dual Light Control • Slow motion motor for more precise slat tilting • Perforated slats • Additional guiding cable(s) • For possible motor controls see separately available documentation • Lockable bottomrail, to use in case of an emergency | |
|  | | | |

EVB K60AS, K60ASF

CRANK OPERATED EXTERNAL VENETIAN BLIND

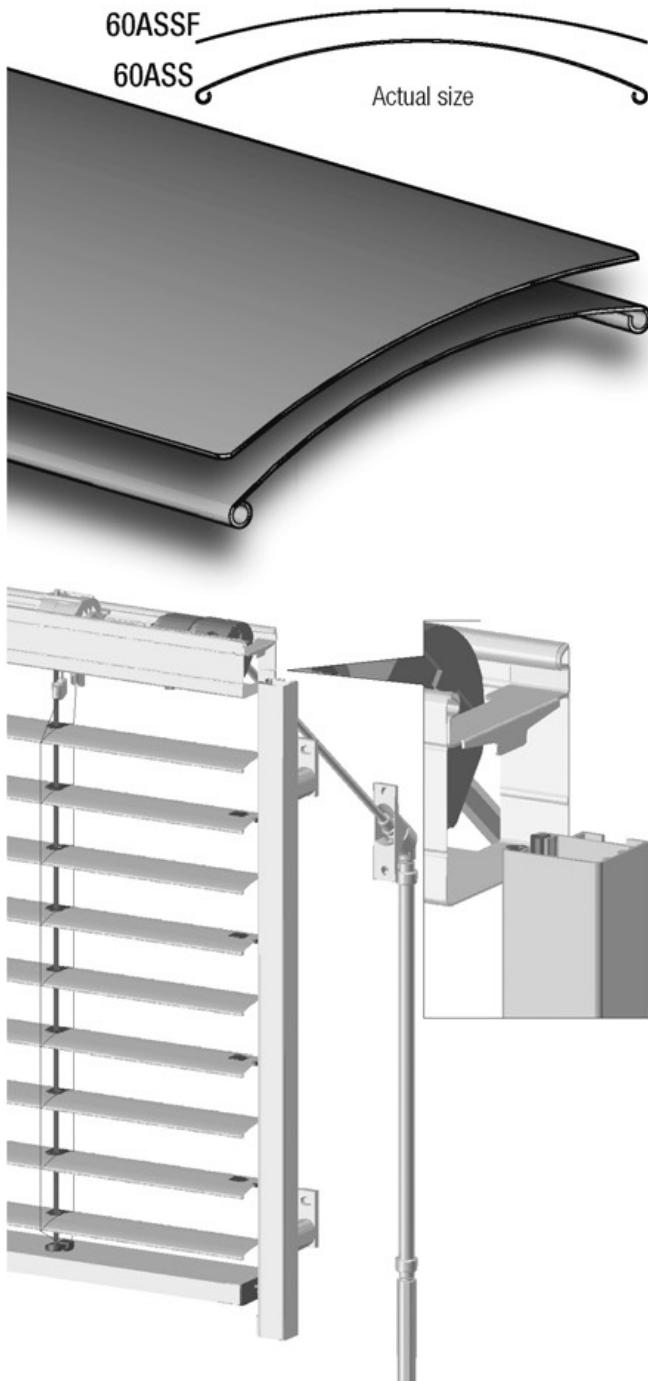
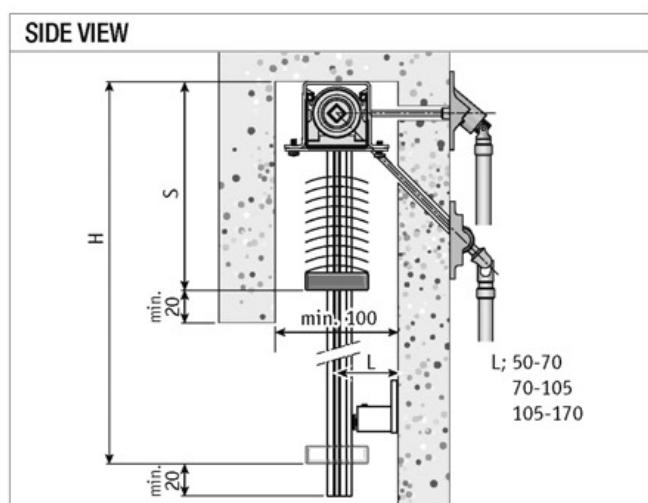
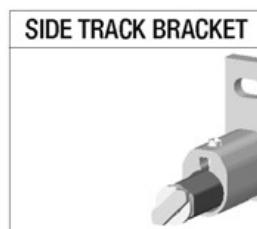
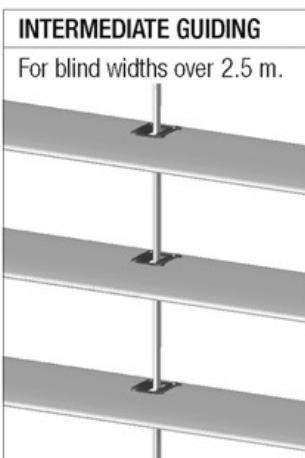
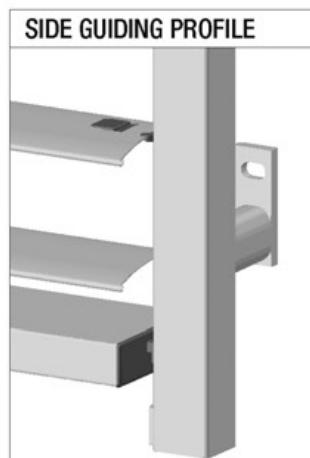
60 MM SLATS WITH STANDARD SIDE GUIDING CHANNELS

K60AS : beaded 60 mm slats

K60ASF: flexible 60 mm slats

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Extruded side guiding channels 27 x 24 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | K 60 AS | 52 | 500 | 400 | 12 |
| | K 60 ASF | 52 | 300 | 400 | 12 |
| Group | K 60 AS | | 1000 | 400 | 12 |
| | K 60 ASF | | 900 | 400 | 12 |

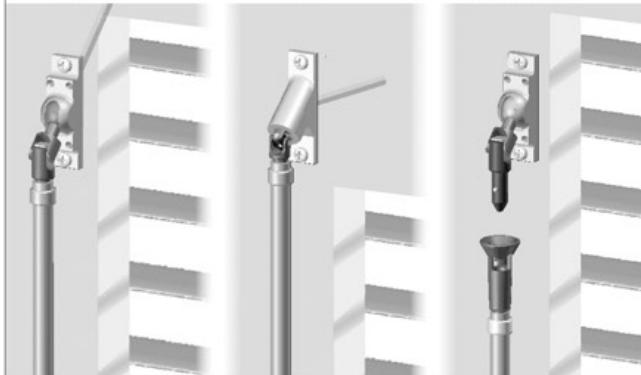
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S 60AS | Stacking height S 60ASF | Blind height H | Stacking height S 60AS | Stacking height S 60ASF |
|-------------------|------------------------------|-------------------------------|-------------------|------------------------------|-------------------------------|
| 1000 | 173 | 132 | 3000 | 330 | 215 |
| 1500 | 212 | 154 | 3500 | 370 | 232 |
| 2000 | 250 | 175 | 4000 | 410 | 246 |
| 2500 | 287 | 195 | | | |

OPTIONS K60AS, K60ASF

CRANK WAND

45° 90° detachable

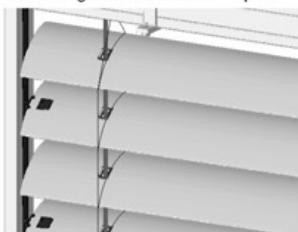


40° TIMER

Standard;
lowering with closed slats



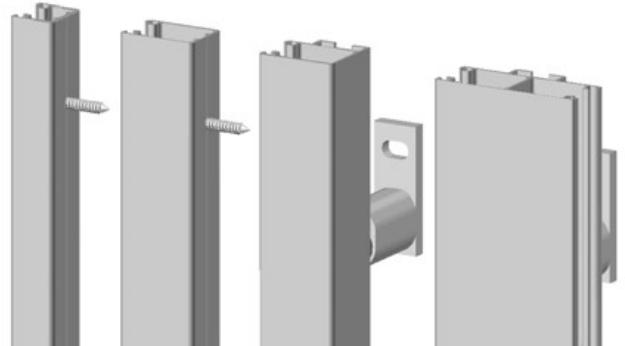
40° Timer;
lowering with slats 40° open



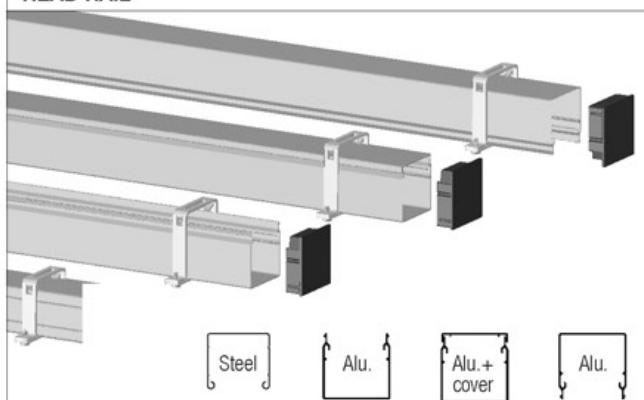
SIDE TRACK BRACKETS



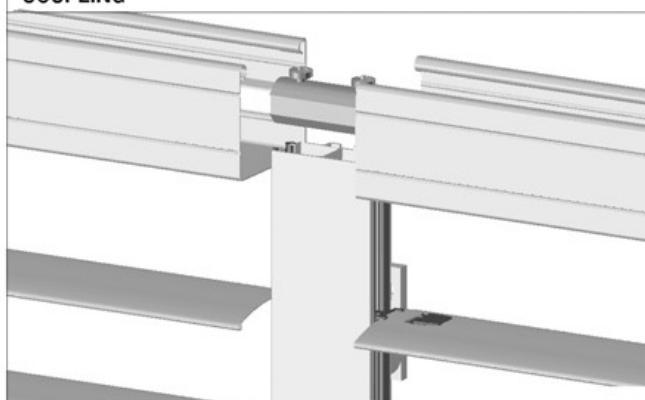
SIDE TRACKS



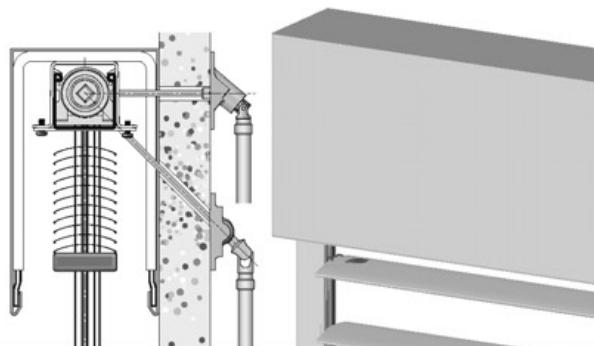
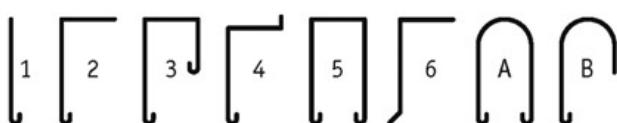
HEAD RAIL



COUPLING



PELMET



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Spindle stop
- Perforated slats
- Additional guiding cable(s)
- Lockable bottomrail, to use in case of an emergency

EVB EL60ASC, EL60ASCF

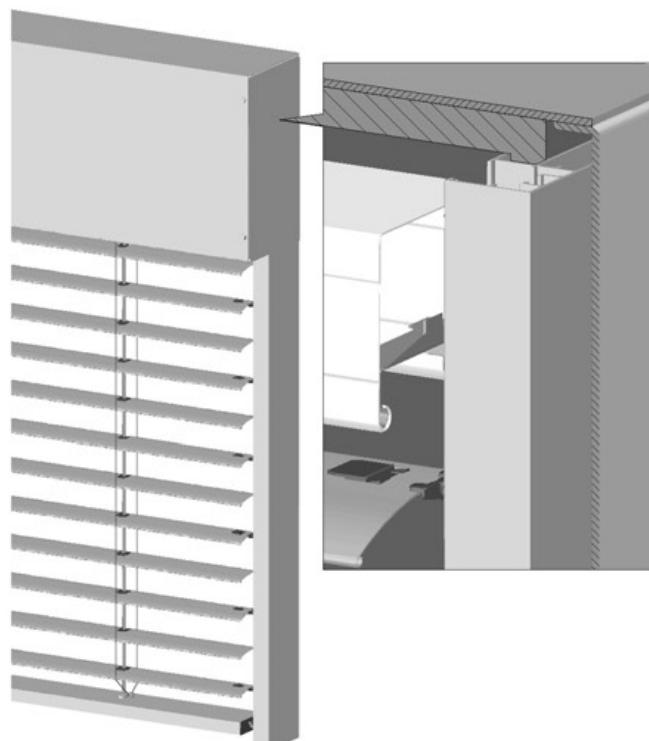
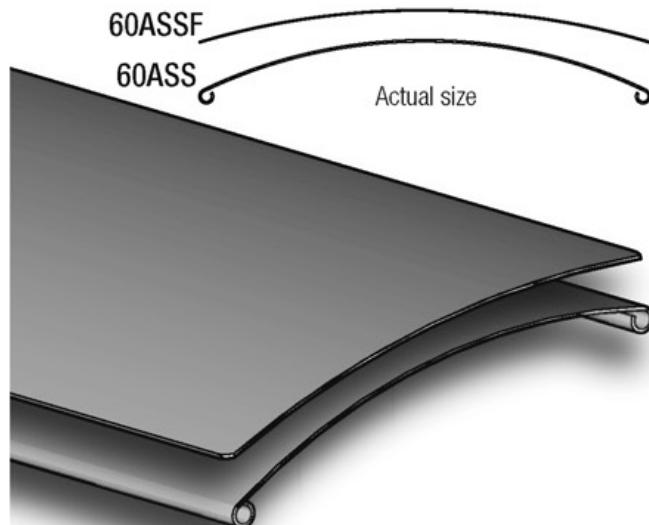
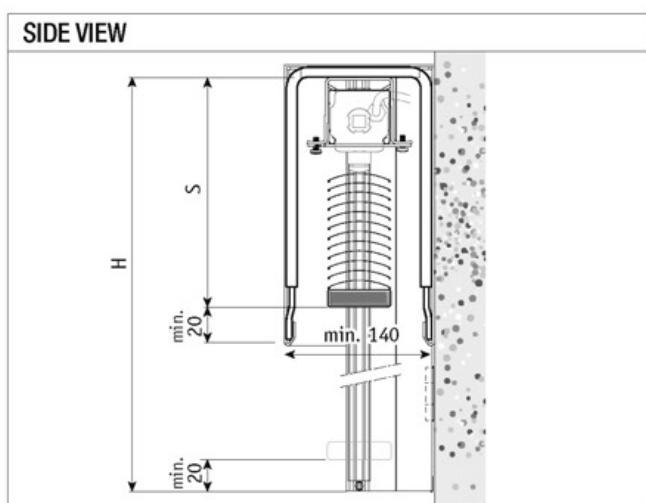
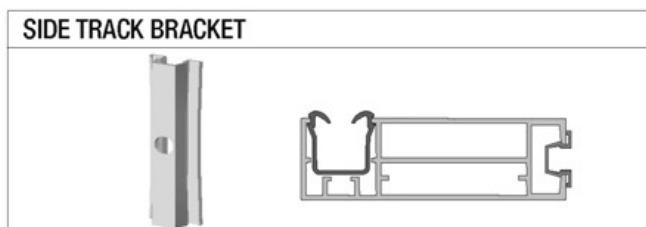
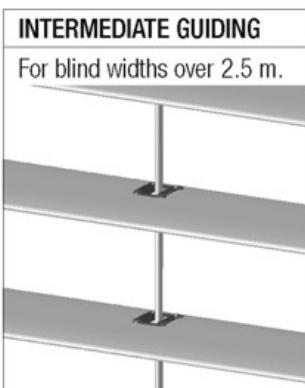
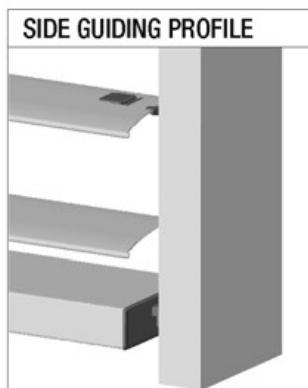
MOTOR OPERATED EXTERNAL VENETIAN BLIND "CLICK"
60 MM SLATS WITH CLIP-ON SIDE GUIDING CHANNELS

EL60ASC : beaded 60 mm slats

EL60ASCF : flexible 60 mm slats

Description

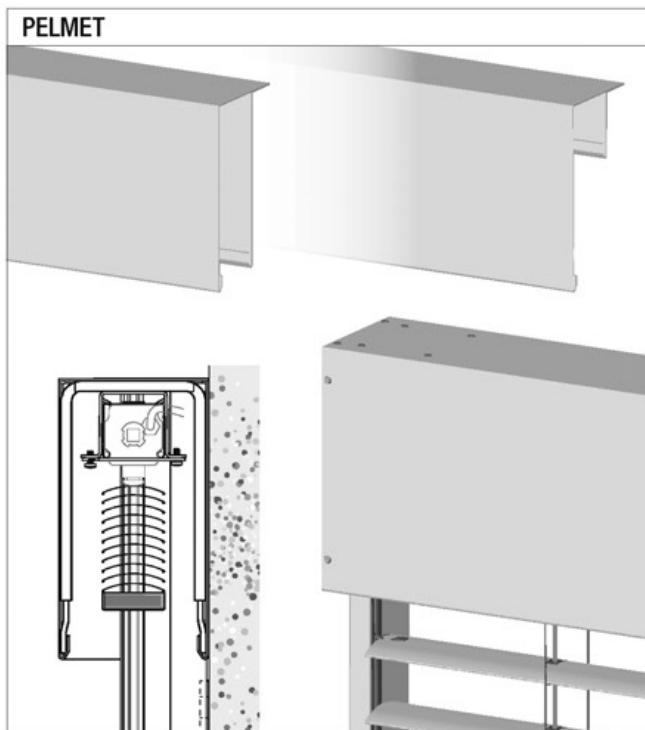
- Easy to mount "CLICK" blind pre-installed in customised natural anodised or powder coated aluminium pelmet
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Extruded side guiding channels 81 x 25 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



| SIZE LIMITATIONS | | | | |
|------------------|--------------------|--------------------|---------------------|-----------------------------------|
| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
| EL 60 ASC | 78 | 350 | 400 | 12 |
| EL 60 ASCF | 78 | 350 | 400 | 12 |

| STACKING HEIGHT (MM) (intermediate blind heights on page 77) | | | | | |
|--|-------------------------------|--------------------------------|-------------------|-------------------------------|--------------------------------|
| Blind height H | Stacking height S 60ASC | Stacking height S 60ASCF | Blind height H | Stacking height S 60ASC | Stacking height S 60ASCF |
| 1000 | 193 | 152 | 3000 | 350 | 235 |
| 1500 | 232 | 174 | 3500 | 390 | 252 |
| 2000 | 270 | 195 | 4000 | 430 | 266 |
| 2500 | 307 | 215 | | | |

OPTIONS EL60ASC, EL60ASCF

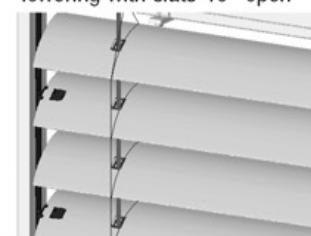


40° TIMER

Standard;
lowering with closed slats



40° Timer;
lowering with slats 40° open



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

EVB EL60ASS, EL60ASSF

MOTOR OPERATED EXTERNAL VENETIAN BLIND

60 MM SLATS WITH PUSH-ON SIDE GUIDING CHANNELS

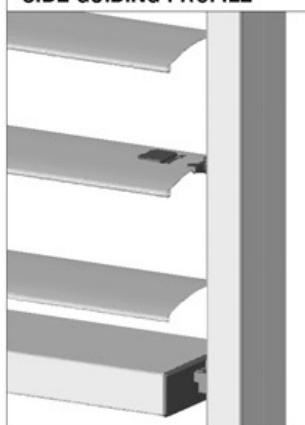
EL60ASS : beaded 60 mm slats

EL60ASSF: flexible 60 mm slats

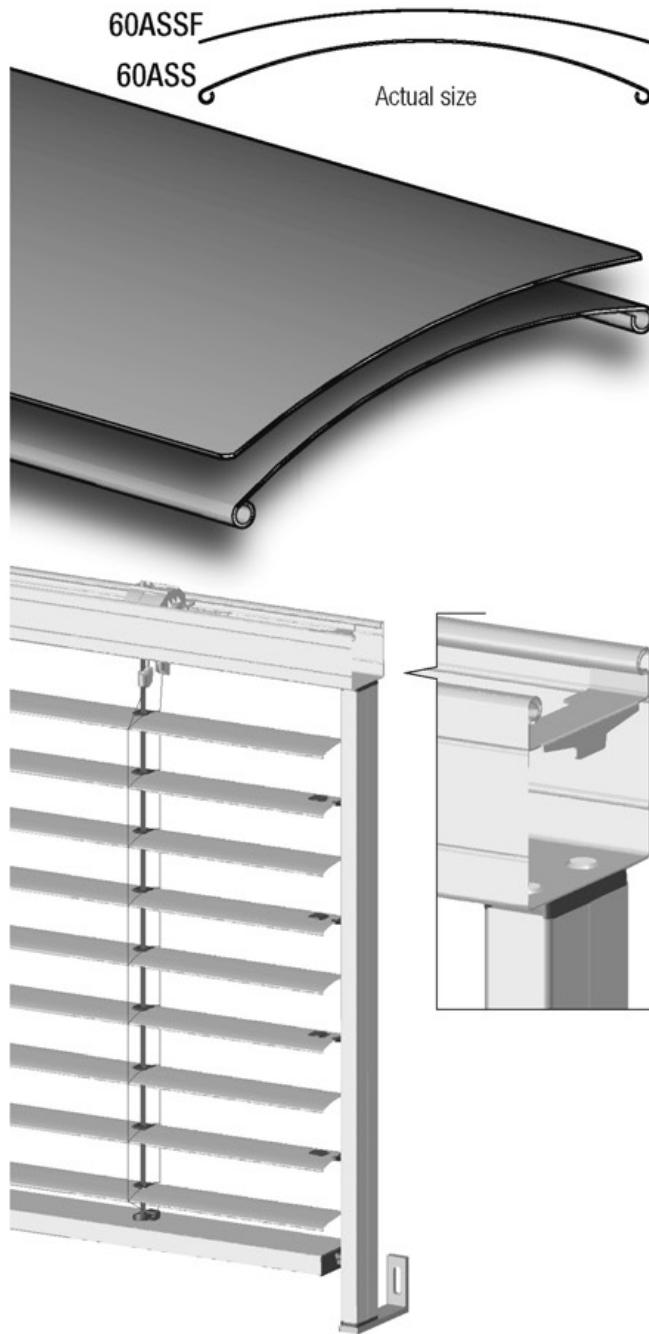
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

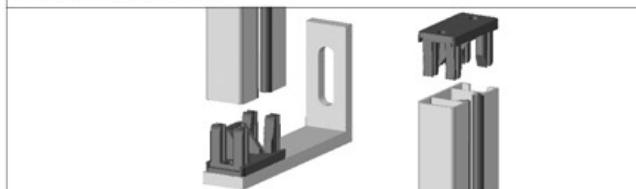
SIDE GUIDING PROFILE



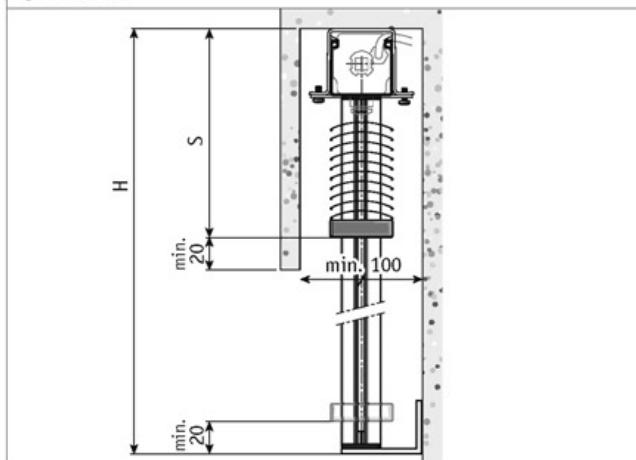
INTERMEDIATE GUIDING



PUSH-ON BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 60 ASS | 56 | 300 | 250 | 7 |
| | EL 60 ASSF | 56 | 300 | 250 | 7 |
| Group | EL 60 ASS | | 1000 | 250 | 20 |
| | EL 60 ASSF | | 1000 | 250 | 20 |

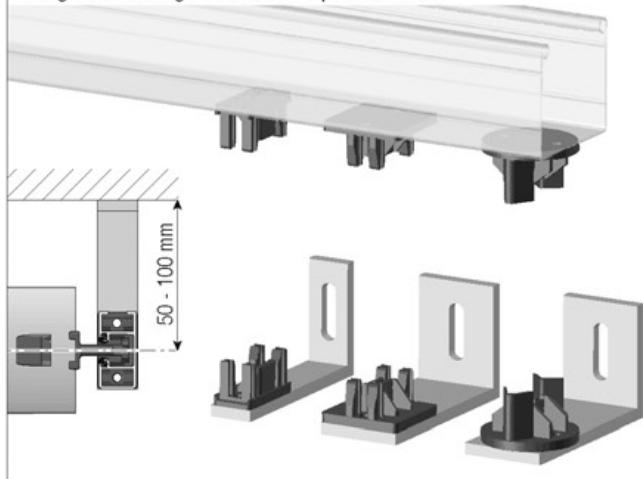
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S 60ASS | Stacking height S 60ASSF | Blind height H | Stacking height S 60ASS | Stacking height S 60ASSF |
|-------------------|-------------------------------|--------------------------------|-------------------|-------------------------------|--------------------------------|
| 1000 | 183 | 142 | 2000 | 260 | 185 |
| 1500 | 222 | 164 | 2500 | 297 | 205 |

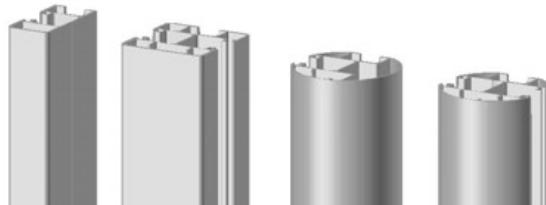
OPTIONS EL60ASS, EL60ASSF

SIDE TRACK BRACKETS

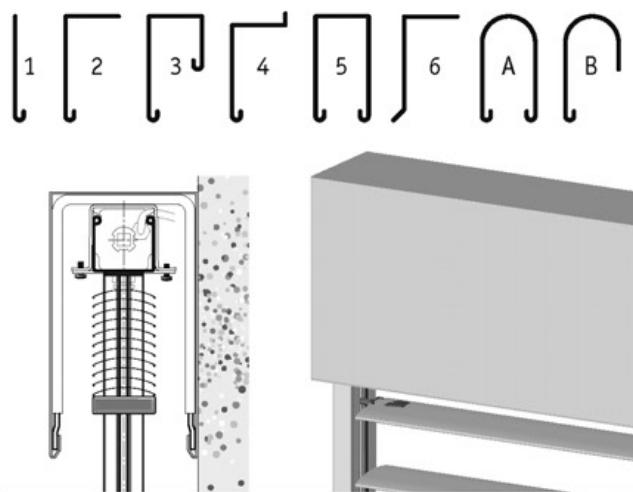
Length according to customer specifications.



SIDE TRACKS



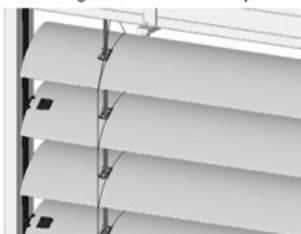
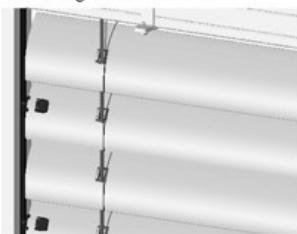
PELMET



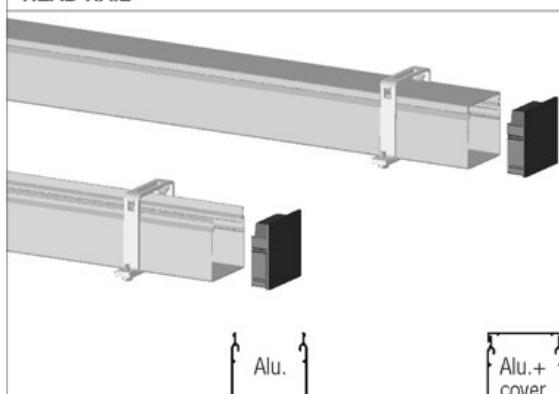
40° TIMER

Standard;
lowering with closed slats

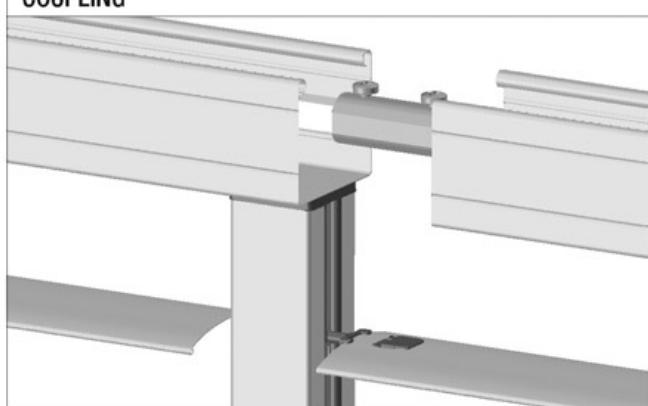
40° Timer;
lowering with slats 40° open



HEAD RAIL



COUPLING



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

EVB K60ASS, K60ASSF

CRANK OPERATED EXTERNAL VENETIAN BLIND

60 MM SLATS WITH PUSH-ON SIDE GUIDING CHANNELS

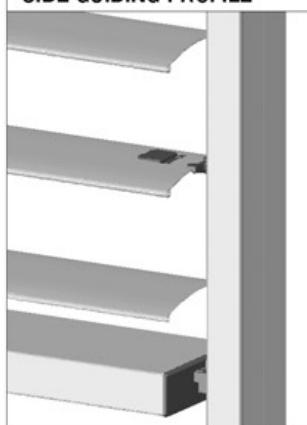
K60ASS : beaded 60 mm slats

K60ASSF : flexible 60 mm slats

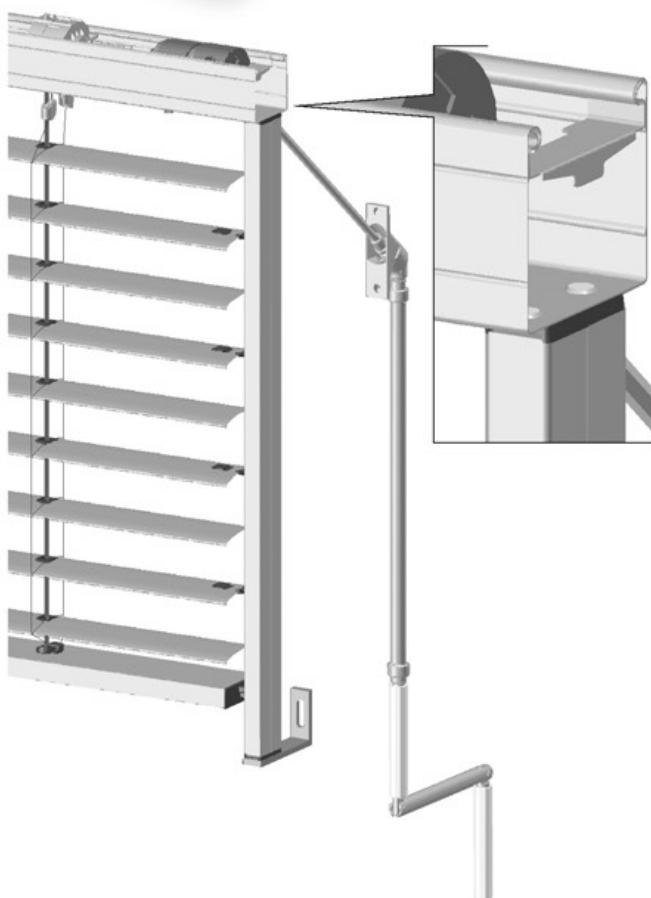
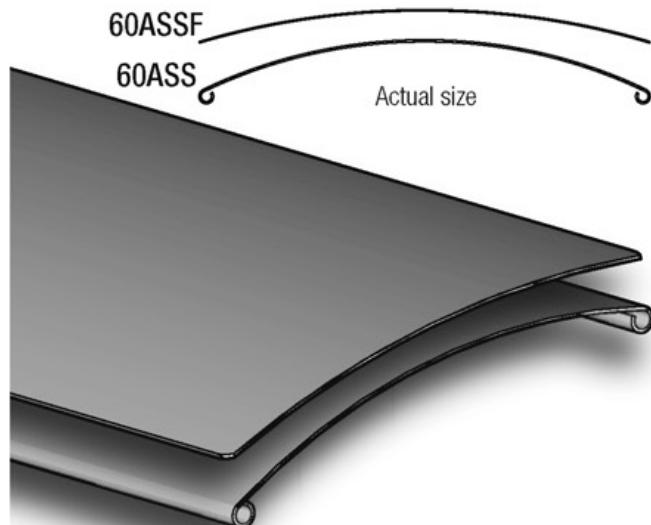
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

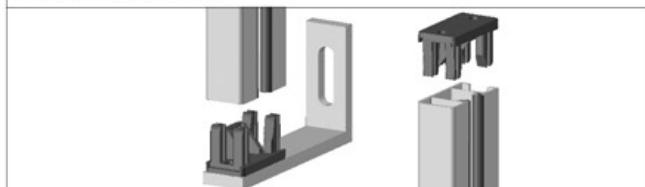
SIDE GUIDING PROFILE



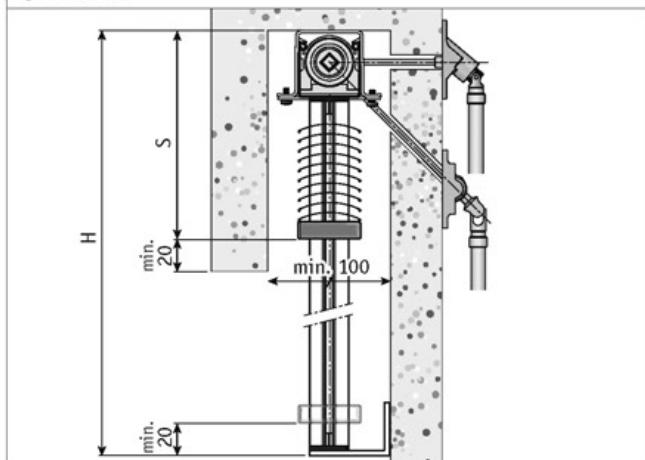
INTERMEDIATE GUIDING



PUSH-ON BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | K 60 ASS | 50 | 300 | 250 |
| | K 60 ASSF | 50 | 300 | 250 |
| Group | K 60 ASS | | 1000 | 12 |
| | K 60 ASSF | | 1000 | 250 |
| | | | 250 | 12 |

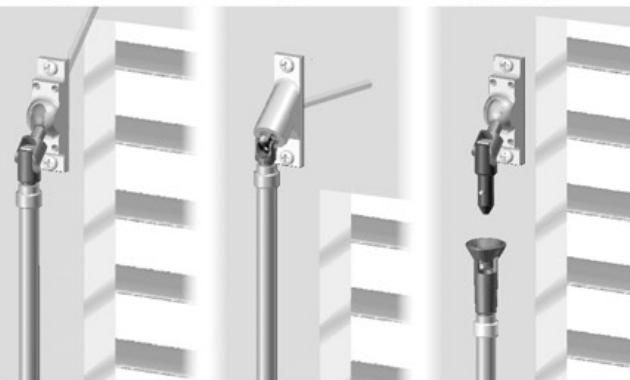
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S 60ASS | Stacking height S 60ASSF | Blind height H | Stacking height S 60ASS | Stacking height S 60ASSF |
|----------------|-------------------------|--------------------------|----------------|-------------------------|--------------------------|
| 1000 | 173 | 132 | 2000 | 250 | 175 |
| 1500 | 212 | 154 | 2500 | 287 | 195 |

OPTIONS K60ASS, K60ASSF

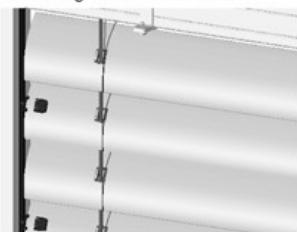
CRANK WAND

45° 90° detachable

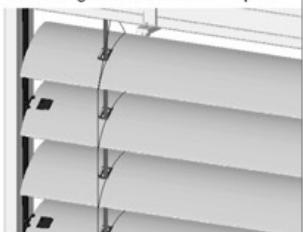


40° TIMER

Standard;
lowering with closed slats

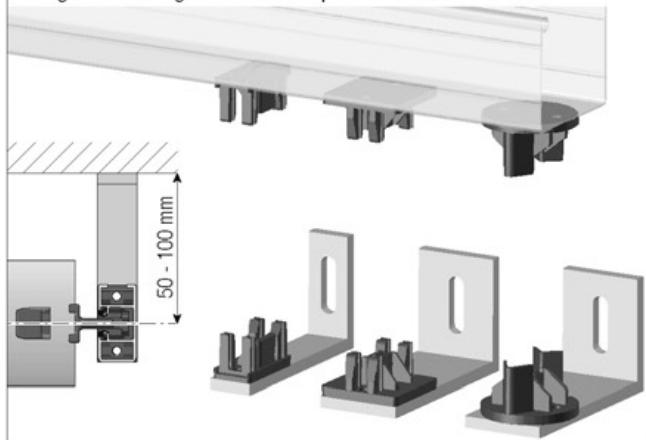


40° Timer;
lowering with slats 40° open

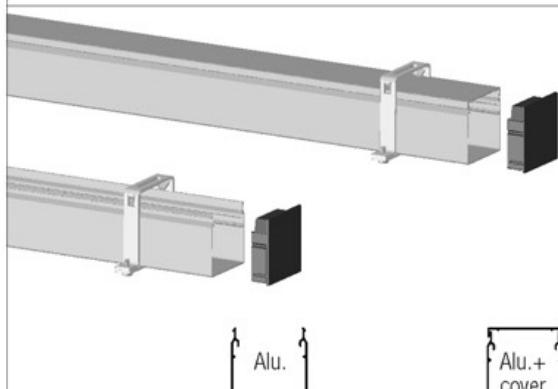


SIDE TRACK BRACKETS

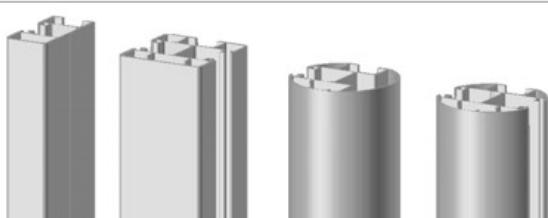
Length according to customer specifications.



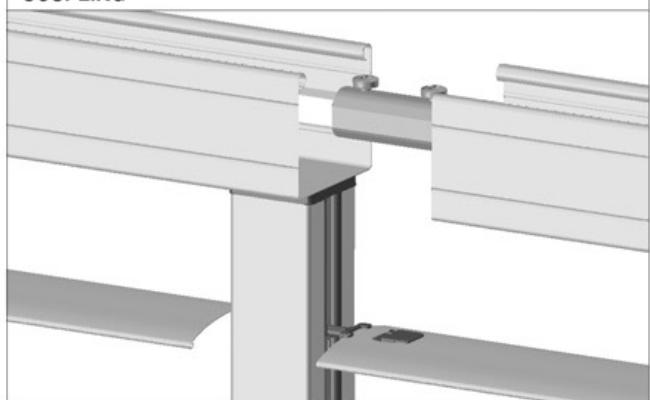
HEAD RAIL



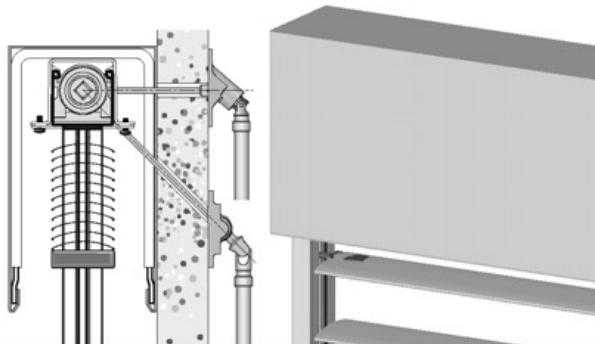
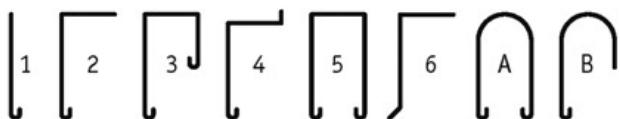
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS

(Additional information on page 73)

- Dual Light Control
- Spindle stop
- Perforated slats
- Additional guiding cable(s)

EVB EL60ASK, EL60ASKF

MOTOR OPERATED EXTERNAL VENETIAN BLIND

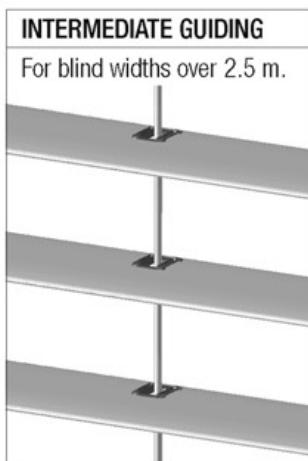
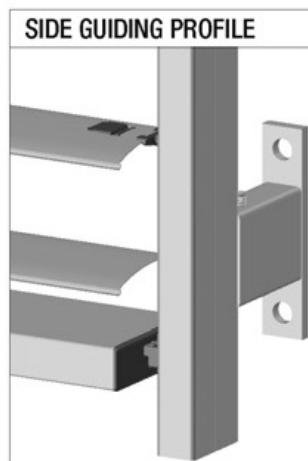
60 MM SLATS WITH CLAMP-ON SIDE GUIDING CHANNELS

EL60ASK : beaded 60 mm slats

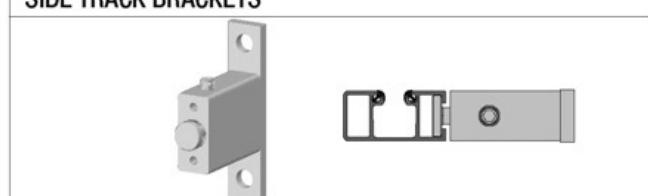
K60ASKF : flexible 60 mm slats

Description

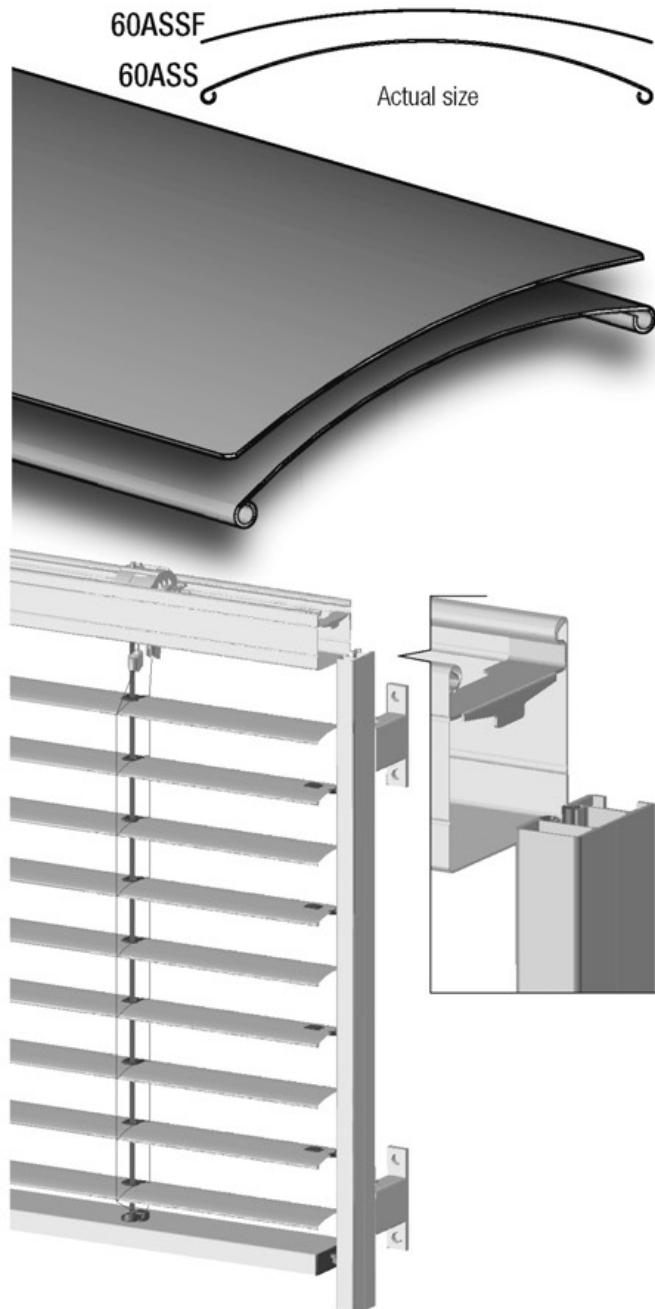
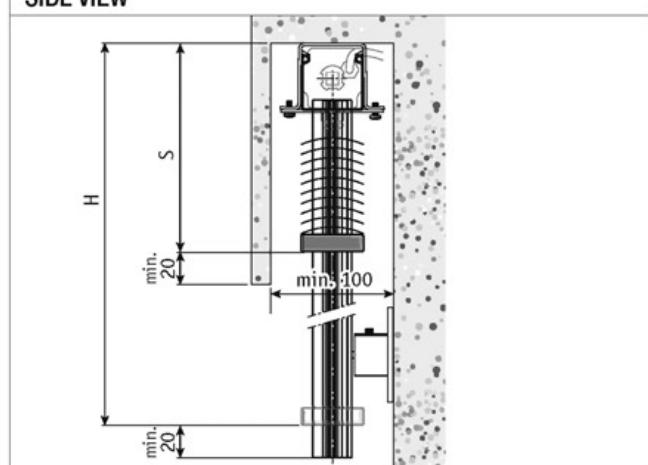
- Installation on or in between side tracks
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



SIDE TRACK BRACKETS



SIDE VIEW



SIZE LIMITATIONS

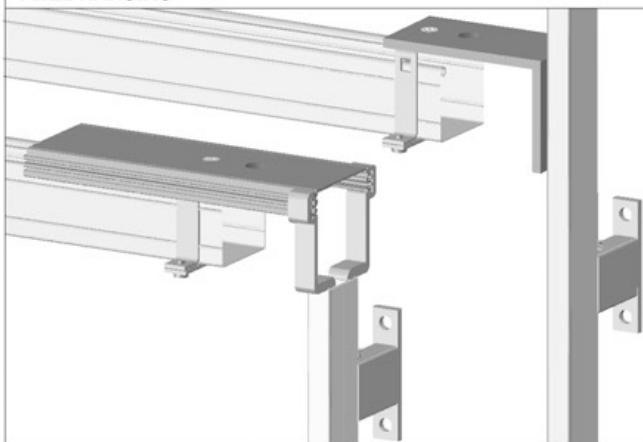
| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 60 ASK | 56 | 500 | 400 | 16 |
| | EL 60 ASKF | 56 | 300 | 400 | 12 |
| Group | EL 60 ASK | | 1000 | 400 | 20 |
| | EL 60 ASKF | | 1000 | 400 | 12 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S 60ASK | Stacking height S 60ASKF | Blind height H | Stacking height S 60ASK | Stacking height S 60ASKF |
|-------------------|-------------------------------|--------------------------------|-------------------|-------------------------------|--------------------------------|
| 1000 | 183 | 142 | 3000 | 340 | 225 |
| 1500 | 222 | 164 | 3500 | 380 | 242 |
| 2000 | 260 | 185 | 4000 | 420 | 256 |
| 2500 | 297 | 205 | | | |

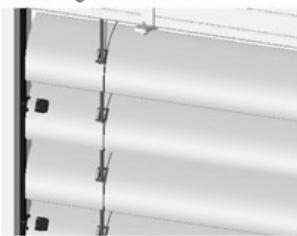
OPTIONS EL60ASK, EL60ASKF

FREE HANGING

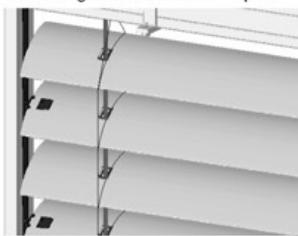


40° TIMER

Standard;
lowering with closed slats

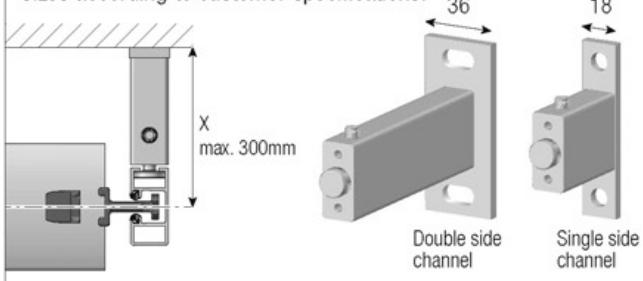


40° Timer;
lowering with slats 40° open

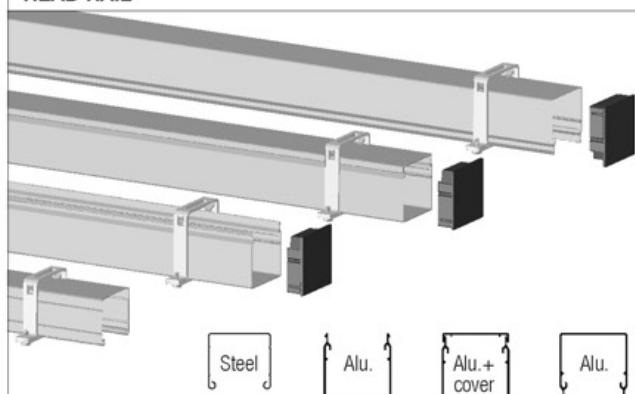


SIDE TRACK BRACKETS

Sizes according to customer specifications.



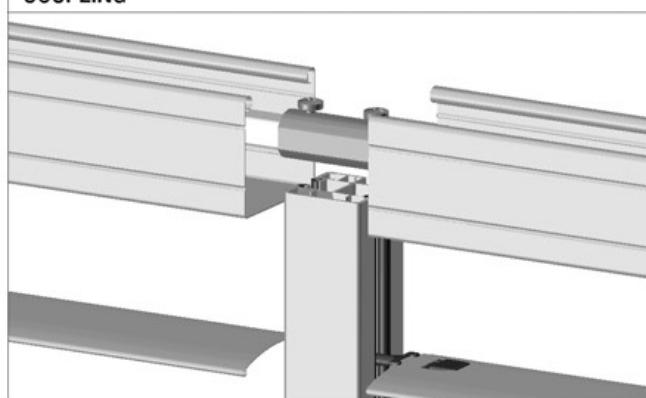
HEAD RAIL



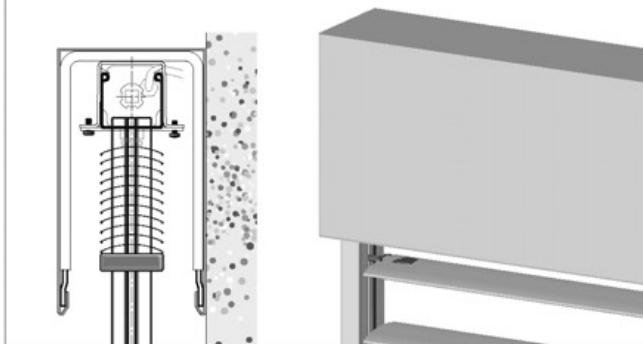
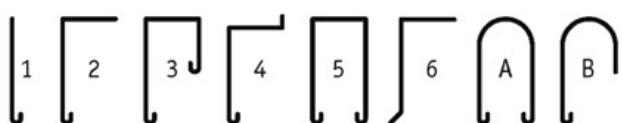
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS

(Additional information on page 73)

- Quick raise system for emergency situations (EL60ASKN)
- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- Additional guiding cable(s)
- Free hanging system
- For possible motor controls see separately available documentation

EVB K60ASK, K60ASKF

CRANK OPERATED EXTERNAL VENETIAN BLIND

60 MM SLATS WITH CLAMP-ON SIDE GUIDING CHANNELS

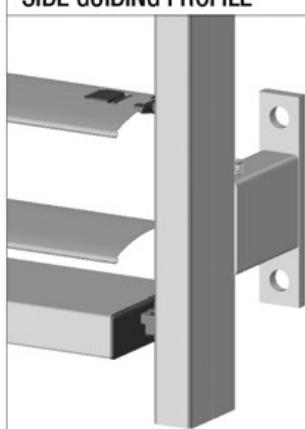
K60ASK : beaded 60 mm slats

K60ASKF : flexible 60 mm slats

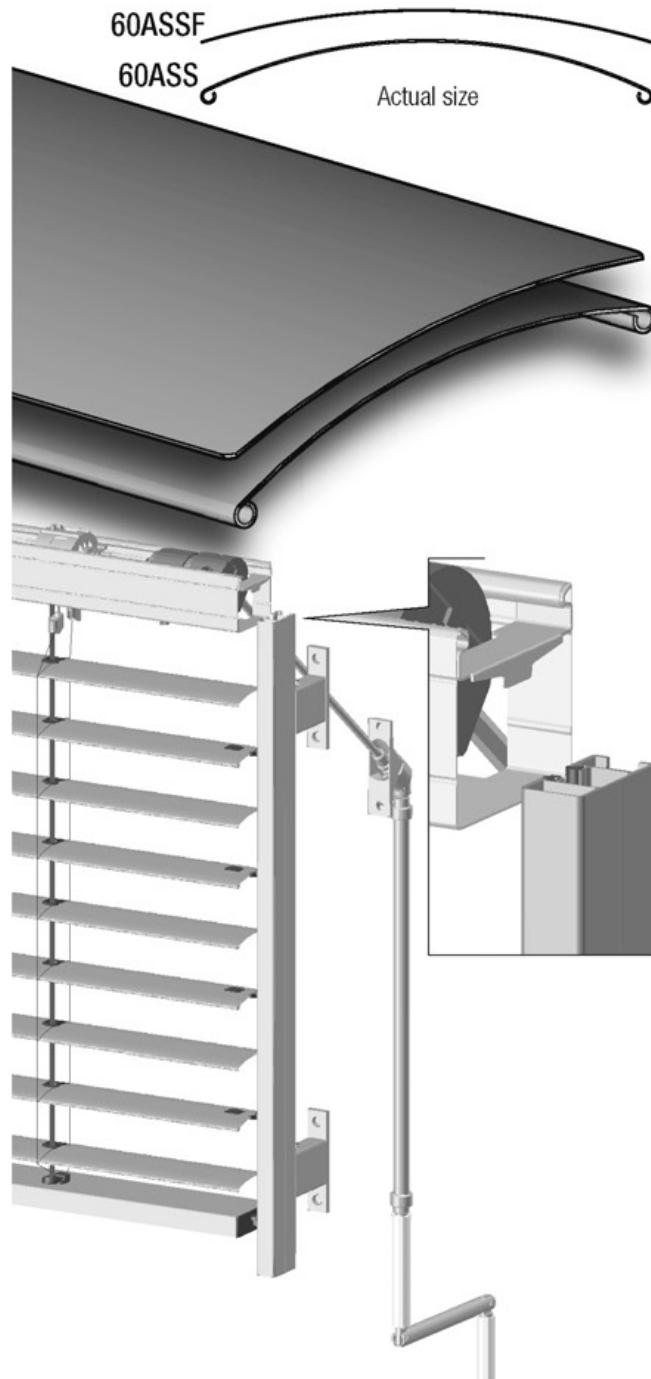
Description

- Installation on or in between side tracks
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 60 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 60 x 19 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

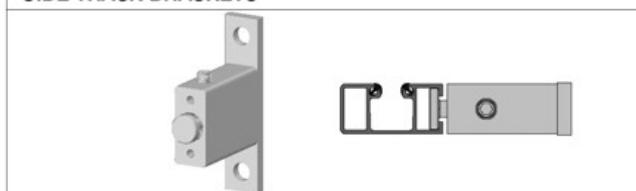
SIDE GUIDING PROFILE



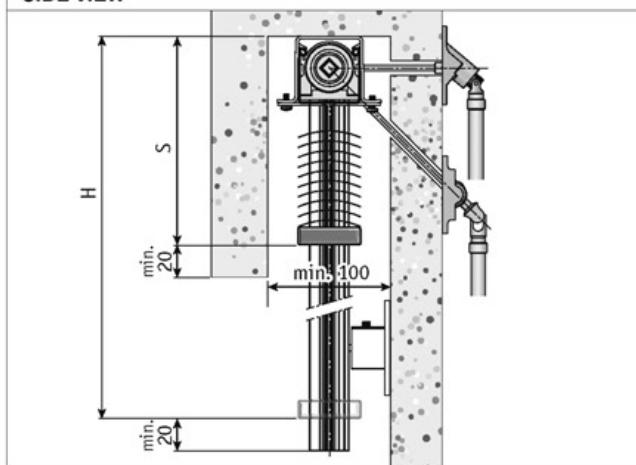
INTERMEDIATE GUIDING



SIDE TRACK BRACKETS



SIDE VIEW



SIZE LIMITATIONS

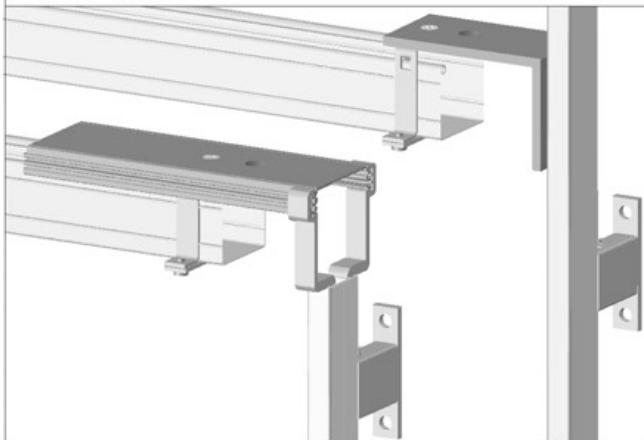
| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|-----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | K 60 ASK | 50 | 500 | 400 | 12 |
| | K 60 ASKF | 50 | 300 | 400 | 12 |
| Group | K 60 ASK | | 1000 | 400 | 12 |
| | K 60 ASKF | | 1000 | 400 | 12 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

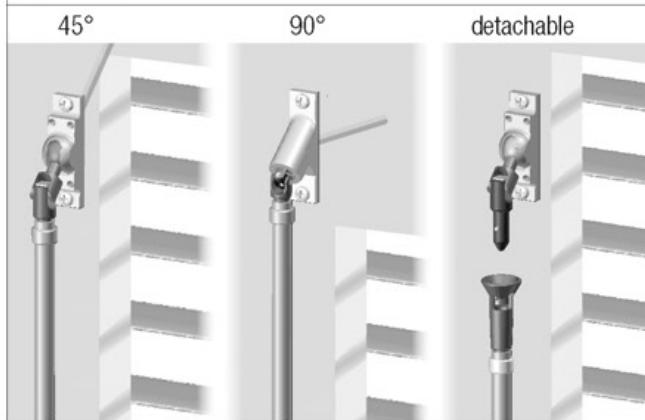
| Blind height H | Stacking height S 60ASK | Stacking height S 60ASKF | Blind height H | Stacking height S 60ASK | Stacking height S 60ASKF |
|-------------------|-------------------------------|--------------------------------|-------------------|-------------------------------|--------------------------------|
| 1000 | 173 | 132 | 3000 | 330 | 215 |
| 1500 | 212 | 154 | 3500 | 370 | 232 |
| 2000 | 250 | 175 | 4000 | 410 | 246 |
| 2500 | 287 | 195 | | | |

OPTIONS K60ASK, K60ASKF

FREE HANGING

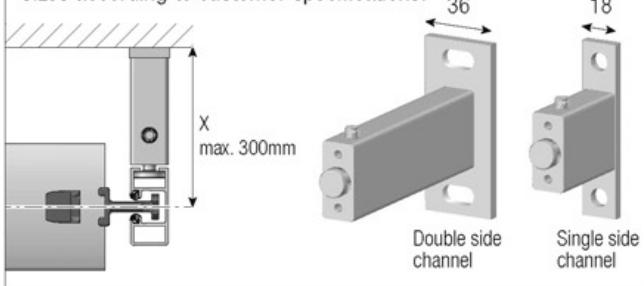


CRANK WAND

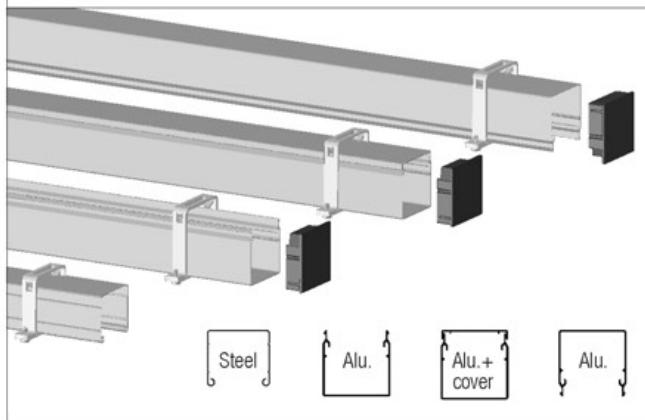


SIDE TRACK BRACKETS

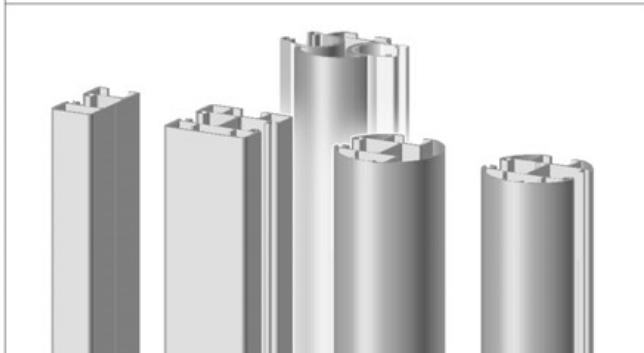
Sizes according to customer specifications.



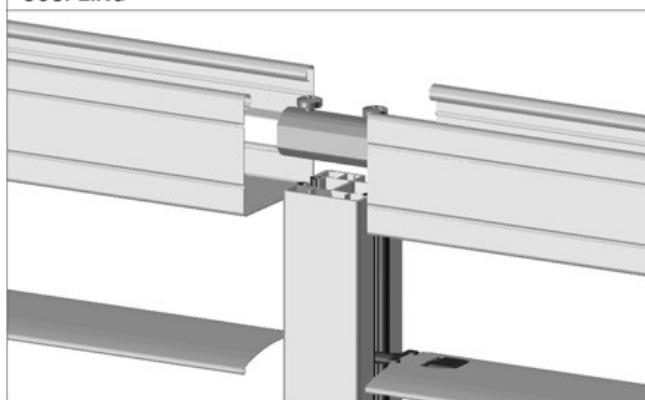
HEAD RAIL



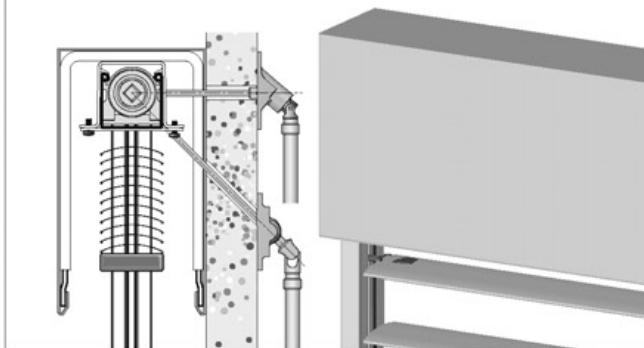
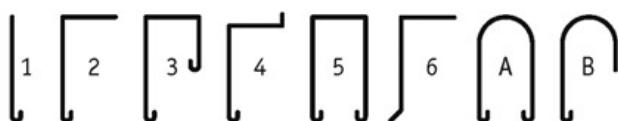
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS

(Additional information on page 73)

- Dual Light Control
- Spindle stop
- Perforated slats
- Additional guiding cable(s)

EVB EL80A, EL80AF

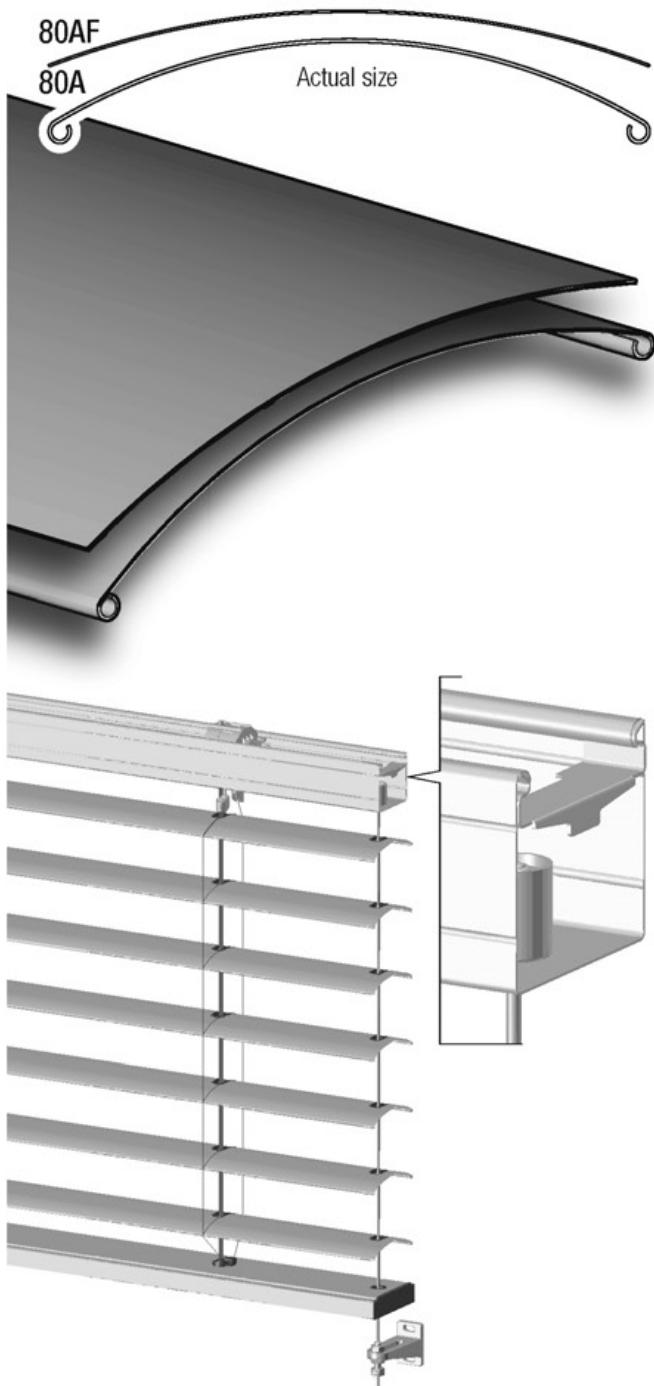
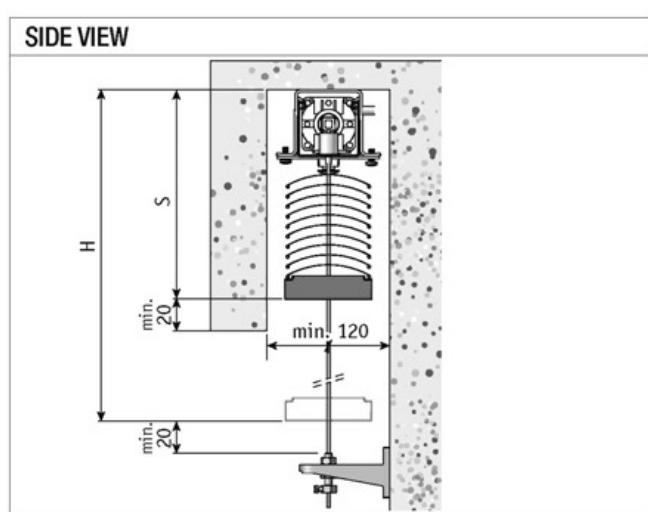
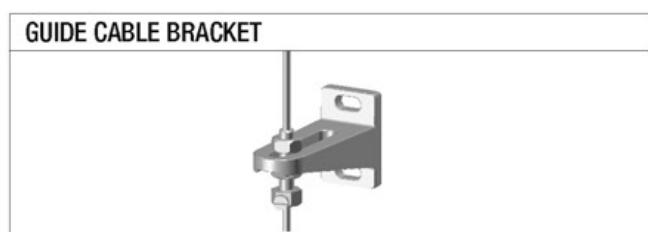
MOTOR OPERATED EXTERNAL VENETIAN BLIND
80 MM SLATS WITH SIDE GUIDING CABLES

EL80A : beaded 80 mm slats

EL80AF : flexible 80 mm slats

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Tensioned stainless steel cable ø 3 mm with transparent Nylon jacket
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



| | | width min. (cm) | width max. (cm) | height max. (cm) | surface max. (m ²) |
|--------|----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 80 A | 51 | 500 | 450 | 16 |
| | EL 80 AF | 51 | 500 | 400 | 16 |
| Group | EL 80 A | | 1000 | 450 | 20 |
| | EL 80 AF | | 1000 | 400 | 20 |

| STACKING HEIGHT (MM) (intermediate blind heights on page 77) | | | | | | | | |
|--|-----------------------|-----------------------|------------------------|--------------|-----------------------|------------------------|-----|-----|
| Blind height | Stacking height S 80A | | Stacking height S 80AF | | | | | |
| | Blind height | Stacking height S 80A | Stacking height S 80AF | Blind height | Stacking height S 80A | Stacking height S 80AF | | |
| 1000 | 173 | 133 | 2500 | 263 | 185 | 4000 | 354 | 222 |
| 1500 | 202 | 155 | 3000 | 294 | 197 | 4500 | 387 | X |
| 2000 | 234 | 172 | 3500 | 324 | 210 | | | |

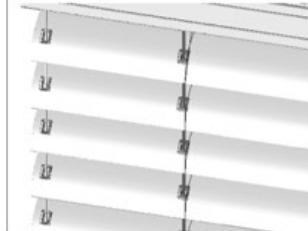
OPTIONS EL80A, EL80AF

INSERT

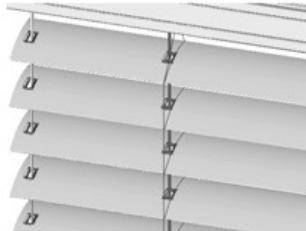


40° TIMER

Standard;
lowering with closed slats



40° Timer;
lowering with slats 40° open



GUIDE CABLE BRACKETS

3 sizes (X, mm);

27 - 73

67 - 133

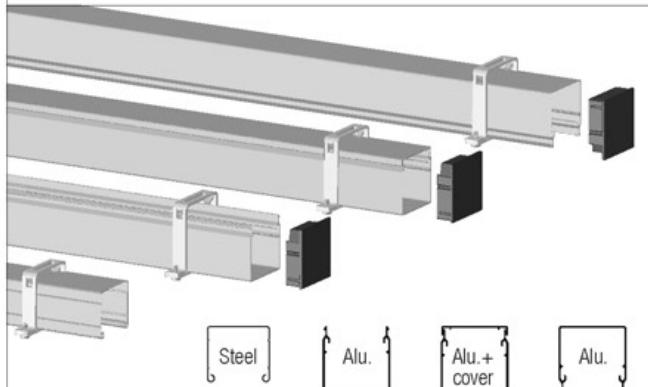
124 - 173



GUIDE CABLE BRACKETS, IDEFIX

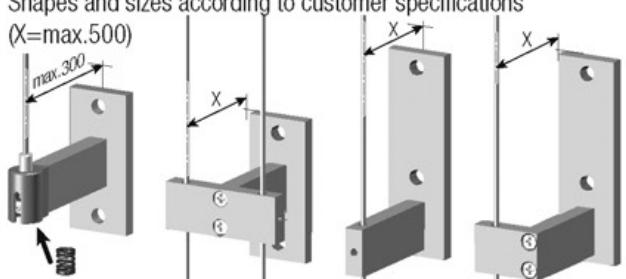


HEAD RAIL



HEAVY DUTY CABLE BRACKETS

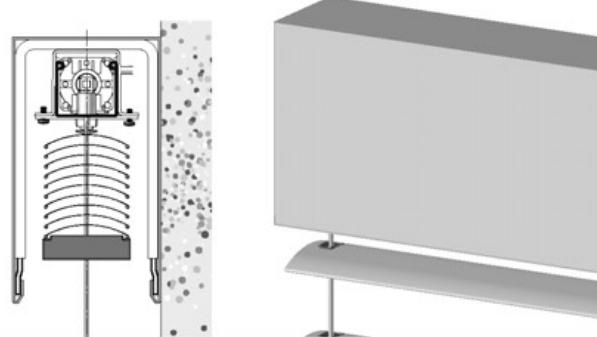
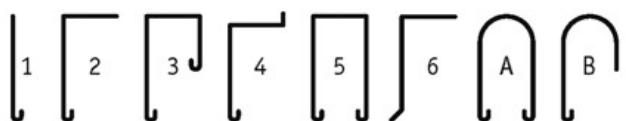
Shapes and sizes according to customer specifications
(X=max.500)



COUPLING



PELMET



FURTHER OPTIONS (Additional information on page 73)

- Quick raise system for emergency situations (EL80AN, EL80AFN)
- Dual Light Control
- Slow motion motor for more precise slat tilting
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

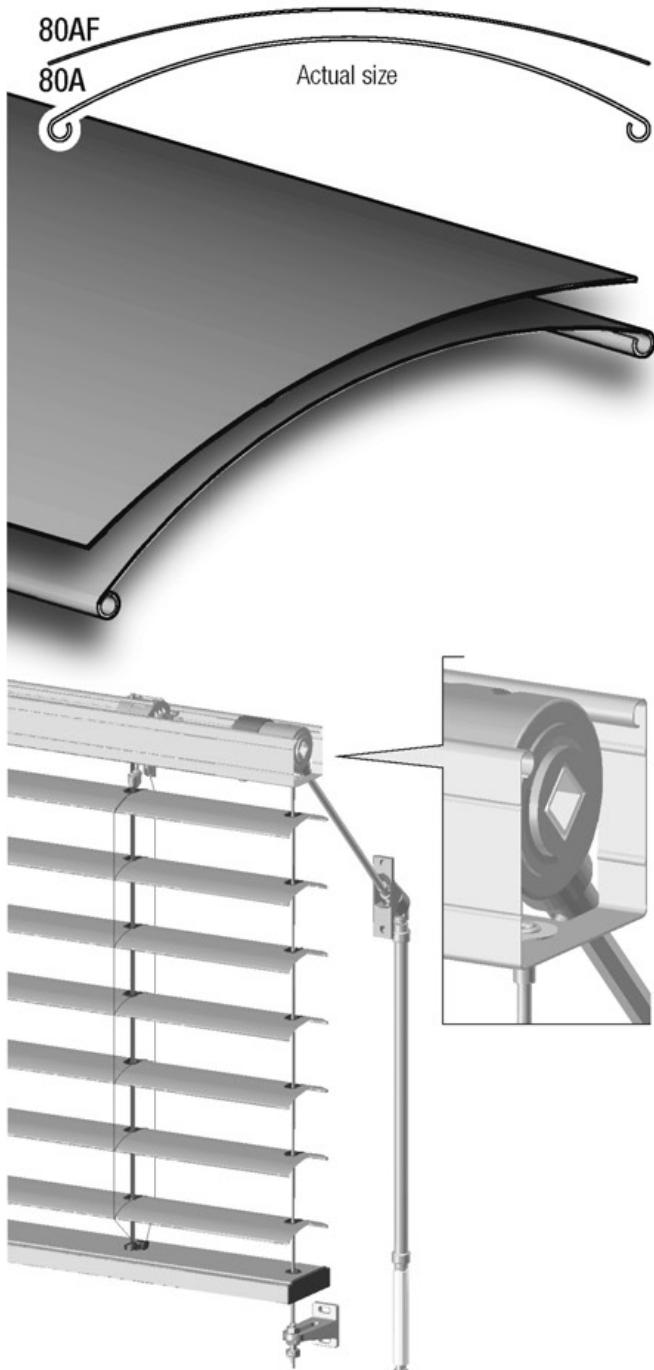
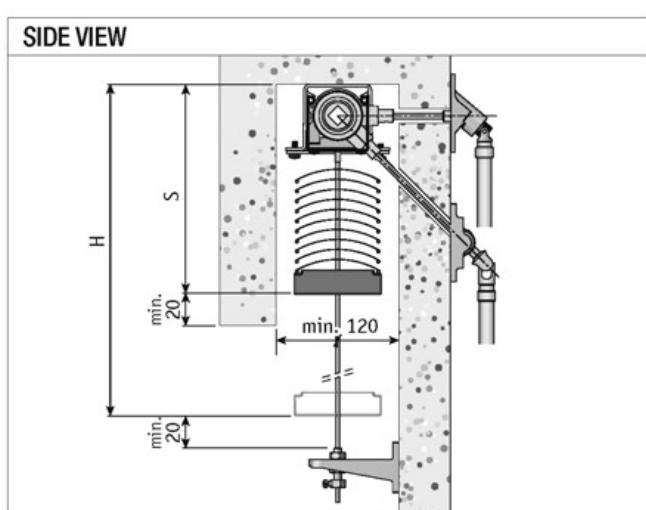
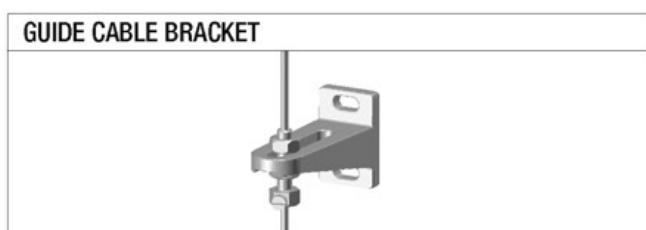
EVB K80A, K80AF

CRANK OPERATED EXTERNAL VENETIAN BLIND
80 MM SLATS WITH SIDE GUIDING CABLES

K80A : beaded 80 mm slats
K80AF : flexible 80 mm slats

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Tensioned stainless steel cable Ø 3 mm with transparent Nylon jacket
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



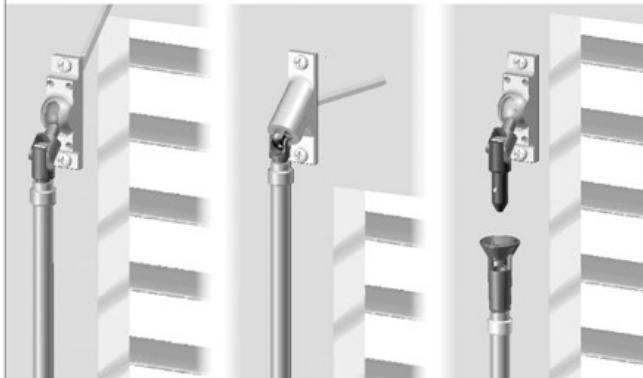
| | | width min. (cm) | width max. (cm) | height max. (cm) | surface max. (m ²) |
|--------|---------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | K 80 A | 45 | 500 | 450 | 12 |
| | K 80 AF | 45 | 500 | 400 | 12 |
| Group | K 80 A | | 1000 | 450 | 12 |
| | K 80 AF | | 1000 | 400 | 12 |

| STACKING HEIGHT (MM) (intermediate blind heights on page 77) | | | | | |
|--|------------------------|-------------------------|--------------|------------------------|-------------------------|
| Blind height | Stacking height 80A | Stacking height 80AF | Blind height | Stacking height 80A | Stacking height 80AF |
| | | | Blind height | Stacking height 80A | Stacking height 80AF |
| 1000 | 163 | 123 | 2500 | 253 | 175 |
| 1500 | 192 | 145 | 3000 | 284 | 187 |
| 2000 | 224 | 162 | 3500 | 314 | 200 |
| | | | 4000 | 344 | 212 |
| | | | 4500 | 377 | X |

OPTIONS K80A, K80AF

CRANK WAND

45° 90° detachable

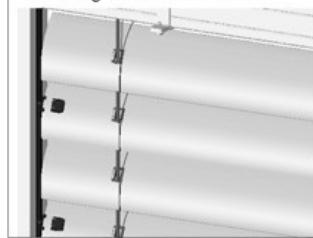


INSERT

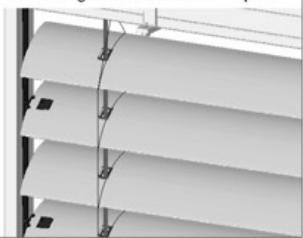


40° TIMER

Standard; lowering with closed slats



40° Timer; lowering with slats 40° open



GUIDE CABLE BRACKETS

3 sizes (X, mm);

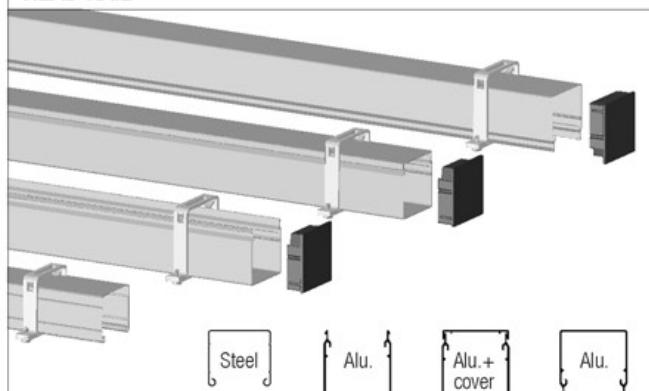
| | |
|-----|-----|
| 27 | 73 |
| 67 | 133 |
| 124 | 173 |



GUIDE CABLE BRACKETS, IDEFIX

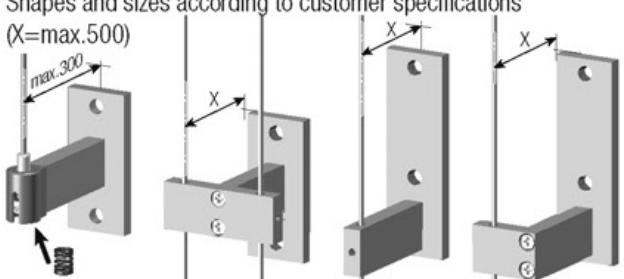


HEAD RAIL



HEAVY DUTY CABLE BRACKETS

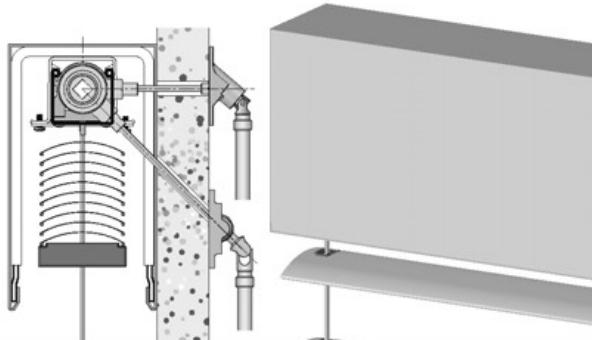
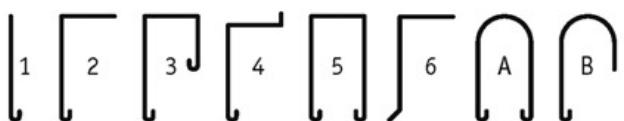
Shapes and sizes according to customer specifications
(X=max.500)



COUPLING



PELMET



FURTHER OPTIONS (Additional information on page 73)

- Spindle stop
- Dual Light Control
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Additional guiding cable(s)

EVB EL80AS, EL80ASF

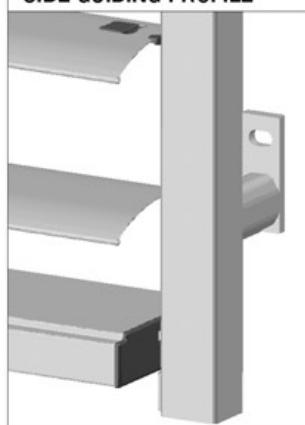
MOTOR OPERATED EXTERNAL VENETIAN BLIND
80 MM SLATS WITH STANDARD SIDE GUIDING CHANNELS

EL80AS : beaded 80 mm slats
EL80ASF : flexible 80 mm slats

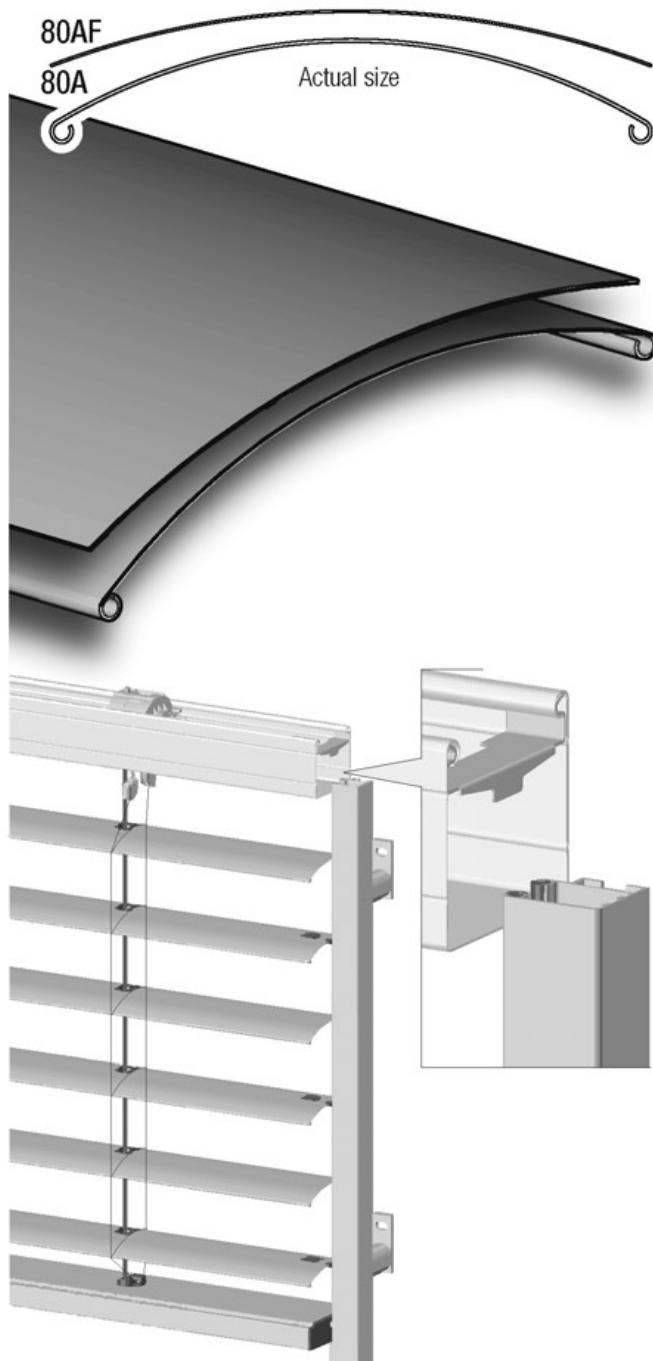
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Extruded side guiding channels 27 x 24 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

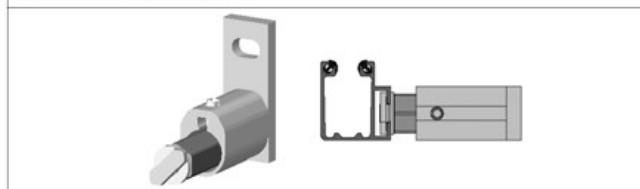
SIDE GUIDING PROFILE



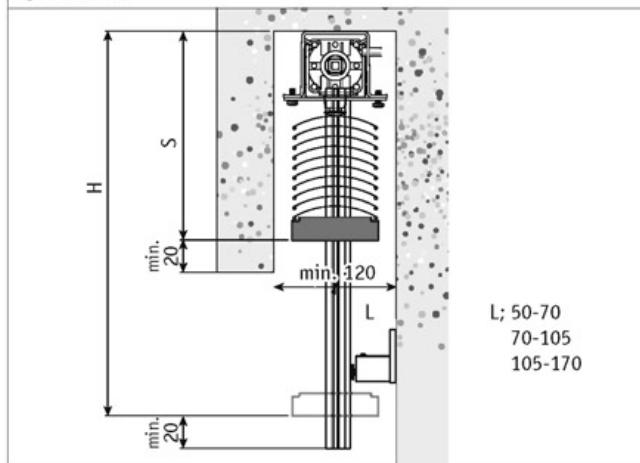
INTERMEDIATE GUIDING



SIDE TRACK BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | | width min. (cm) | width max. (cm) | height max. (cm) | surface max. (m ²) |
|--------|-----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 80 AS | 58 | 500 | 400 | 16 |
| | EL 80 ASF | 58 | 300 | 400 | 12 |
| Group | EL 80 AS | | 1000 | 400 | 20 |
| | EL 80 ASF | | 1000 | 400 | 20 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height | Stacking height 80AS | | Stacking height 80ASF | | | Stacking height 80AS | | | Stacking height 80ASF | | | |
|--------------|----------------------|----------------------|-----------------------|--------------|----------------------|-----------------------|--------------|----------------------|-----------------------|--------------|----------------------|-----------------------|
| | Blind height | Stacking height 80AS | Stacking height 80ASF | Blind height | Stacking height 80AS | Stacking height 80ASF | Blind height | Stacking height 80AS | Stacking height 80ASF | Blind height | Stacking height 80AS | Stacking height 80ASF |
| 1000 | 173 | 133 | | 2500 | 263 | 185 | 4000 | 354 | 222 | | | |
| 1500 | 202 | 155 | | 3000 | 294 | 197 | 4500 | 387 | X | | | |
| 2000 | 234 | 172 | | 3500 | 324 | 210 | | | | | | |

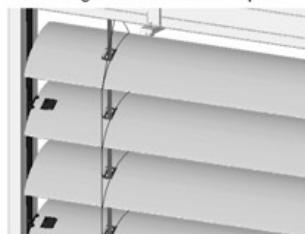
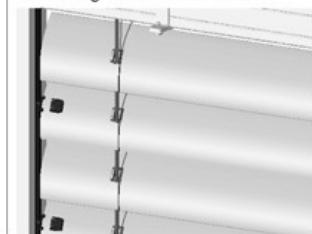
OPTIONS EL80AS, EL80ASF



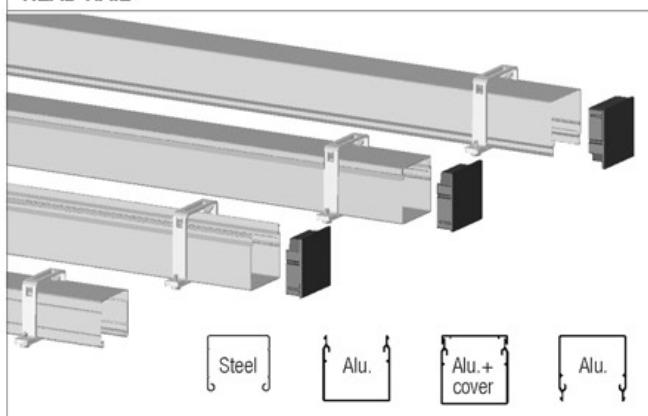
40° TIMER

Standard;
lowering with closed slats

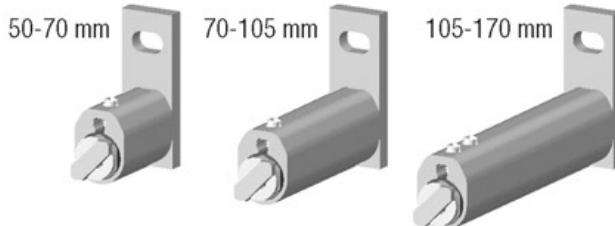
40° Timer;
lowering with slats 40° open



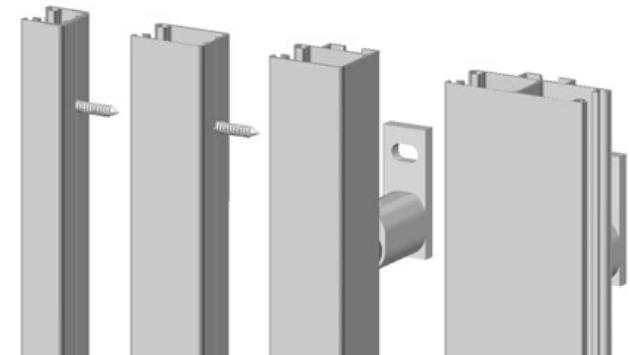
HEAD RAIL



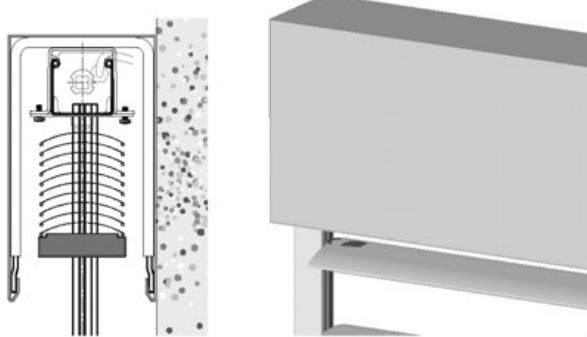
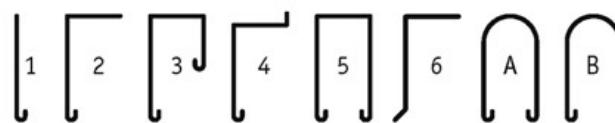
SIDE TRACK BRACKETS



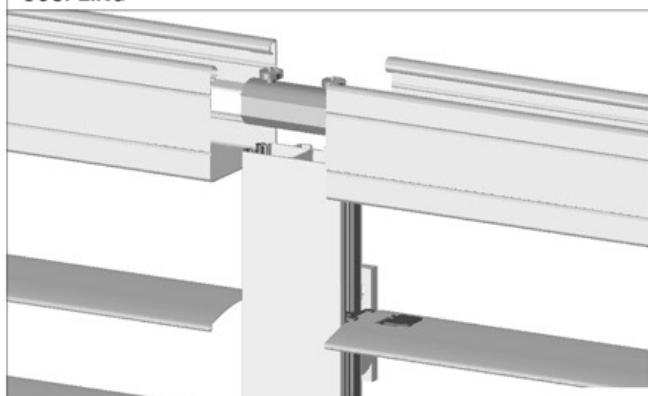
SIDE TRACKS



PELMET



COUPLING



FURTHER OPTIONS

(Additional information on page 73)

- Quick raise system for emergency situations (EL80ASN)
- Dual Light Control
- Slow motion motor for more precise slat tilting
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation
- Lockable bottomrail, to use in case of an emergency

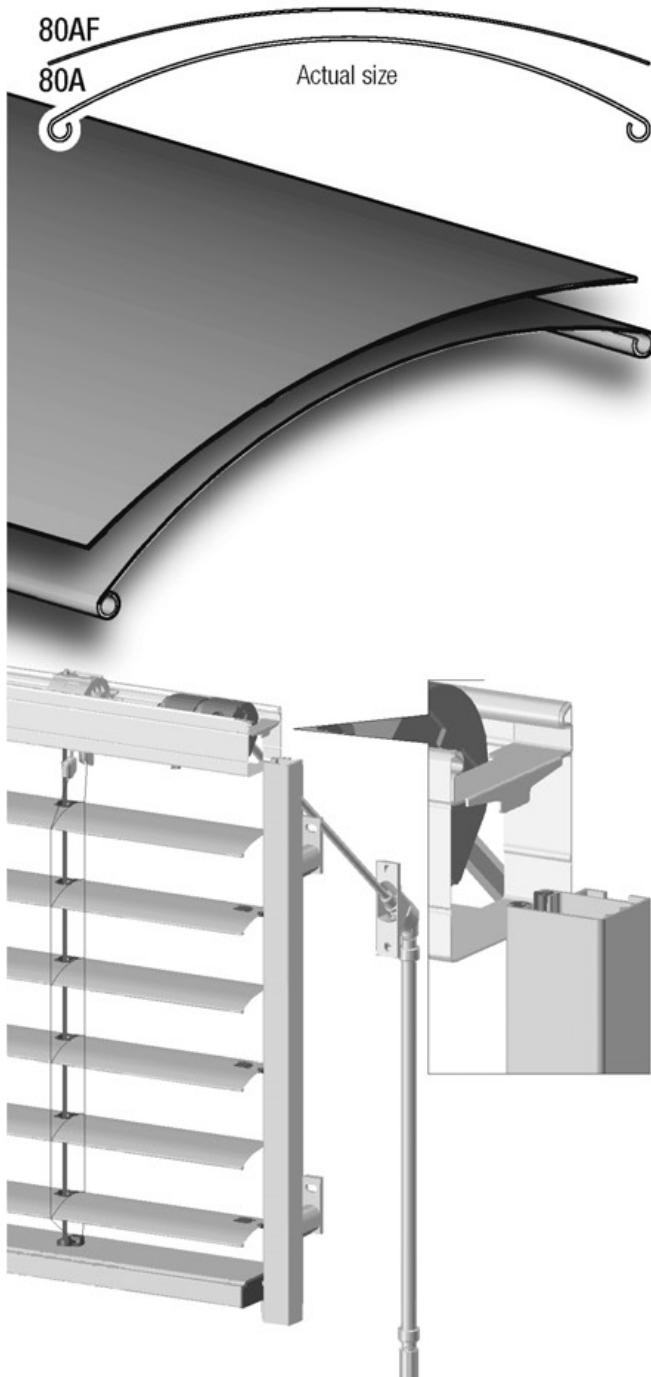
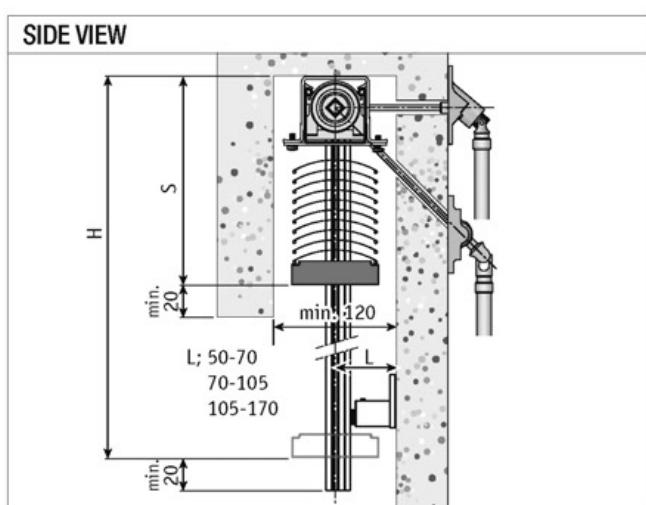
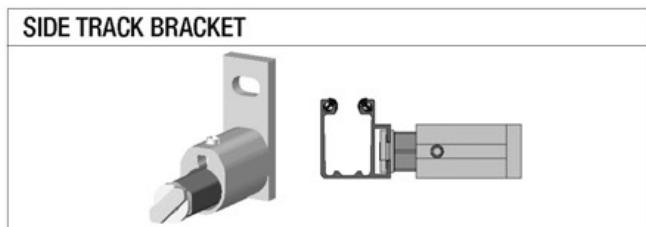
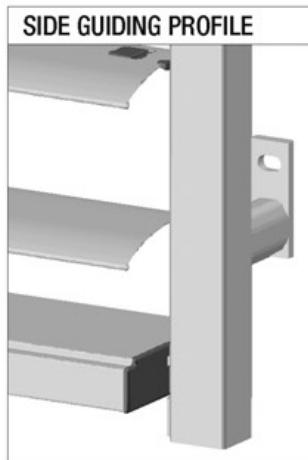
EVB K80AS, K80ASF

CRANK OPERATED EXTERNAL VENETIAN BLIND
80 MM SLATS WITH STANDARD SIDE GUIDING CHANNELS

K80AS : beaded 80 mm slats
K80ASF : flexible 80 mm slats

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Extruded side guiding channels 27 x 24 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



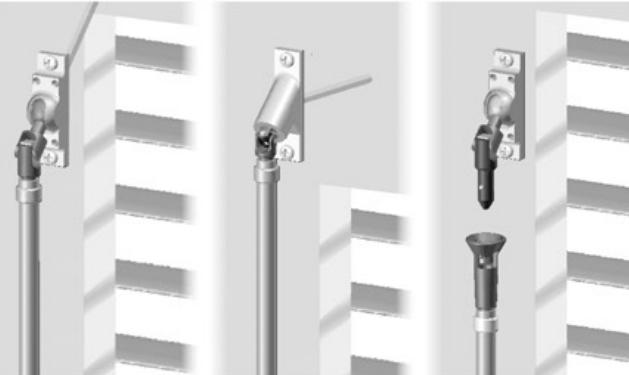
| | | width min. (cm) | width max. (cm) | height max. (cm) | surface max. (m ²) |
|--------|----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | K 80 AS | 52 | 500 | 400 | 12 |
| | K 80 ASF | 52 | 300 | 400 | 12 |
| Group | K 80 AS | | 1000 | 400 | 12 |
| | K 80 ASF | | 1000 | 400 | 12 |

| STACKING HEIGHT (MM) (intermediate blind heights on page 77) | | | | | |
|--|------------------------|-------------------------|--------------|------------------------|-------------------------|
| Blind height | Stacking height 80A | Stacking height 80AF | Blind height | Stacking height 80A | Stacking height 80AF |
| | | | Blind height | Stacking height 80A | Stacking height 80AF |
| 1000 | 163 | 123 | 2500 | 253 | 175 |
| 1500 | 192 | 145 | 3000 | 284 | 187 |
| 2000 | 224 | 162 | 3500 | 314 | 200 |
| | | | 4000 | 344 | 212 |
| | | | 4500 | 377 | X |

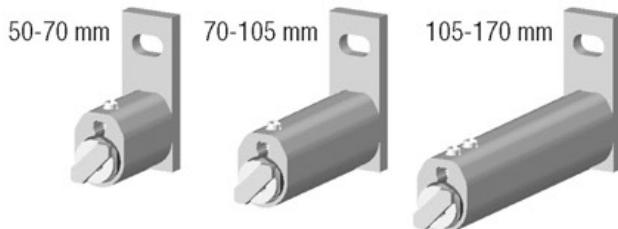
OPTIONS K80AS, K80ASF

CRANK WAND

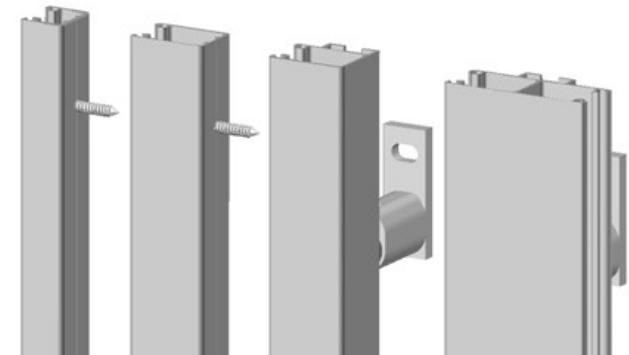
45° 90° detachable



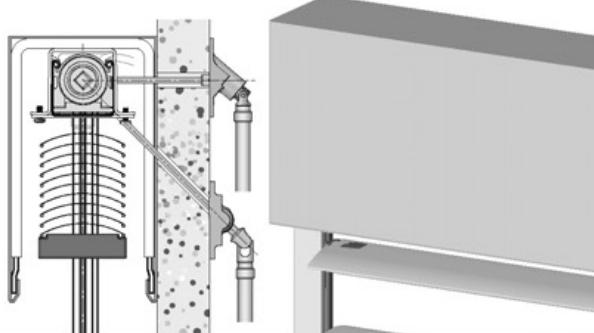
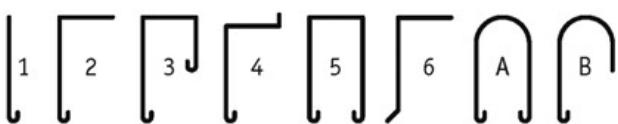
SIDE TRACK BRACKETS



SIDE TRACKS



PELMET



INSERT

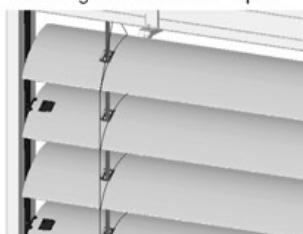


40° TIMER

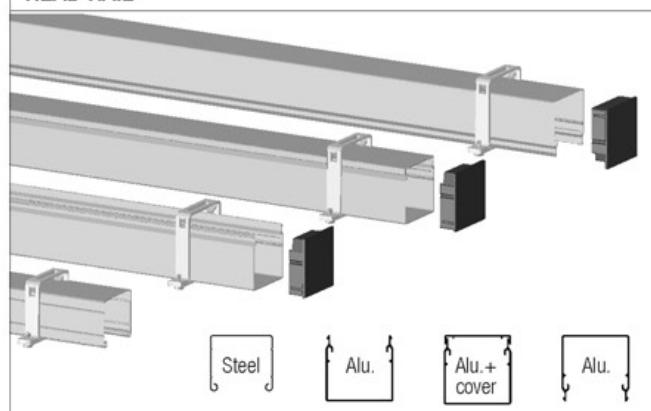
Standard;
lowering with closed slats



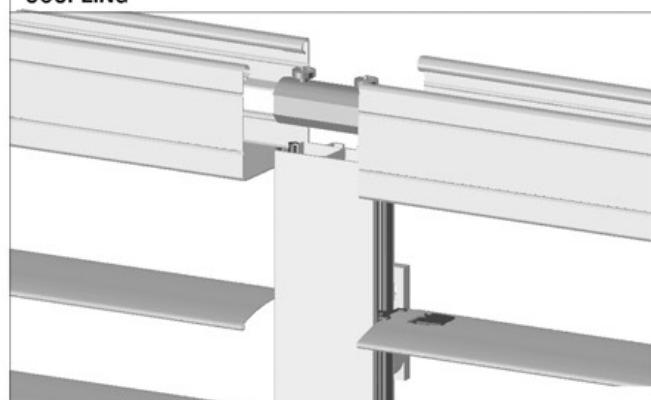
40° Timer;
lowering with slats 40° open



HEAD RAIL



COUPLING



FURTHER OPTIONS

(Additional information on page 73)

- Spindle stop
- Dual Light Control
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Additional guiding cable(s)
- Lockable bottomrail, to use in case of an emergency

EVB EL80ASC, EL80ASCF

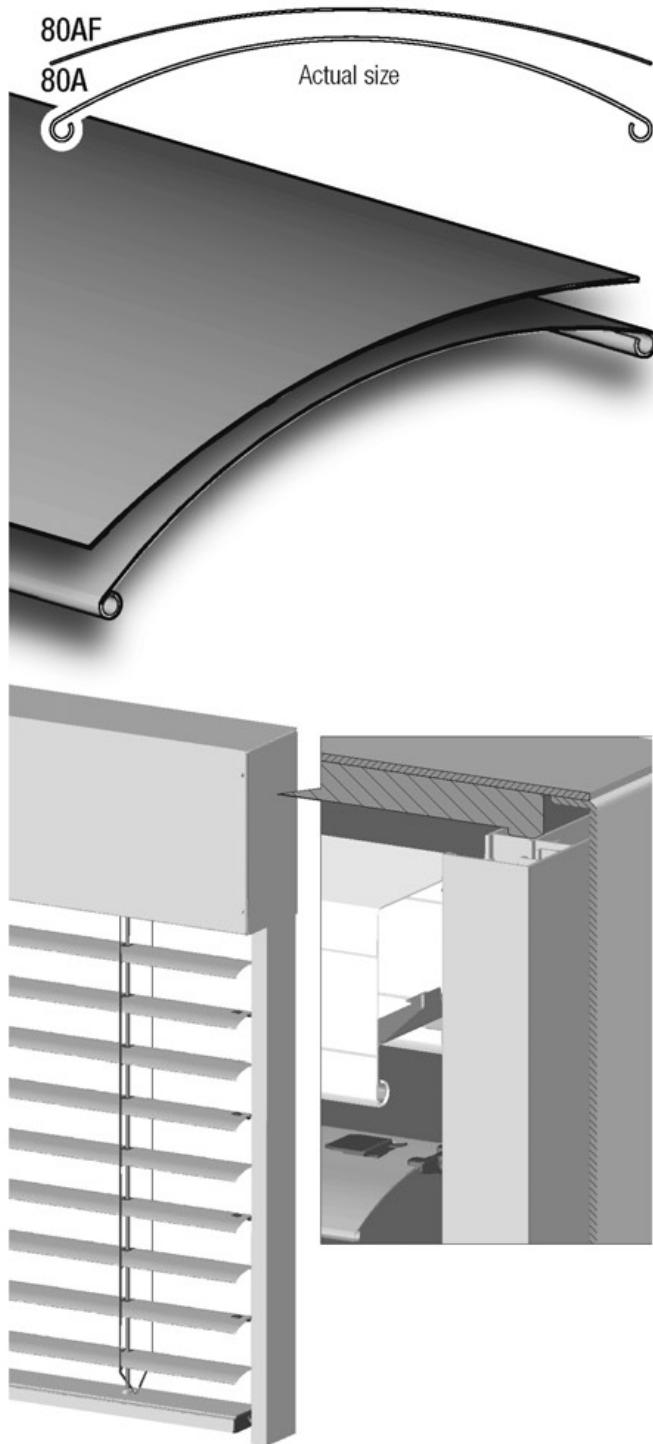
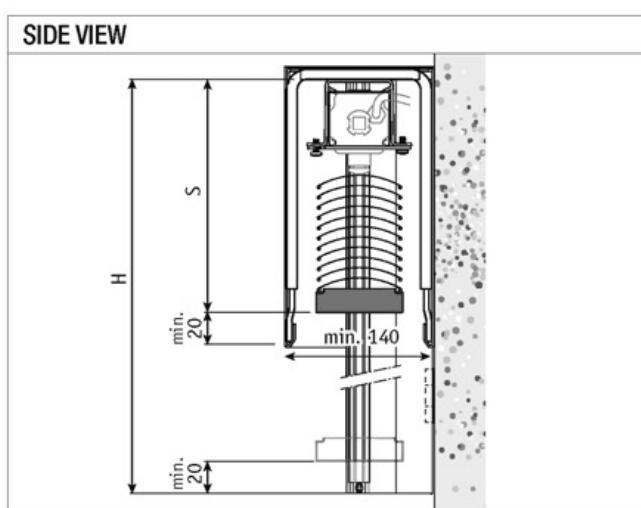
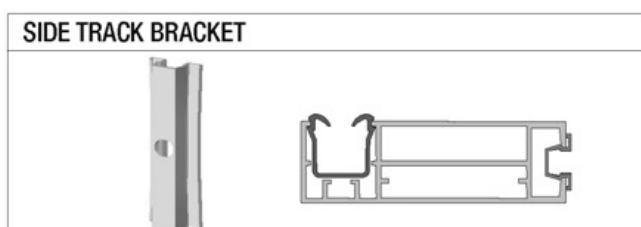
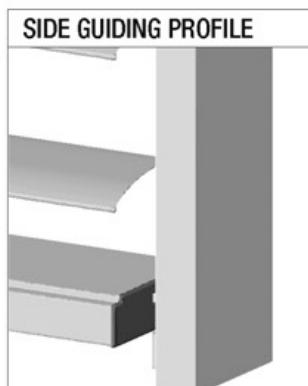
MOTOR OPERATED EXTERNAL VENETIAN BLIND "CLICK"
80 MM SLATS WITH CLIP-ON SIDE GUIDING CHANNELS

EL80ASC : beaded 80 mm slats

EL80ASCF : flexible 80 mm slats

Description

- Easy to mount "CLICK" blind pre-installed in customised natural anodised or powder coated aluminium pelmet
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Extruded side guiding channels 81 x 25 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



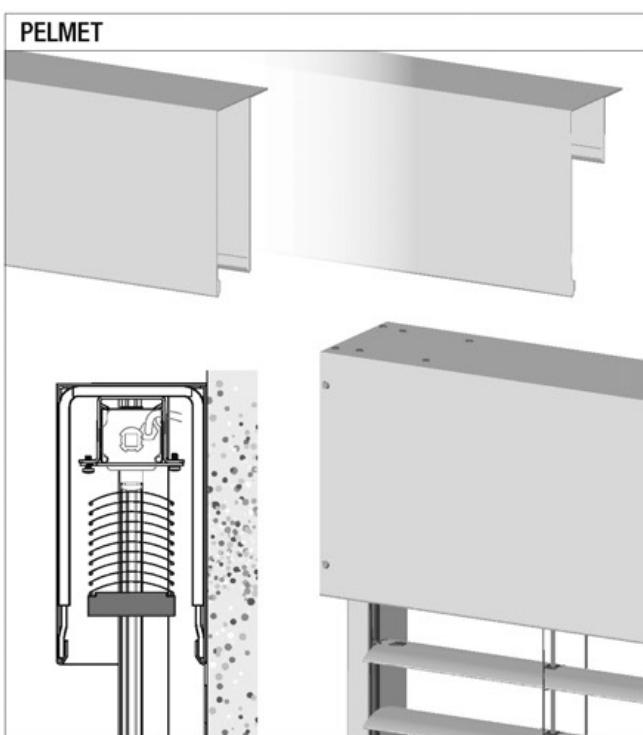
SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|------------|--------------------|--------------------|---------------------|-----------------------------------|
| EL 80 ASC | 78 | 350 | 400 | 12 |
| EL 80 ASCF | 78 | 350 | 400 | 12 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height | Stacking height 80A | | Stacking height 80AF | | | Stacking height 80A | | | Stacking height 80AF | | | |
|--------------|---------------------|---------------------|----------------------|--------------|---------------------|----------------------|--------------|---------------------|----------------------|--------------|---------------------|----------------------|
| | Blind height | Stacking height 80A | Stacking height 80AF | Blind height | Stacking height 80A | Stacking height 80AF | Blind height | Stacking height 80A | Stacking height 80AF | Blind height | Stacking height 80A | Stacking height 80AF |
| 1000 | 183 | 143 | | 2500 | 273 | 195 | | | | 4000 | 364 | 232 |
| 1500 | 212 | 165 | | 3000 | 304 | 207 | | | | | | |
| 2000 | 244 | 182 | | 3500 | 334 | 220 | | | | | | |

OPTIONS EL80ASC, EL80ASCF

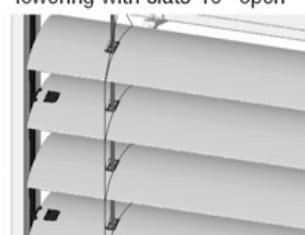


40° TIMER

Standard;
lowering with closed slats



40° Timer;
lowering with slats 40° open



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

EVB EL80ASS, EL80ASSF

MOTOR OPERATED EXTERNAL VENETIAN BLIND
80 MM SLATS WITH PUSH-ON SIDE GUIDING CHANNELS

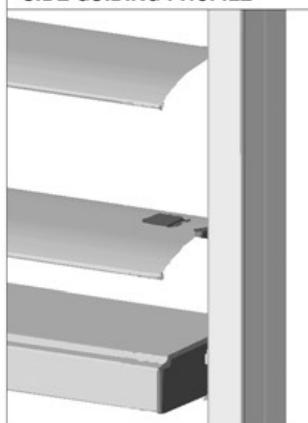
EL80ASS : beaded 80 mm slats

EL80ASSF : flexible 80 mm slats

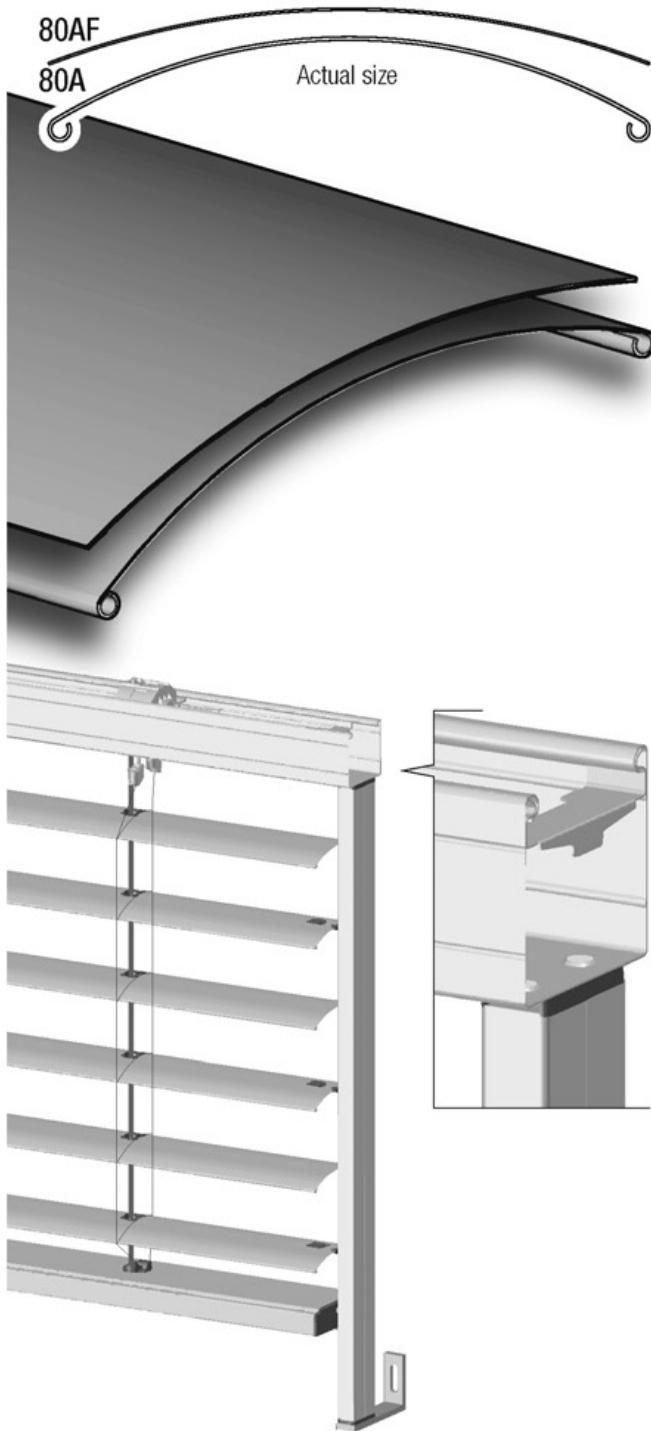
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

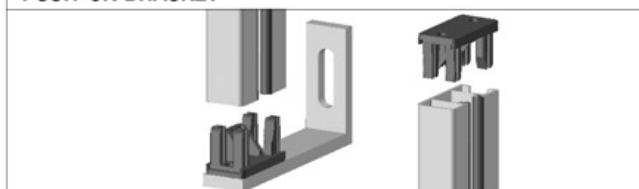
SIDE GUIDING PROFILE



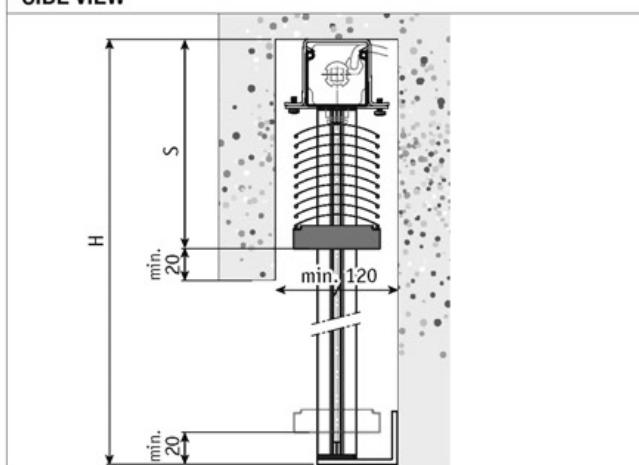
INTERMEDIATE GUIDING



PUSH-ON BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 80 ASS | 56 | 300 | 250 | 7 |
| | EL 80 ASSF | 56 | 300 | 250 | 7 |
| Group | EL 80 ASS | | 1000 | 250 | 20 |
| | EL 80 ASSF | | 1000 | 250 | 20 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height | Stacking height 80ASS | Stacking height 80ASSF | Blind height | Stacking height 80ASS | Stacking height 80ASSF |
|--------------|-----------------------|------------------------|--------------|-----------------------|------------------------|
| 1000 | 173 | 133 | 2000 | 234 | 172 |
| 1500 | 202 | 155 | 2500 | 263 | 185 |

OPTIONS EL80ASS, EL80ASSF

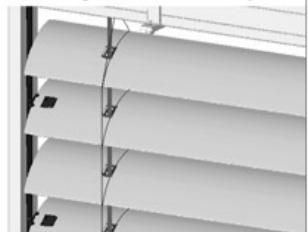
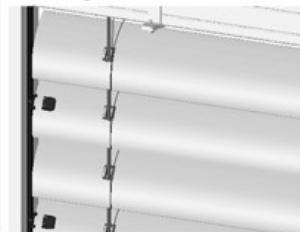
INSERT



40° TIMER

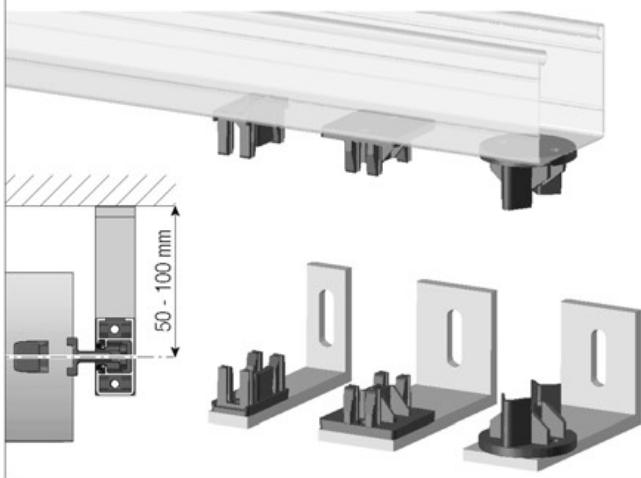
Standard;
lowering with closed slats

40° Timer;
lowering with slats 40° open

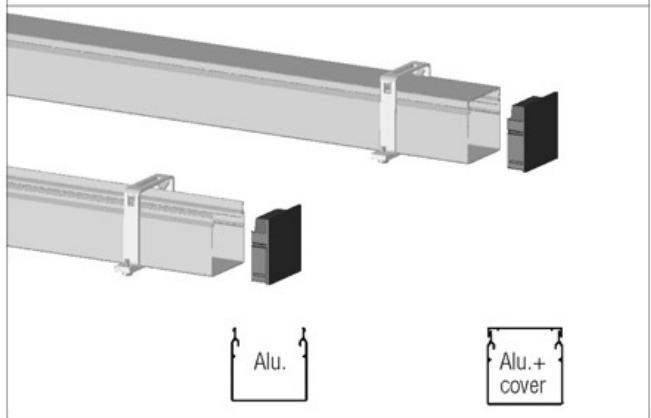


SIDE TRACK BRACKETS

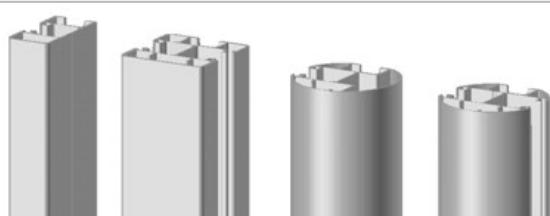
Length according to customer specifications.



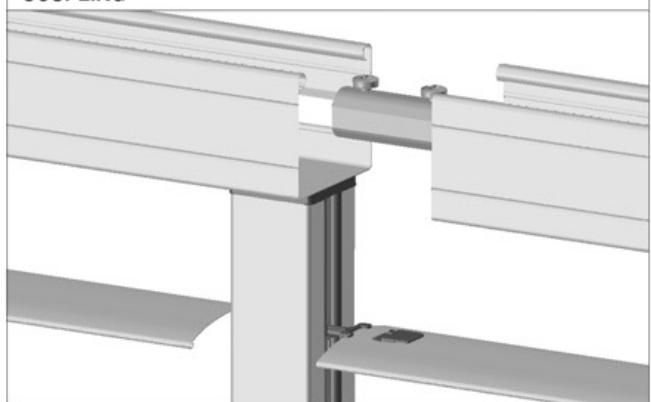
HEAD RAIL



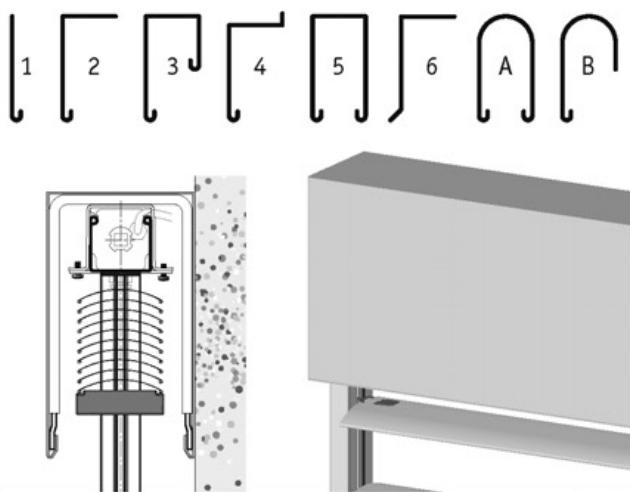
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS

(Additional information on page 73)

- Slow motion motor for more precise slat tilting
- Dual Light Control
- Head rail end caps in milky white
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

EVB K80ASS, K80ASSF

**CRANK OPERATED EXTERNAL VENETIAN BLIND
80 MM SLATS WITH PUSH-ON SIDE GUIDING CHANNELS**

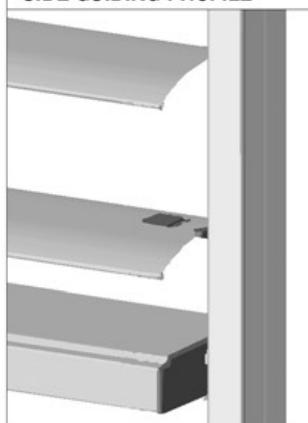
K80ASS : beaded 80 mm slats

K80ASSF: flexible 80 mm slats

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

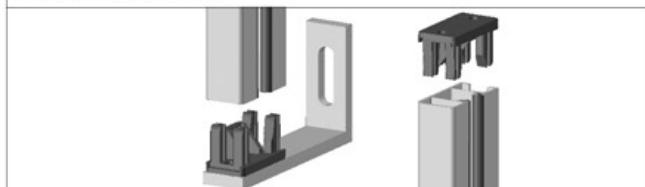
SIDE GUIDING PROFILE



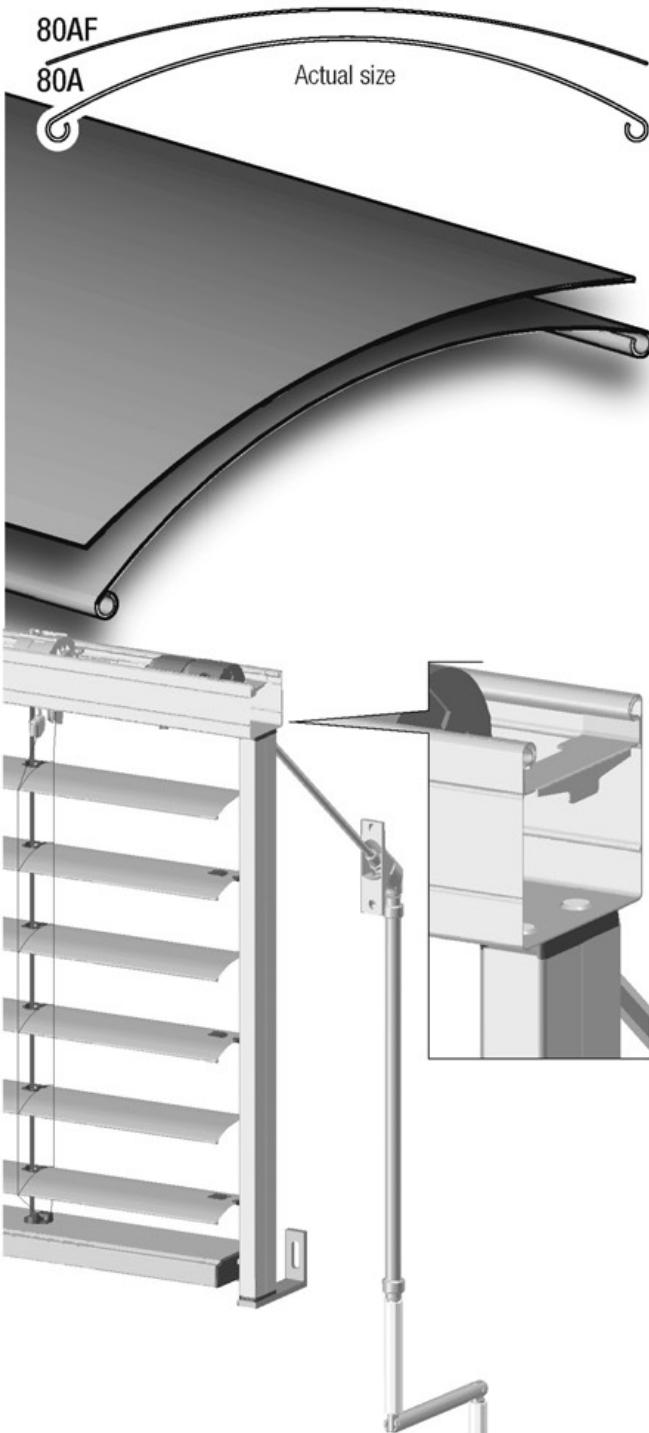
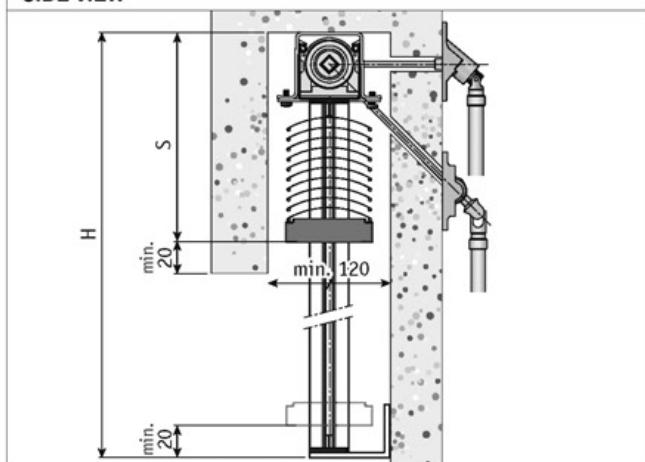
INTERMEDIATE GUIDING



PUSH-ON BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|-----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | K 80 ASS | 50 | 300 | 250 | 7 |
| | K 80 ASSF | 50 | 300 | 250 | 7 |
| Group | K 80 ASS | | 1000 | 250 | 12 |
| | K 80 ASSF | | 1000 | 250 | 12 |

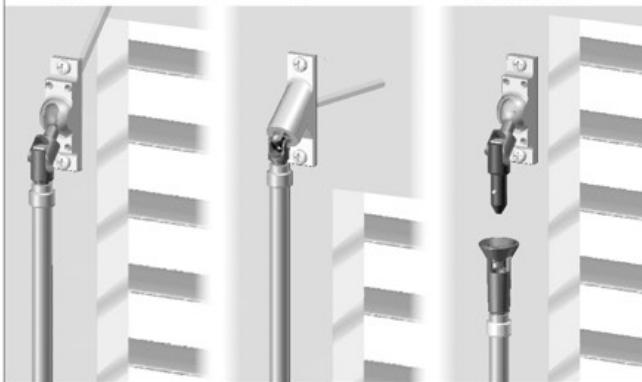
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height | Stacking height 80ASS | Stacking height 80ASSF | Blind height | Stacking height 80ASS | Stacking height 80ASSF |
|--------------|-----------------------|------------------------|--------------|-----------------------|------------------------|
| 1000 | 163 | 123 | 2000 | 224 | 162 |
| 1500 | 192 | 145 | 2500 | 253 | 175 |

OPTIONS K80ASS, K80ASSF

CRANK WAND

45° 90° detachable

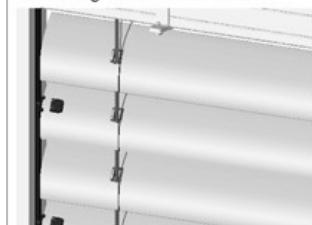


INSERT

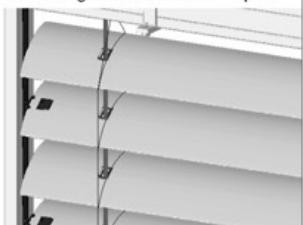


40° TIMER

Standard;
lowering with closed slats

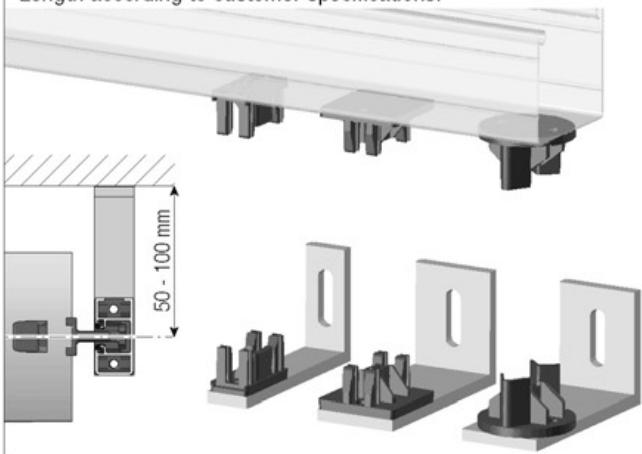


40° Timer;
lowering with slats 40° open

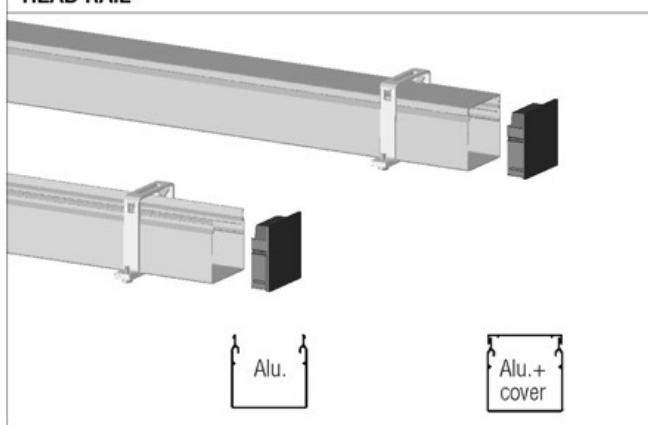


SIDE TRACK BRACKETS

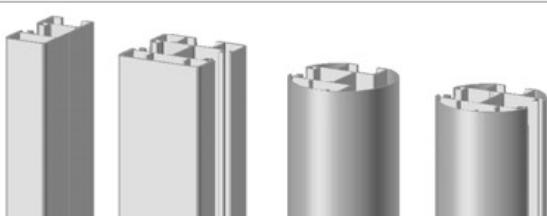
Length according to customer specifications.



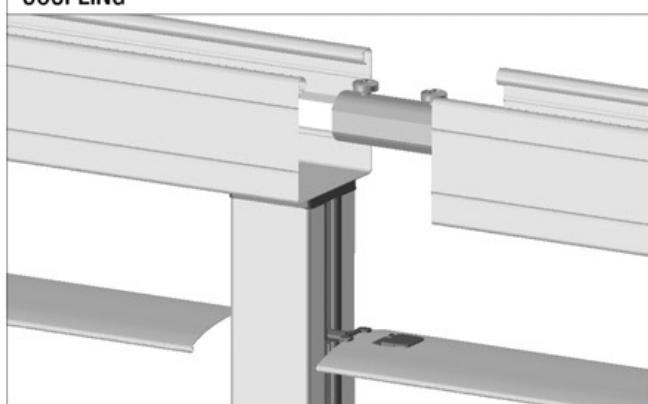
HEAD RAIL



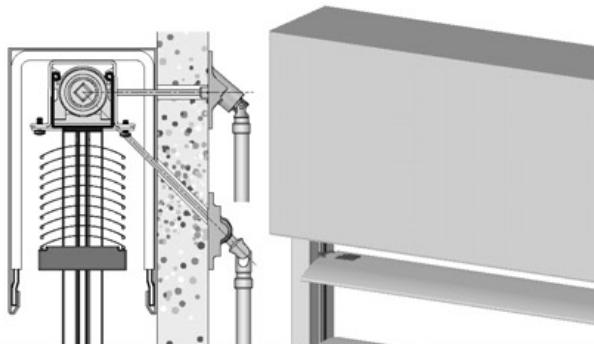
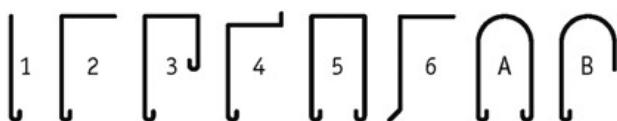
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS (Additional information on page 73)

- Spindle stop
- Dual Light Control
- Head rail end caps in milky white
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Additional guiding cable(s)

EVB EL80ASK, EL80ASKF

MOTOR OPERATED EXTERNAL VENETIAN BLIND

80 MM SLATS WITH CLAMP-ON SIDE GUIDING CHANNELS

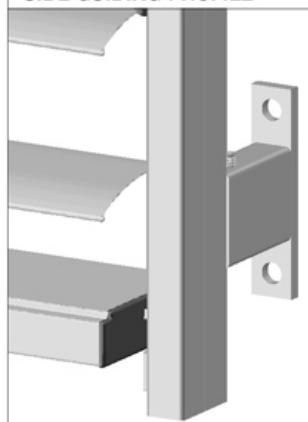
EL80ASK : beaded 80 mm slats

EL80ASKF : flexible 80 mm slats

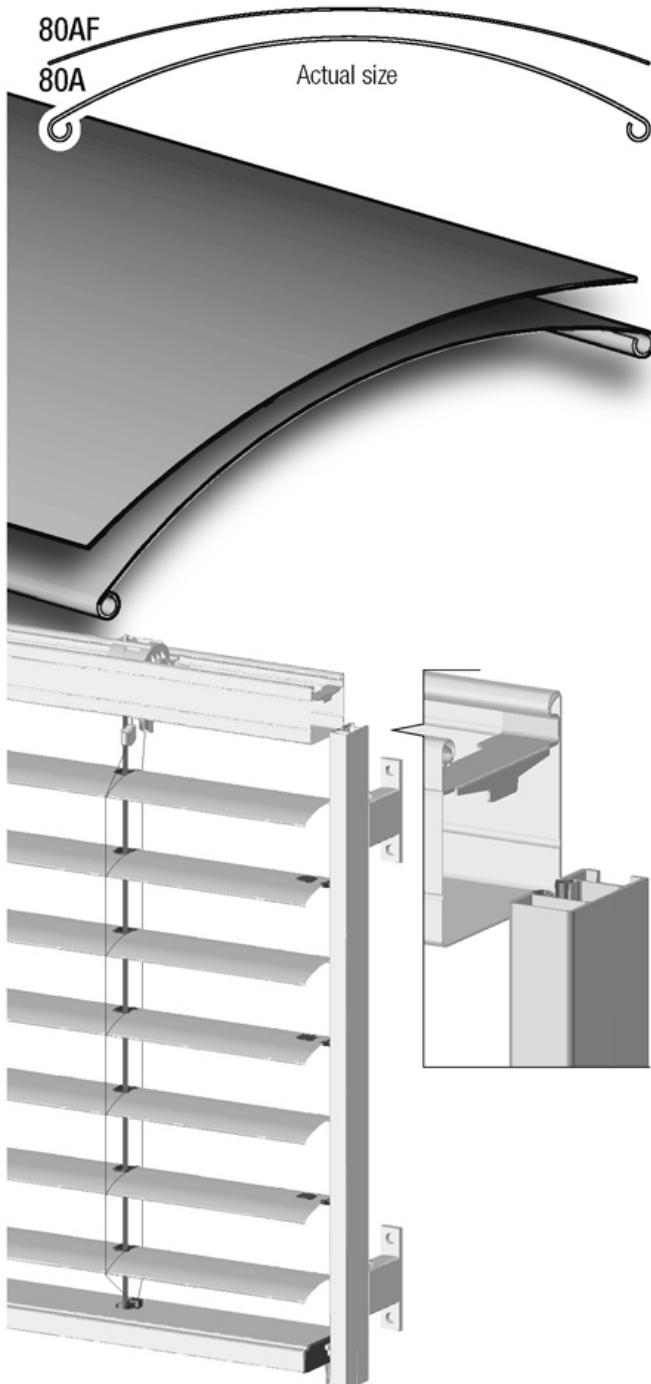
Description

- Installation on or in between side tracks
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

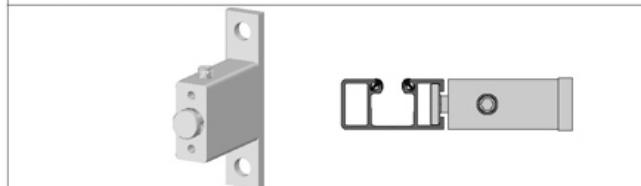
SIDE GUIDING PROFILE



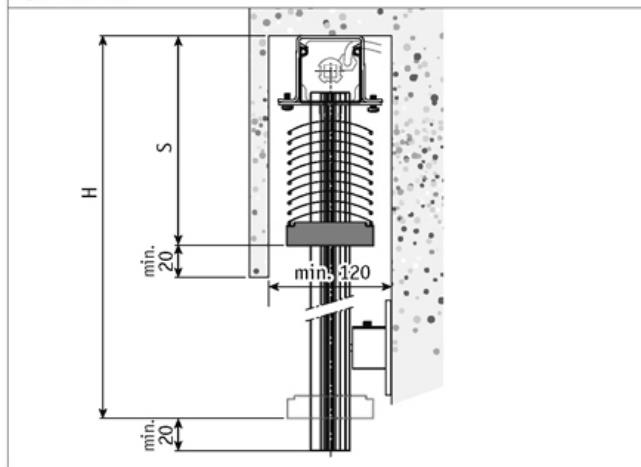
INTERMEDIATE GUIDING



SIDE TRACK BRACKET



SIDE VIEW



SIZE LIMITATIONS

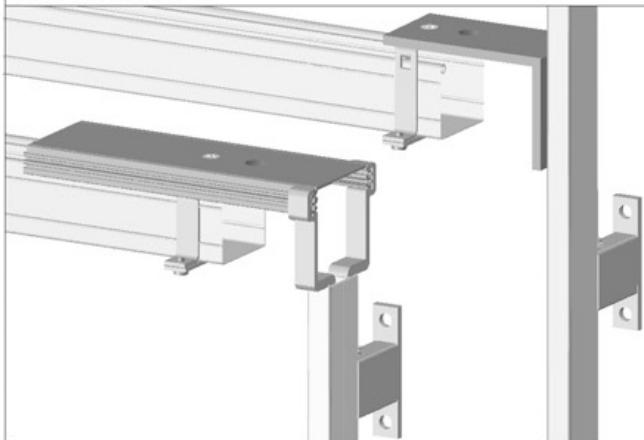
| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 80 ASK | 56 | 500 | 400 | 16 |
| | EL 80 ASKF | 56 | 300 | 400 | 12 |
| Group | EL 80 ASK | | 1000 | 400 | 20 |
| | EL 80 ASKF | | 1000 | 400 | 20 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height | Stacking height 80ASK | | Stacking height 80ASKF | | | Blind height | Stacking height 80ASK | | |
|--------------|-----------------------|------------------------|------------------------|-----------------------|------------------------|--------------|-----------------------|------------------------|--|
| | Stacking height 80ASK | Stacking height 80ASKF | Blind height | Stacking height 80ASK | Stacking height 80ASKF | | Stacking height 80ASK | Stacking height 80ASKF | |
| 1000 | 173 | 133 | 2500 | 173 | 133 | 4000 | 354 | 222 | |
| 1500 | 202 | 155 | 3000 | 202 | 155 | | | | |
| 2000 | 234 | 172 | 3500 | 234 | 172 | | | | |

OPTIONS EL80ASK, EL80ASKF

FREE HANGING



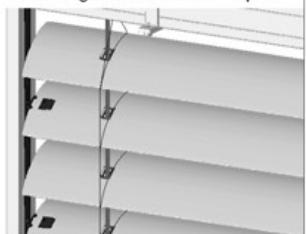
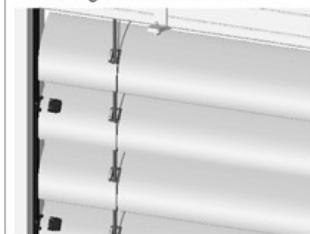
INSERT



40° TIMER

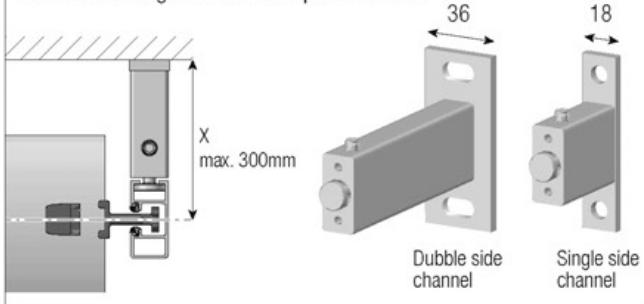
Standard;
lowering with closed slats

40° Timer;
lowering with slats 40° open

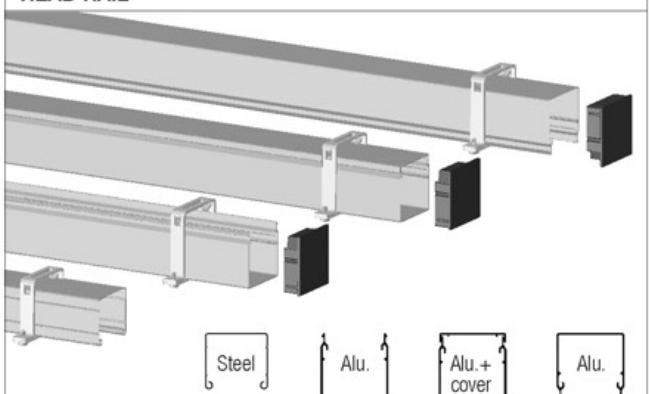


SIDE TRACK BRACKETS

Sizes according to customer specifications.



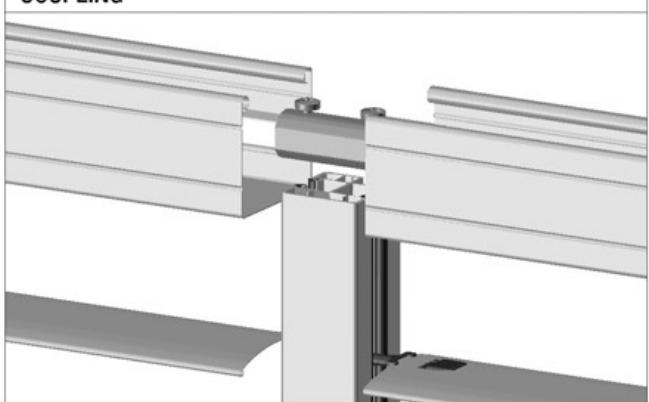
HEAD RAIL



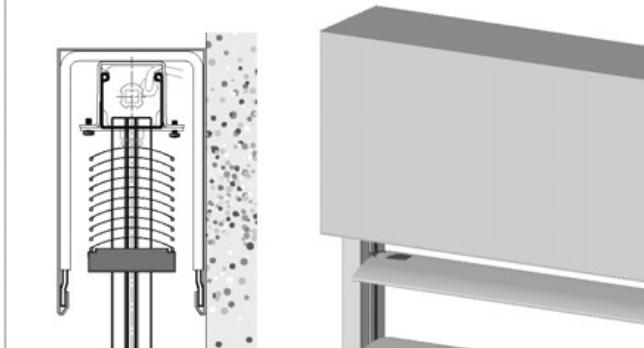
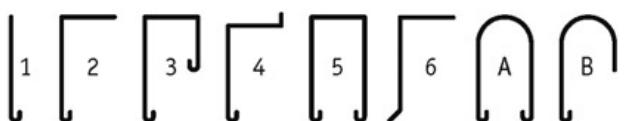
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS

(Additional information on page 73)

- Quick raise system for emergency situations (EL80ASKN)
- Dual Light Control
- Slow motion motor for more precise slat tilting
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

EVB K80ASK, K80ASKF

CRANK OPERATED EXTERNAL VENETIAN BLIND

80 MM SLATS WITH CLAMP-ON SIDE GUIDING CHANNELS

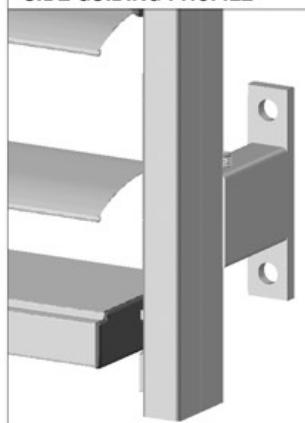
K80ASK : beaded 80 mm slats

K80ASKF : flexible 80 mm slats

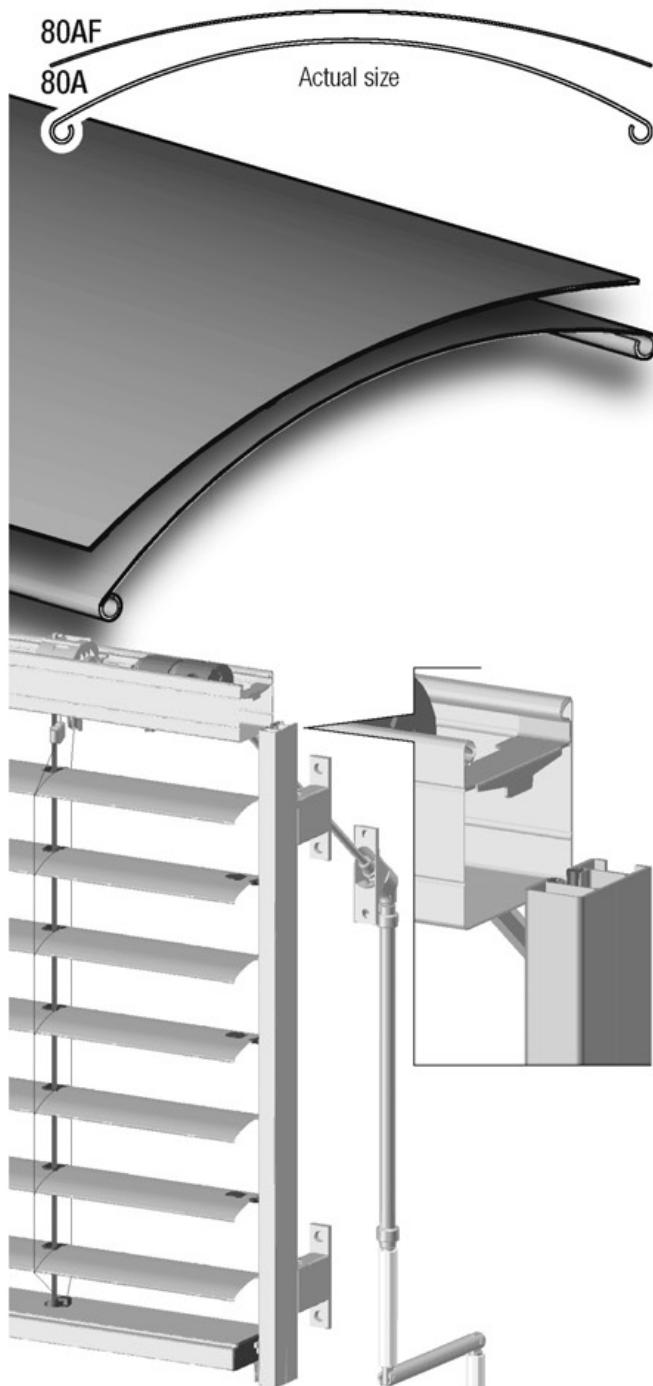
Description

- Installation on or in between side tracks
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

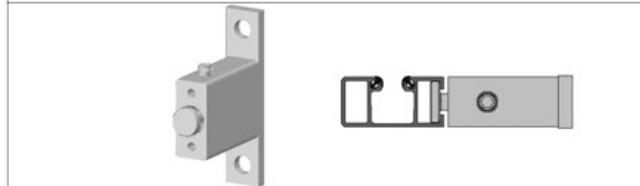
SIDE GUIDING PROFILE



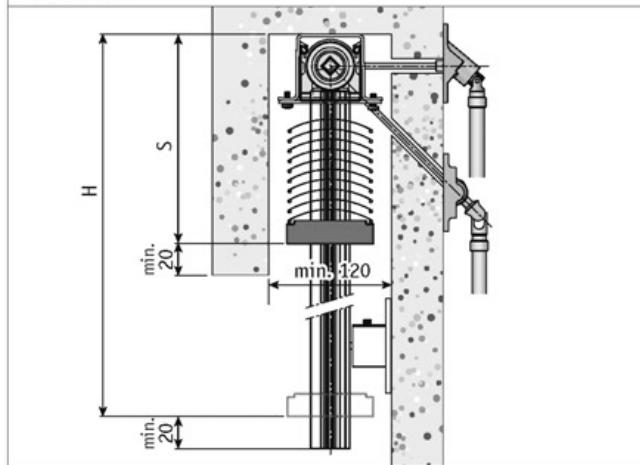
INTERMEDIATE GUIDING



SIDE TRACK BRACKETS



SIDE VIEW



SIZE LIMITATIONS

| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|-----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | K 80 ASK | 50 | 500 | 400 | 12 |
| | K 80 ASKF | 50 | 300 | 400 | 12 |
| Group | K 80 ASK | | 1000 | 400 | 12 |
| | K 80 ASKF | | 1000 | 400 | 12 |

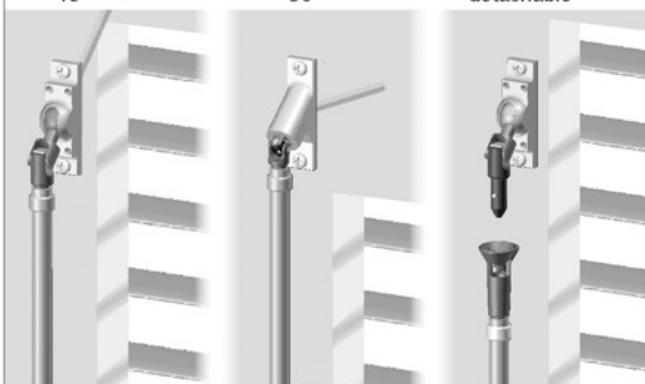
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height | Stacking height 80ASK | | Stacking height 80ASKF | | | Stacking height 80ASK | | | Stacking height 80ASKF | | | |
|--------------|-----------------------|-----------------------|------------------------|--------------|-----------------------|------------------------|--------------|-----------------------|------------------------|--------------|-----------------------|-----|
| | Blind height | Stacking height 80ASK | Stacking height 80ASKF | Blind height | Stacking height 80ASK | Stacking height 80ASKF | Blind height | Stacking height 80ASK | Stacking height 80ASKF | Blind height | Stacking height 80ASK | |
| 1000 | 163 | 123 | | 2500 | 253 | 175 | | | | 4000 | 344 | 212 |
| 1500 | 192 | 145 | | 3000 | 284 | 187 | | | | | | |
| 2000 | 224 | 162 | | 3500 | 314 | 200 | | | | | | |

OPTIONS K80ASK, K80ASKF

CRANK WAND

45° 90° detachable

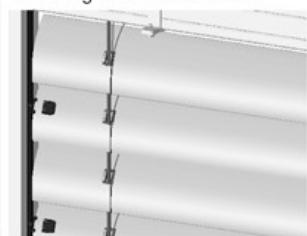


INSERT

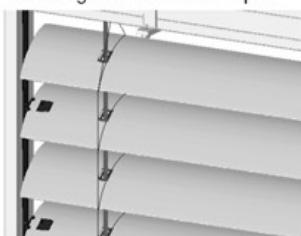


40° TIMER

Standard;
lowering with closed slats

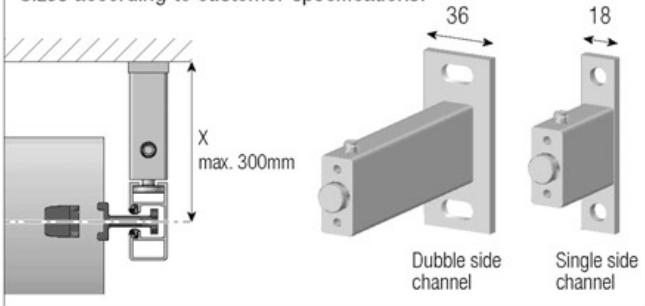


40° Timer;
lowering with slats 40° open

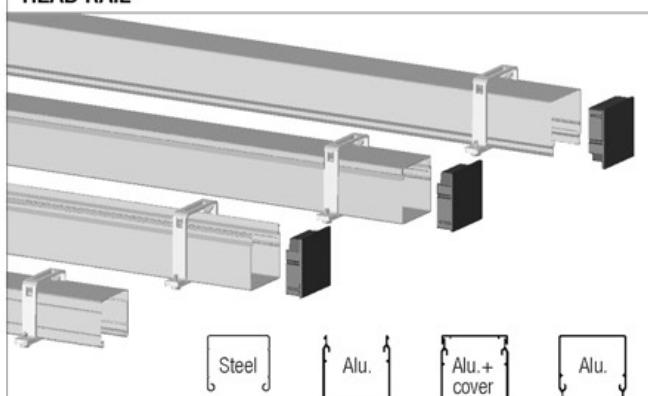


SIDE TRACK BRACKETS

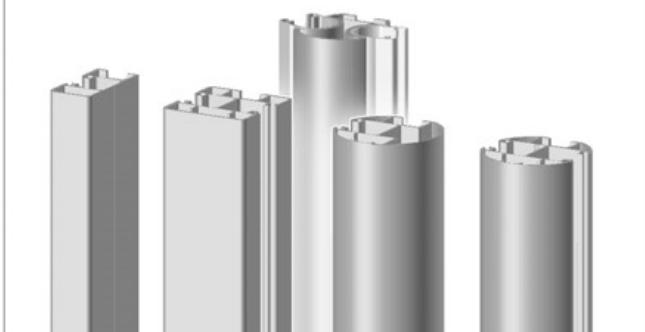
Sizes according to customer specifications.



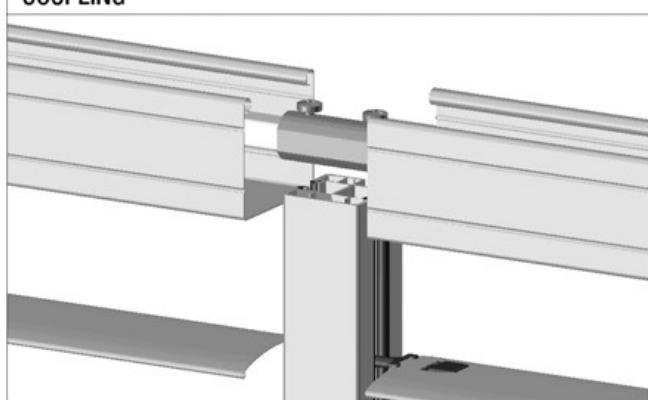
HEAD RAIL



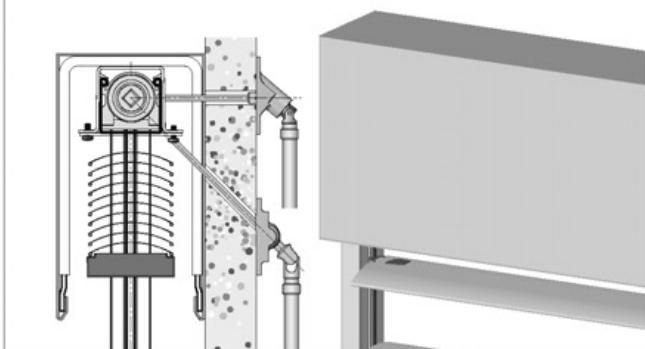
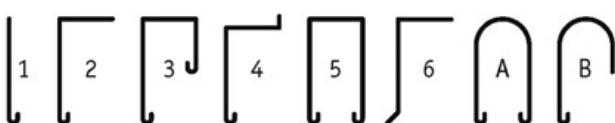
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS (Additional information on page 73)

- Spindle stop
- Dual Light Control
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Additional guiding cable(s)

EVB EL80ASKW

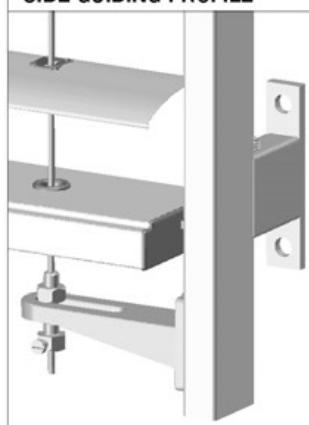
MOTOR OPERATED EXTERNAL VENETIAN BLIND WINDSTABLE
80 MM SLATS WITH CLAMP-ON SIDE GUIDING CHANNELS

EL80ASK : beaded 80 mm slats

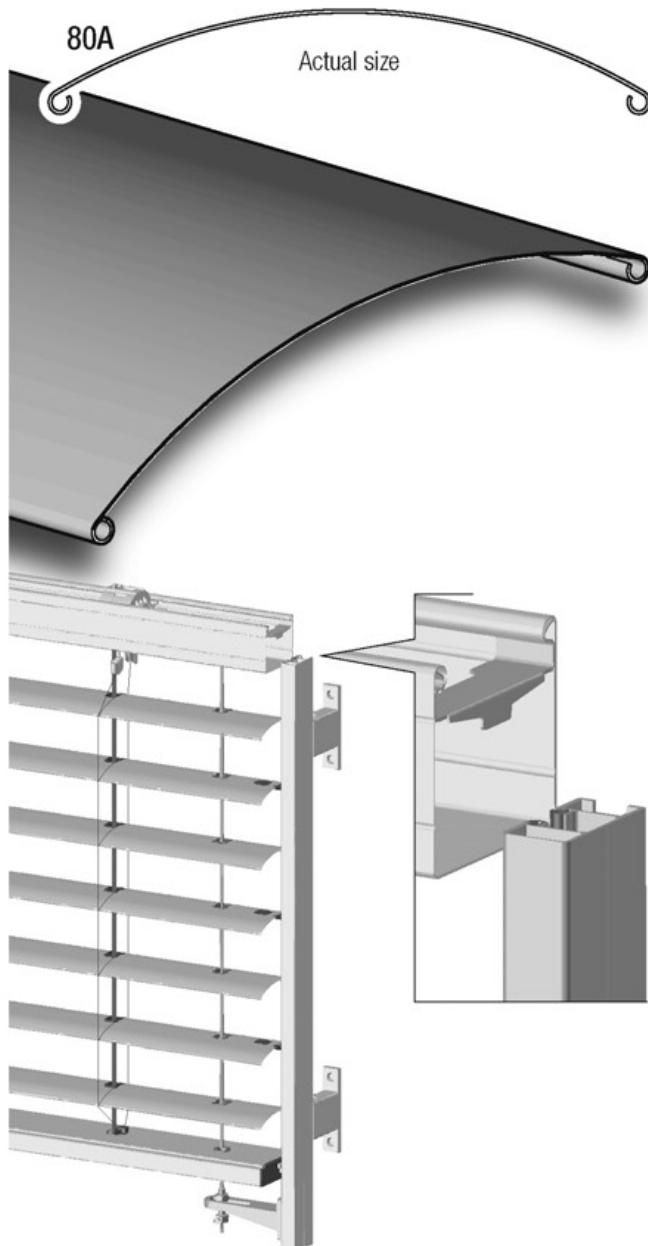
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 45° open
- Roll formed coil coated 80 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 80 x 22 mm
- Extruded side guiding channels 18 x 37 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable
 - Additional side guiding cables at 90 mm from backside side guiding
 - Intermediate guiding cable above product width of 1300 mm
 - Maximum distance to façade: 100 mm

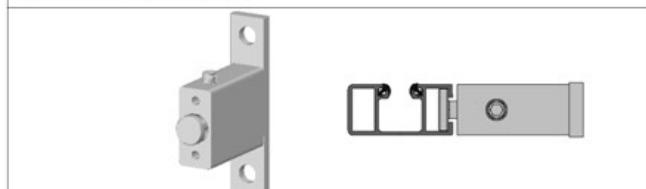
SIDE GUIDING PROFILE



INTERMEDIATE GUIDING



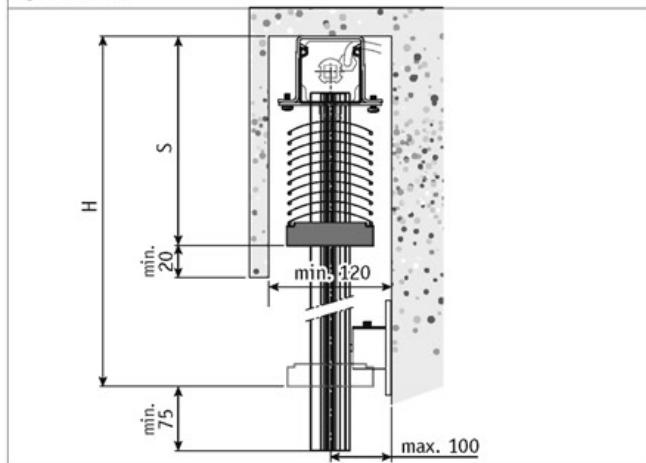
SIDE TRACK BRACKET



WIND LOAD LIMITS

| Blind width (cm) | Wind load limit (m/s) |
|------------------|-----------------------|
| 130 | 22 |
| 200 | 20 |
| 300 | 18 |

SIDE VIEW



SIZE LIMITATIONS

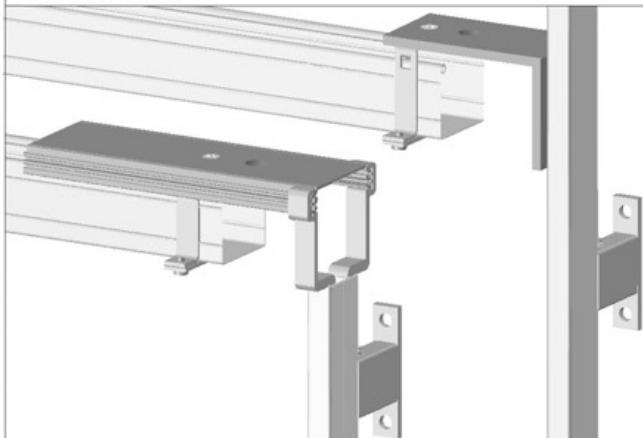
| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|-------------------|-----------------|-----------------|------------------|--------------------------------|
| Single EL 80 ASKW | 76 | 300 | 300 | 6 |
| Group EL 80 ASKW | | 900 | 300 | 18 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S | Blind height H | Stacking height S |
|----------------|-------------------|----------------|-------------------|
| 1000 | 162 | 2500 | 252 |
| 1500 | 192 | 3000 | 282 |
| 2000 | 222 | | |

OPTIONS EL80ASKW

FREE HANGING

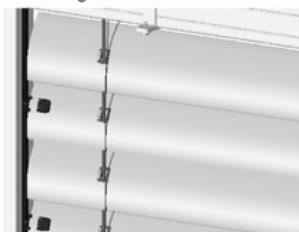


INSERT

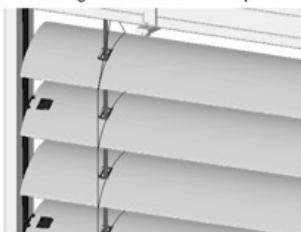


40° TIMER

Standard;
lowering with closed slats

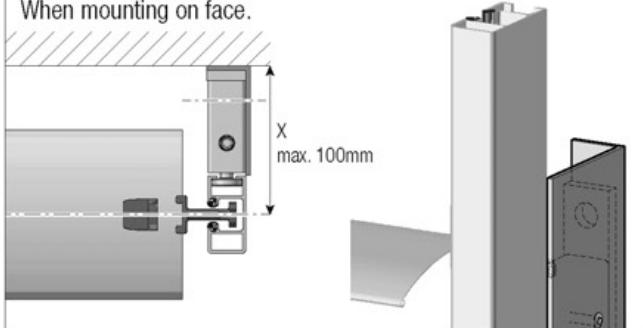


40° Timer;
lowering with slats 40° open

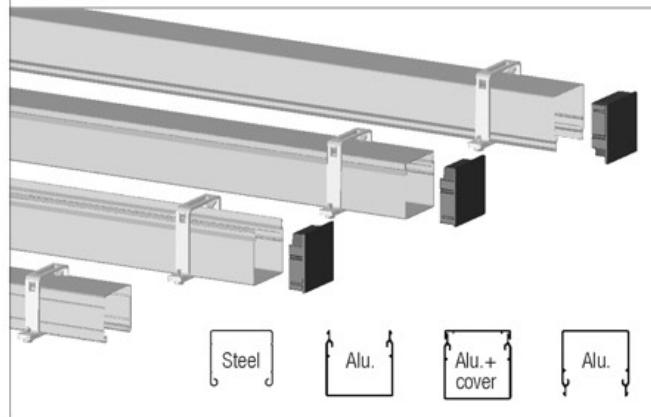


SIDE COVER PROFILE

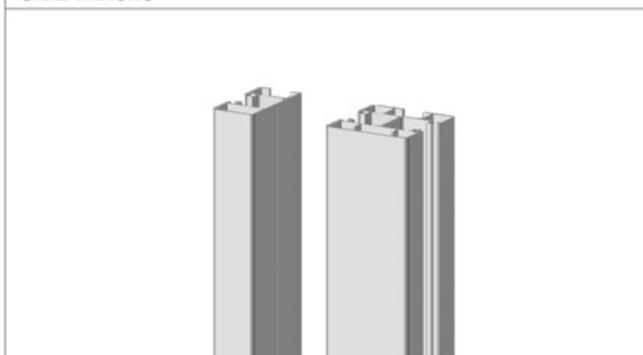
When mounting on face.



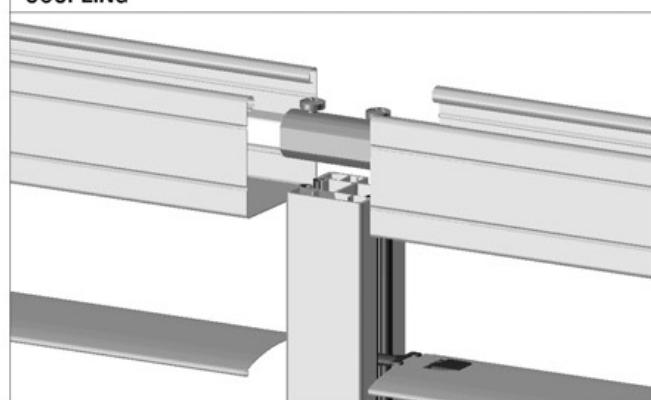
HEAD RAIL



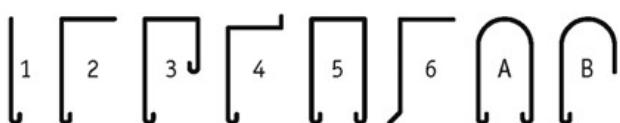
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS (Additional information on page 73)

- Side cover profile (on face mounting)
- Dual Light control
- Slow motion motor for more precise slat tilting
- Head rail end caps in milky white
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Perforated slats
- Free hanging system
- For possible motor controls see separately available documentation

EVB EL88AS

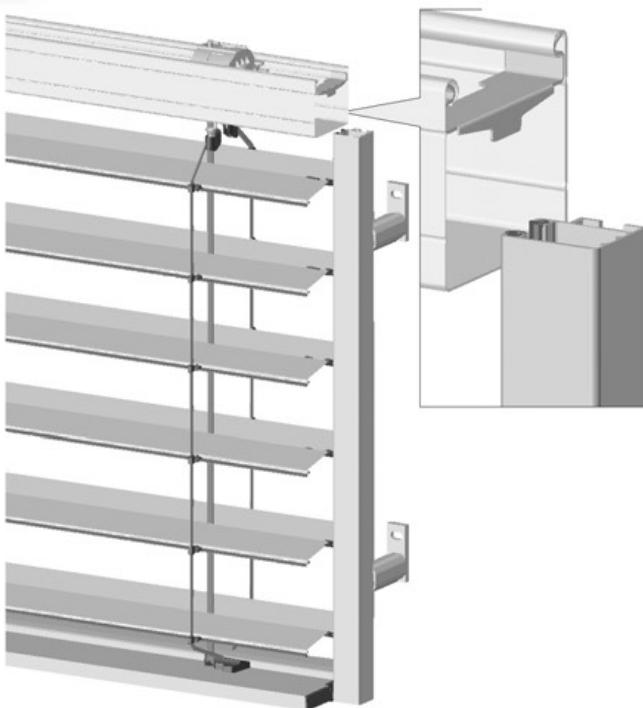
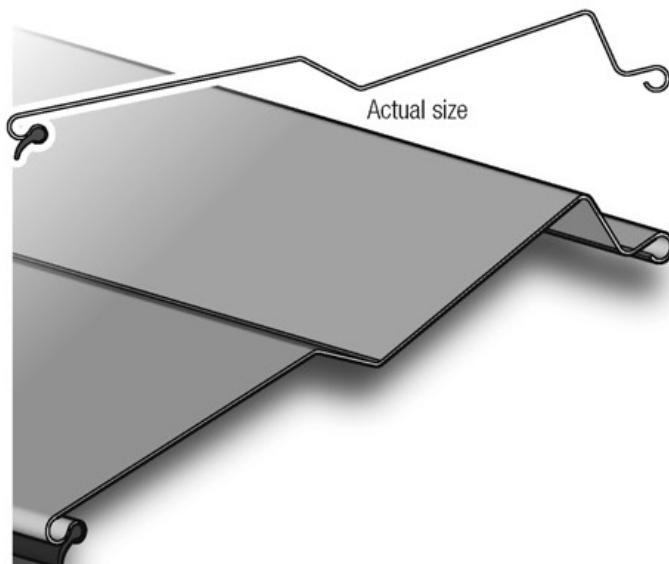
MOTOR OPERATED EXTERNAL VENETIAN BLIND

88 MM SLATS WITH STANDARD SIDE GUIDING CHANNELS

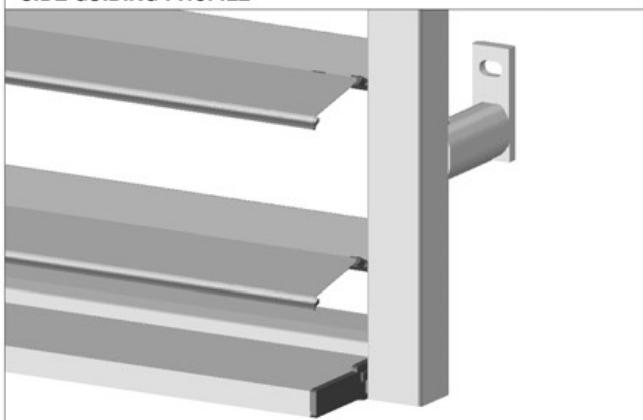
EL88AS: Z-shaped beaded 88 mm slats with seal

Description

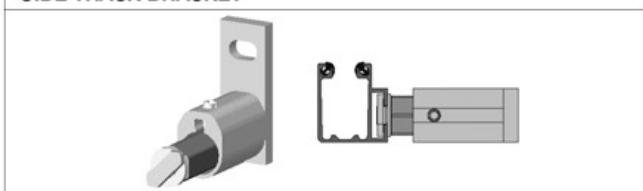
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats open
- Roll formed coil coated 88 mm slats of partly recycled aluminium
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Natural anodised or powder coated extruded aluminium bottom rail 90 x 24 mm, alternatively heavy-duty 90 x 45 mm for blinds over 1,800 mm width
- Extruded side guiding channels 27 x 24 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps and lift tape
- Grey ball tape for good stacking of the slats
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



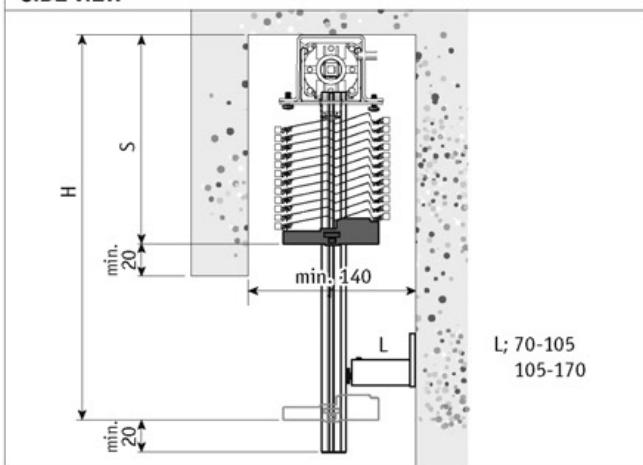
SIDE GUIDING PROFILE



SIDE TRACK BRACKET



SIDE VIEW



SIZE LIMITATIONS

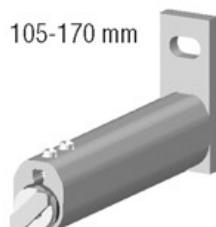
| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|-----------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single EL 88 AS | 58 | 400 | 400 | 12 |
| Group EL 88 AS | | 1000 | 400 | 16 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

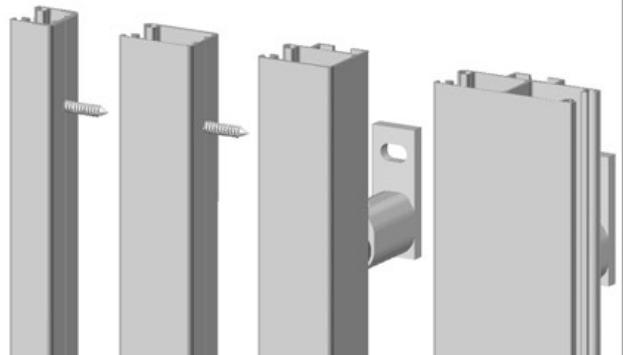
| Blind height H | Stacking height EL88AS | Blind height H | Stacking height EL88AS |
|-------------------|---------------------------|-------------------|---------------------------|
| 1000 | 170 | 3000 | 300 |
| 1500 | 190 | 3500 | 335 |
| 2000 | 230 | 4000 | 370 |
| 2500 | 265 | | |

OPTIONS EVB 88AS

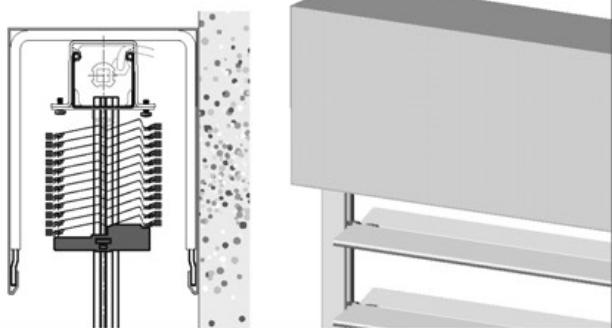
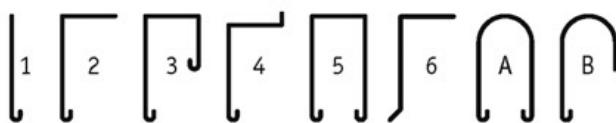
SIDE TRACK BRACKETS



SIDE TRACKS



PELMET

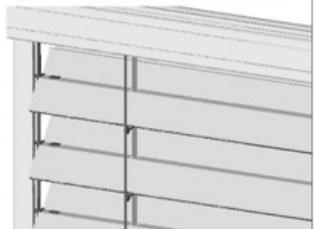


40° TIMER

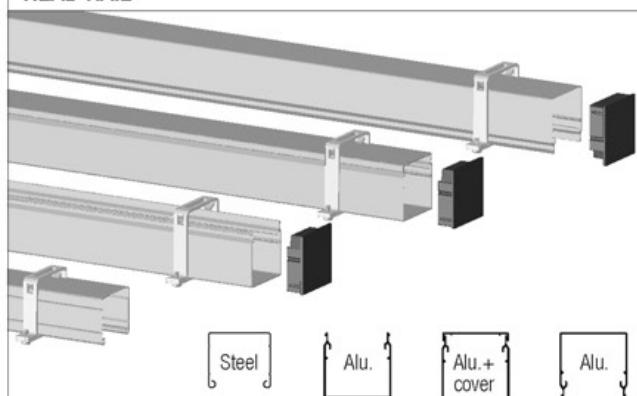
Standard;
lowering with closed slats



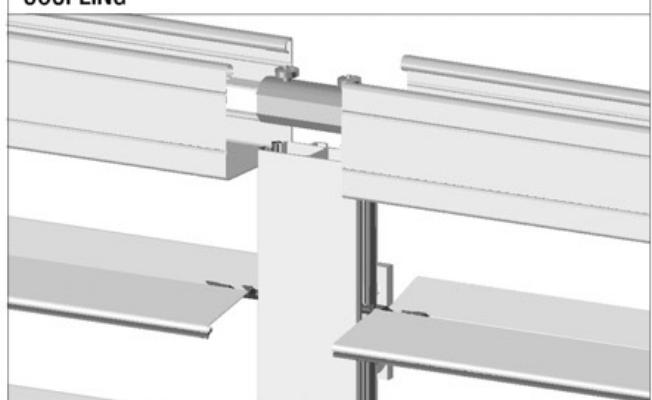
40° Timer;
lowering with slats 40° open



HEAD RAIL



COUPLING



FURTHER OPTIONS

(Additional information on page 73)

- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- For possible motor controls see separately available documentation

EVB K88AS

CRANK OPERATED EXTERNAL VENETIAN BLIND

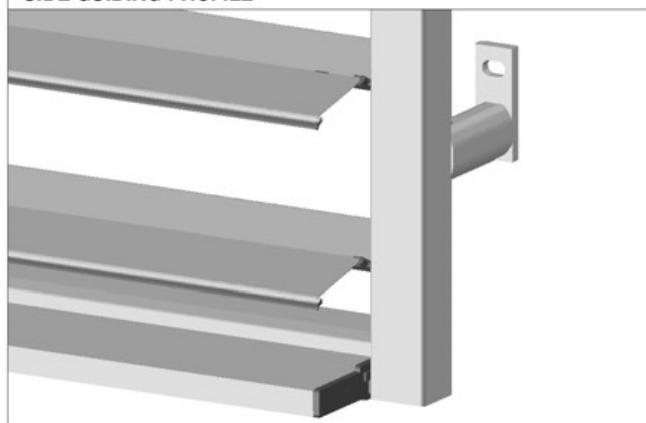
88 MM SLATS WITH STANDARD SIDE GUIDING CHANNELS

K88AS: Z-shaped beaded 88 mm slats with seal

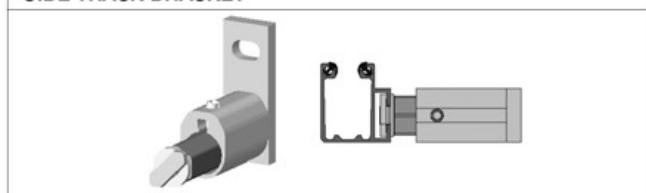
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats open
- Roll formed coil coated 88 mm slats of partly recycled aluminium
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Natural anodised or powder coated extruded aluminium bottom rail 90 x 24 mm, alternatively heavy-duty 90 x 45 mm for blinds over 1,800 mm width
- Extruded side guiding channels 27 x 24 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps and lift tape
- Grey ball tape for good stacking of the slats
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

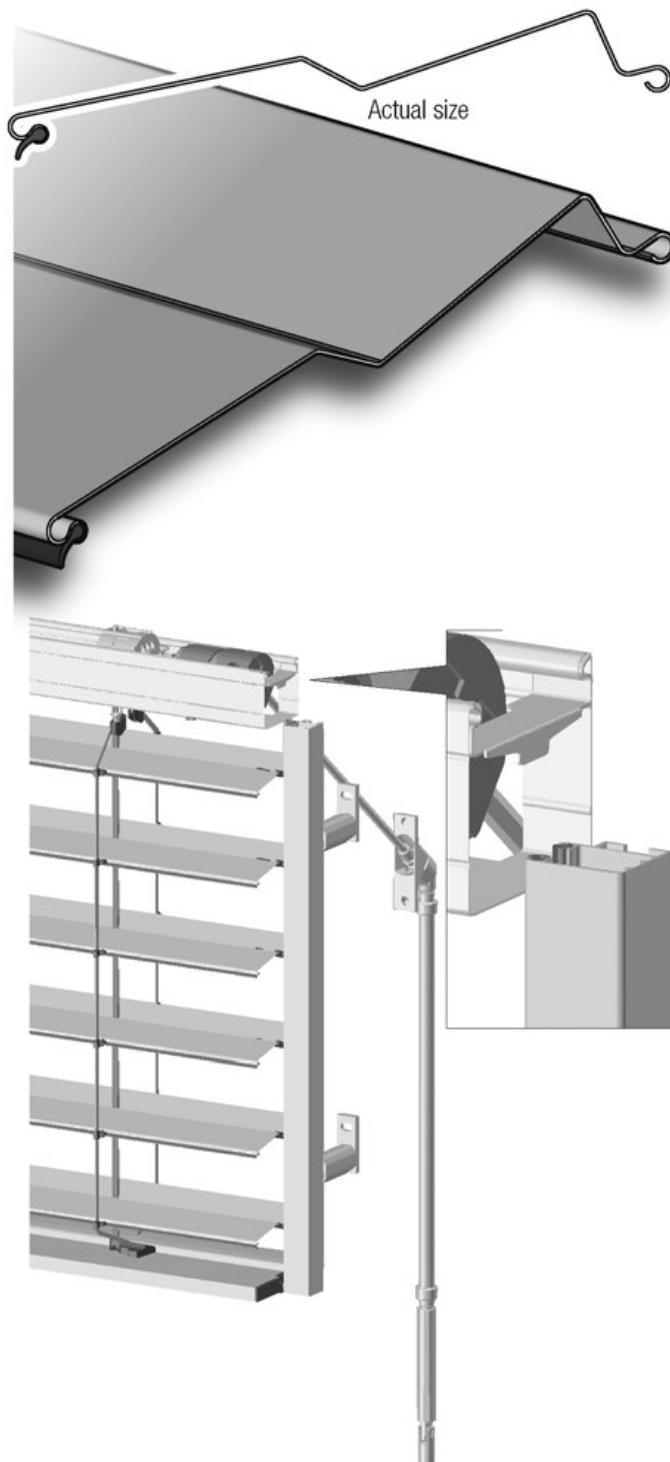
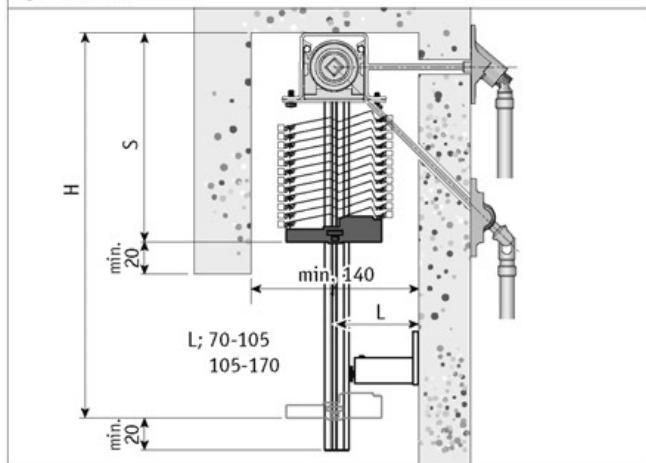
SIDE GUIDING PROFILE



SIDE TRACK BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|----------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single K 88 AS | 52 | 400 | 400 | 10 |
| Group K 88 AS | | 1000 | 400 | 10 |

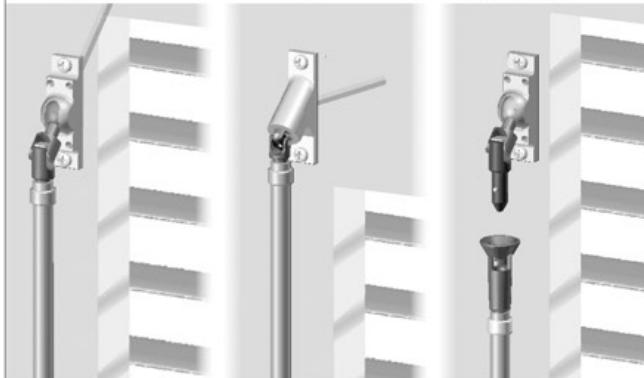
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height K88AS | Blind height H | Stacking height K88AS |
|-------------------|--------------------------|-------------------|--------------------------|
| 1000 | 160 | 3000 | 290 |
| 1500 | 180 | 3500 | 325 |
| 2000 | 240 | 4000 | 360 |
| 2500 | 255 | | |

OPTIONS K88AS

CRANK WAND

45° 90° detachable

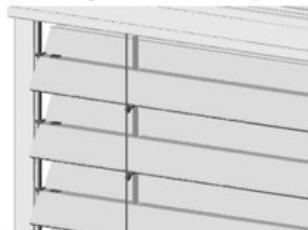


40° TIMER

Standard;
lowering with closed slats



40° Timer;
lowering with slats 40° open

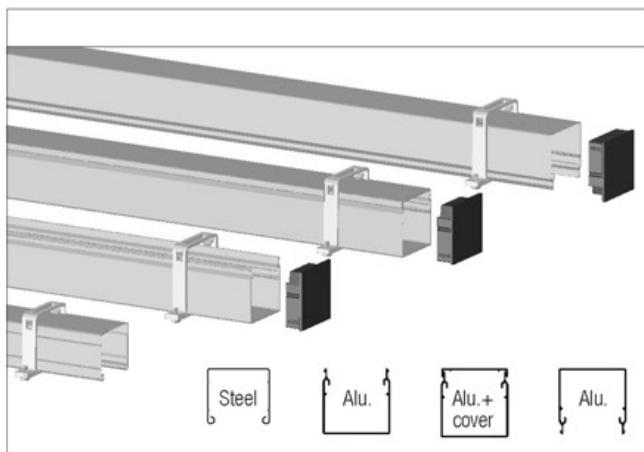


SIDE TRACK BRACKETS

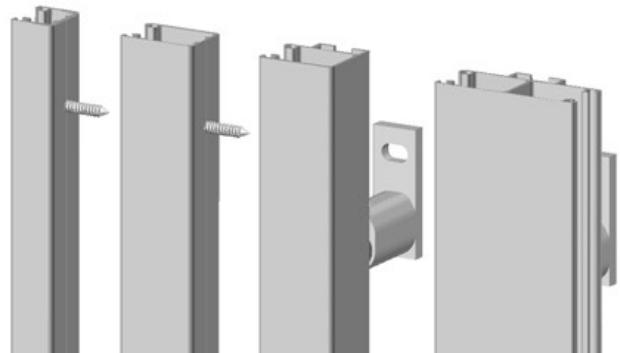
70-105 mm



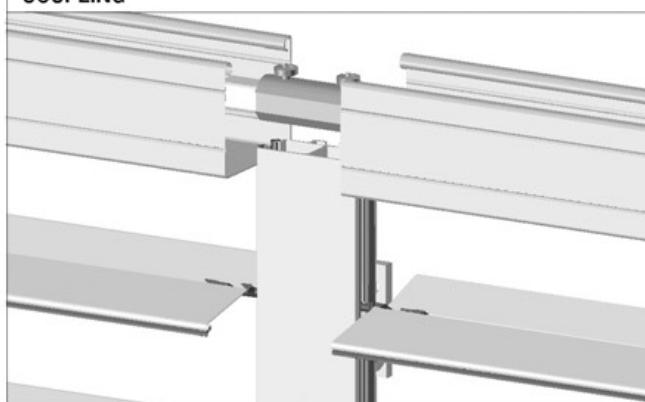
105-170 mm



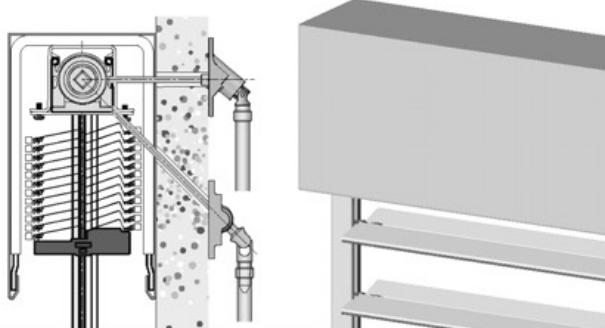
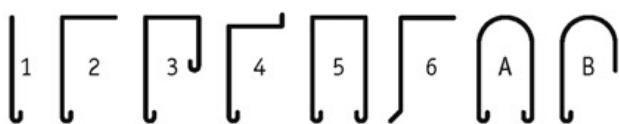
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS

(Additional information on page 73)

- Spindle stop
- Dual Light Control
- Perforated slats

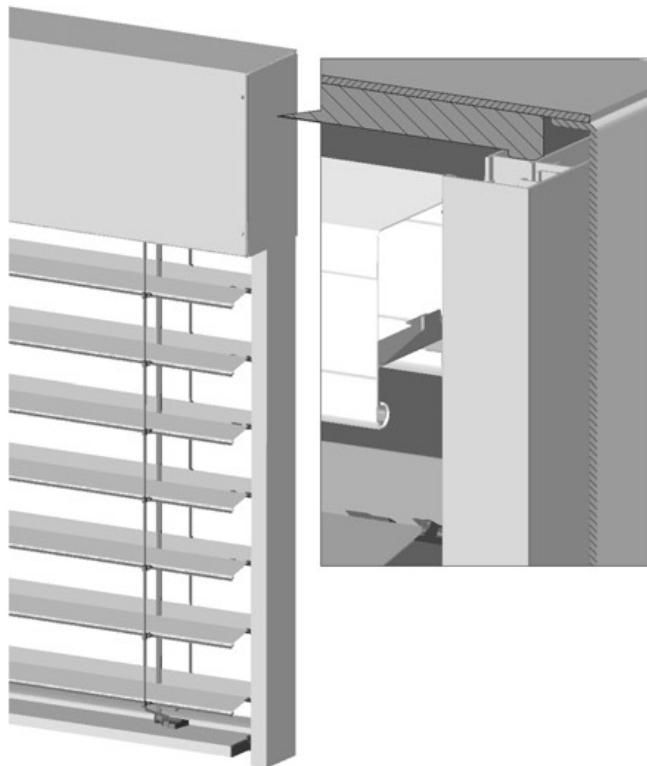
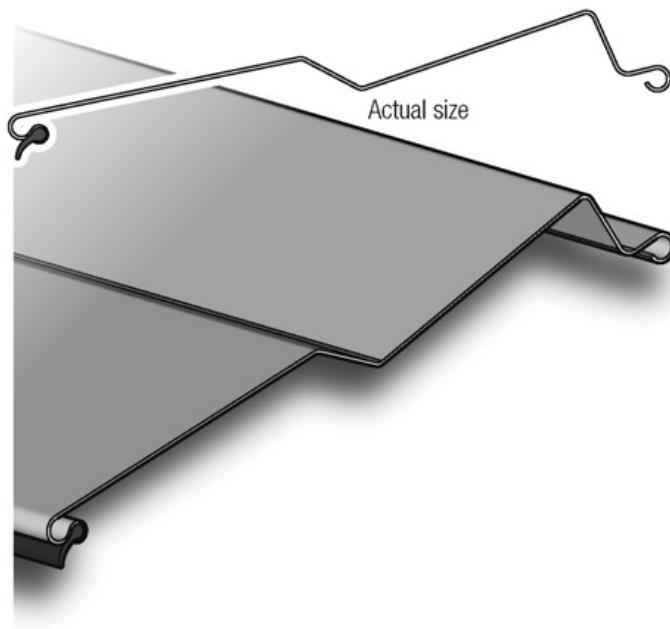
EVB EL88ASC

MOTOR OPERATED EXTERNAL VENETIAN BLIND "CLICK" 88 MM SLATS WITH CLIP-ON SIDE GUIDING CHANNELS

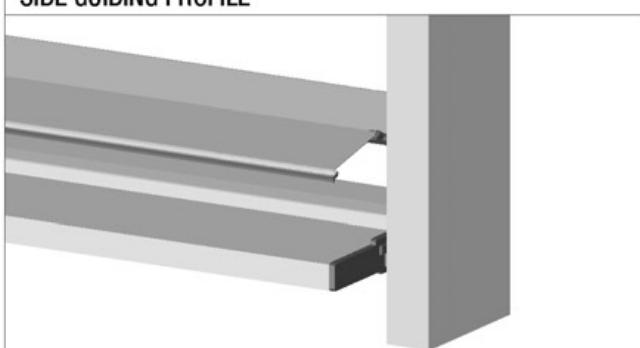
EL88ASC: Z-shaped beaded 88 mm slats with seal

Description

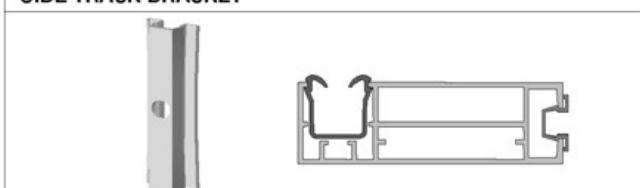
- Easy to mount "CLICK" blind pre-installed in customised natural anodised or powder coated aluminium pelmet
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats open
- Roll formed coil coated 88 mm slats of partly recycled aluminium
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Natural anodised or powder coated extruded aluminium bottom rail 90 x 24 mm,
- alternatively heavy-duty 90 x 45 mm for blinds over 1,800 mm width
- Extruded side guiding channels 81 x 25 mm with groove in similar finish and black
- insert for noise reduction
- Black bottom rail end caps and lift tape
- Grey ball tape for good stacking of the slats
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



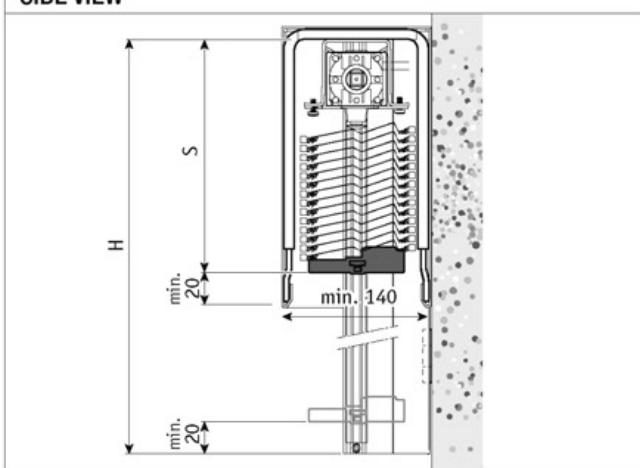
SIDE GUIDING PROFILE



SIDE TRACK BRACKET



SIDE VIEW



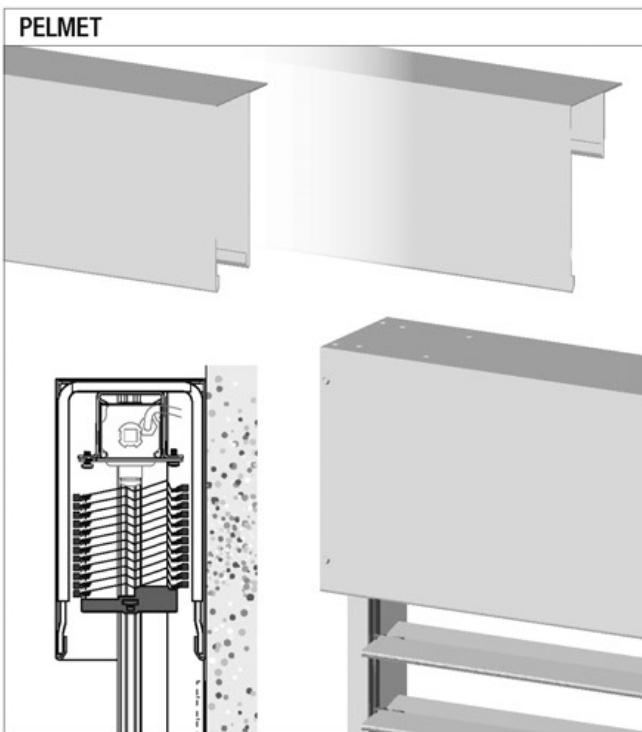
SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|-----------|--------------------|--------------------|---------------------|-----------------------------------|
| EL 88 ASC | 78 | 350 | 400 | 12 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height 88ASC | Blind height H | Stacking height 88ASC |
|-------------------|--------------------------|-------------------|--------------------------|
| 1000 | 180 | 3000 | 310 |
| 1500 | 200 | 3500 | 345 |
| 2000 | 240 | 4000 | 380 |
| 2500 | 275 | | |

OPTIONS EL88ASC



40° TIMER

Standard;
lowering with closed slats



40° Timer;
lowering with slats 40° open



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- For possible motor controls see separately available documentation

EVB EL88ASS

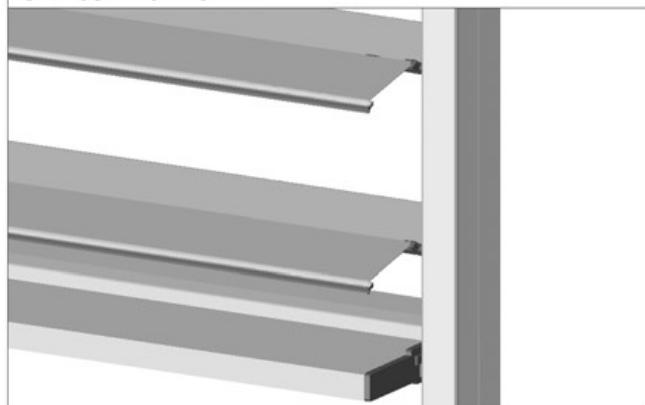
MOTOR OPERATED EXTERNAL VENETIAN BLIND 88 MM SLATS WITH PUSH-ON SIDE GUIDING CHANNELS

EL88ASS: Z-shaped beaded 88 mm slats with seal

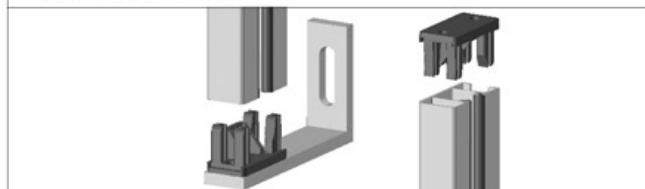
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats open
- Roll formed coil coated 88 mm slats of partly recycled aluminium
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Natural anodised or powder coated extruded aluminium bottom rail 90 x 24 mm, alternatively heavy-duty 90 x 45 mm for blinds over 1,800 mm width
- Extruded side guiding channels 18 x 37 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps and lift tape
- Grey ball tape for good stacking of the slats
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

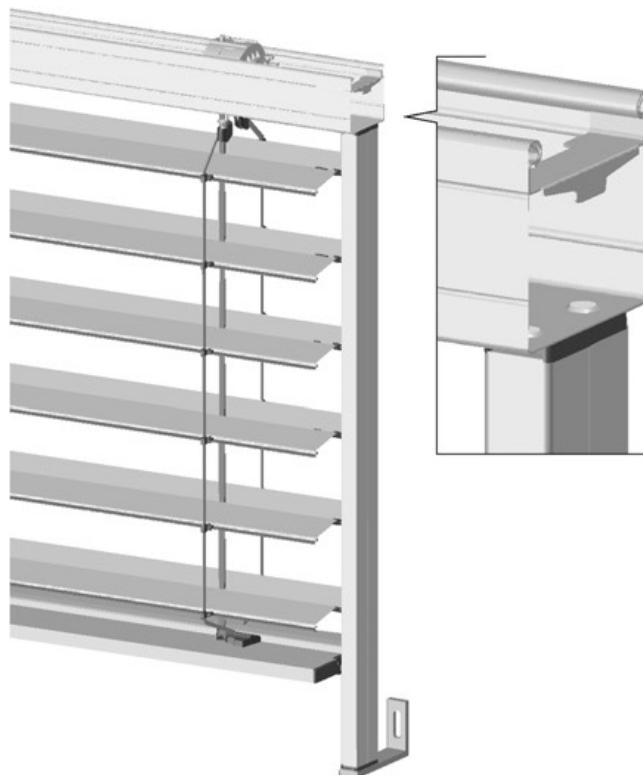
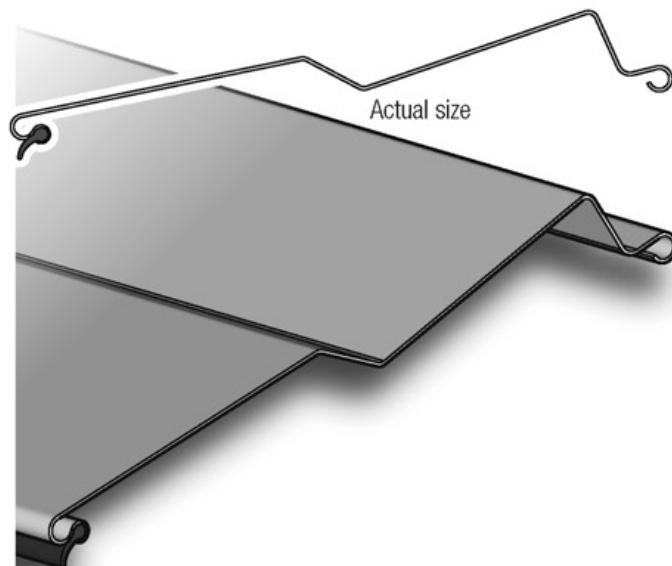
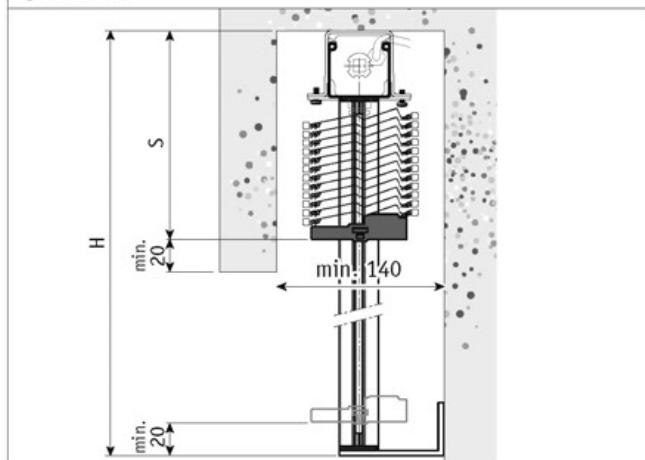
SIDE GUIDING PROFILE



PUSH-ON BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|--------|-----------|--------------------|--------------------|---------------------|-----------------------------------|
| Single | EL 88 ASS | 56 | 300 | 250 | 7 |
| Group | EL 88 ASS | | 1000 | 250 | 16 |

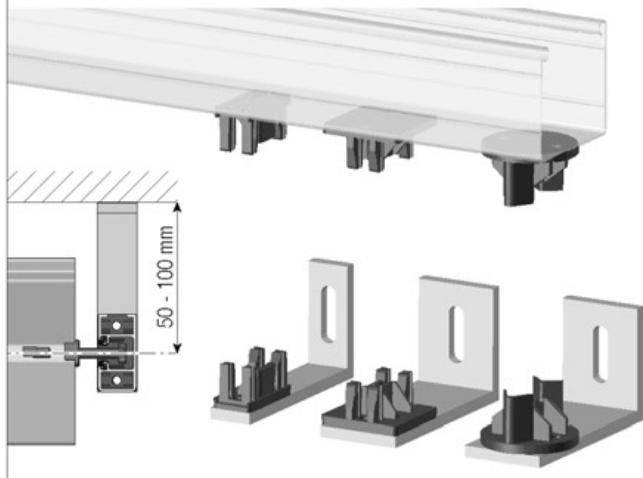
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height EL88ASS | Blind height H | Stacking height EL88ASS |
|-------------------|----------------------------|-------------------|----------------------------|
| 1000 | 170 | 2000 | 230 |
| 1500 | 190 | 2500 | 265 |

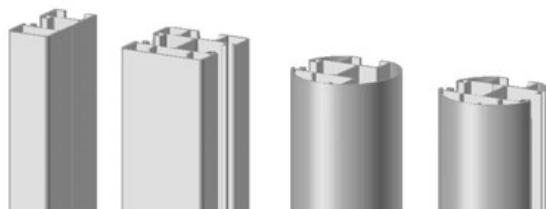
OPTIONS EL88ASS

SIDE TRACK BRACKETS

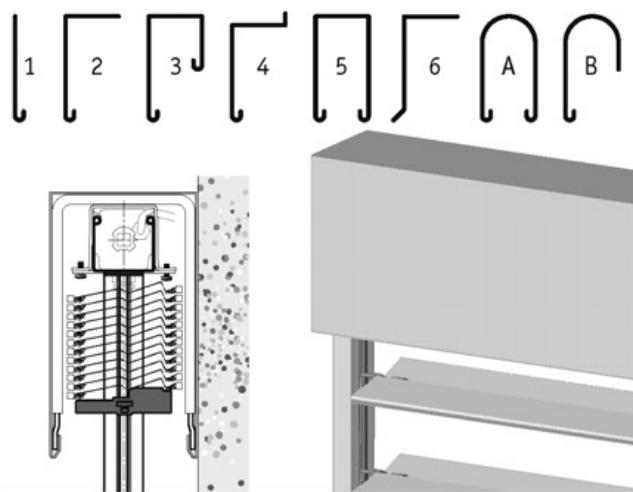
Length according to customer specifications.



SIDE TRACKS



PELMET

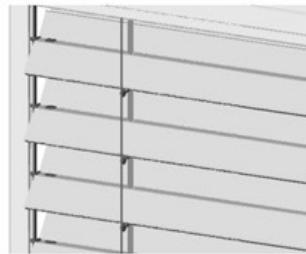


40° TIMER

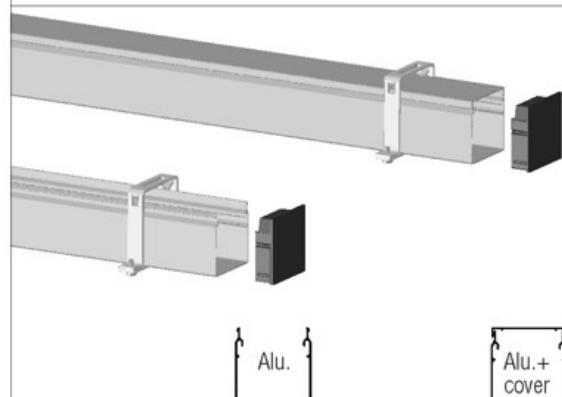
Standard;
lowering with closed slats



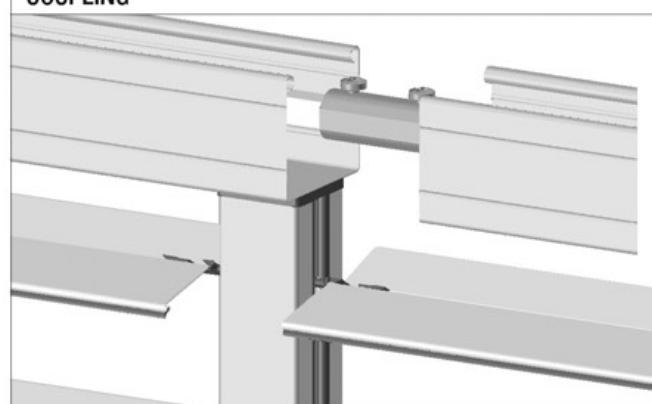
40° Timer;
lowering with slats 40° open



HEAD RAIL



COUPLING



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- For possible motor controls see separately available documentation

EVB K88ASS

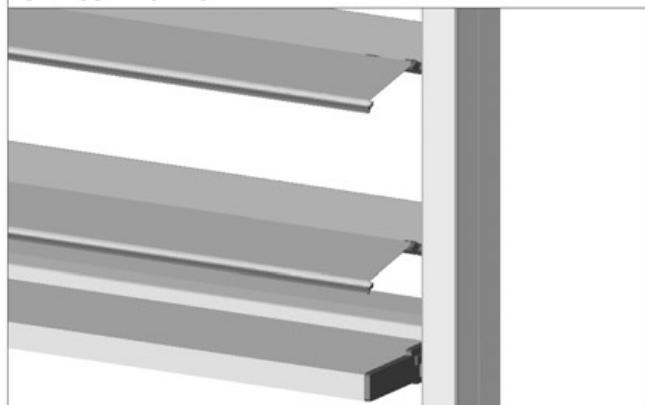
CRANK OPERATED EXTERNAL VENETIAN BLIND 88 MM SLATS WITH PUSH-ON SIDE GUIDING CHANNELS

K88ASS: Z-shaped beaded 88 mm slats with seal

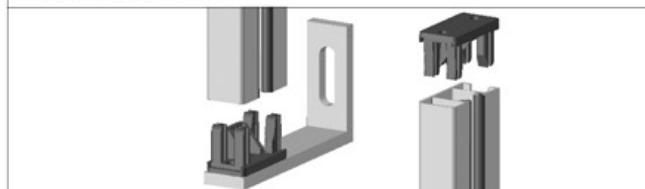
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats open
- Roll formed coil coated 88 mm slats of partly recycled aluminium
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Natural anodised or powder coated extruded aluminium bottom rail 90 x 24 mm, alternatively heavy-duty 90 x 45 mm for blinds over 1,800 mm width
- Extruded side guiding channels 18 x 37 mm with groove in similar finish and black insert for noise reduction
- Black bottom rail end caps and lift tape
- Grey ball tape for good stacking of the slats
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

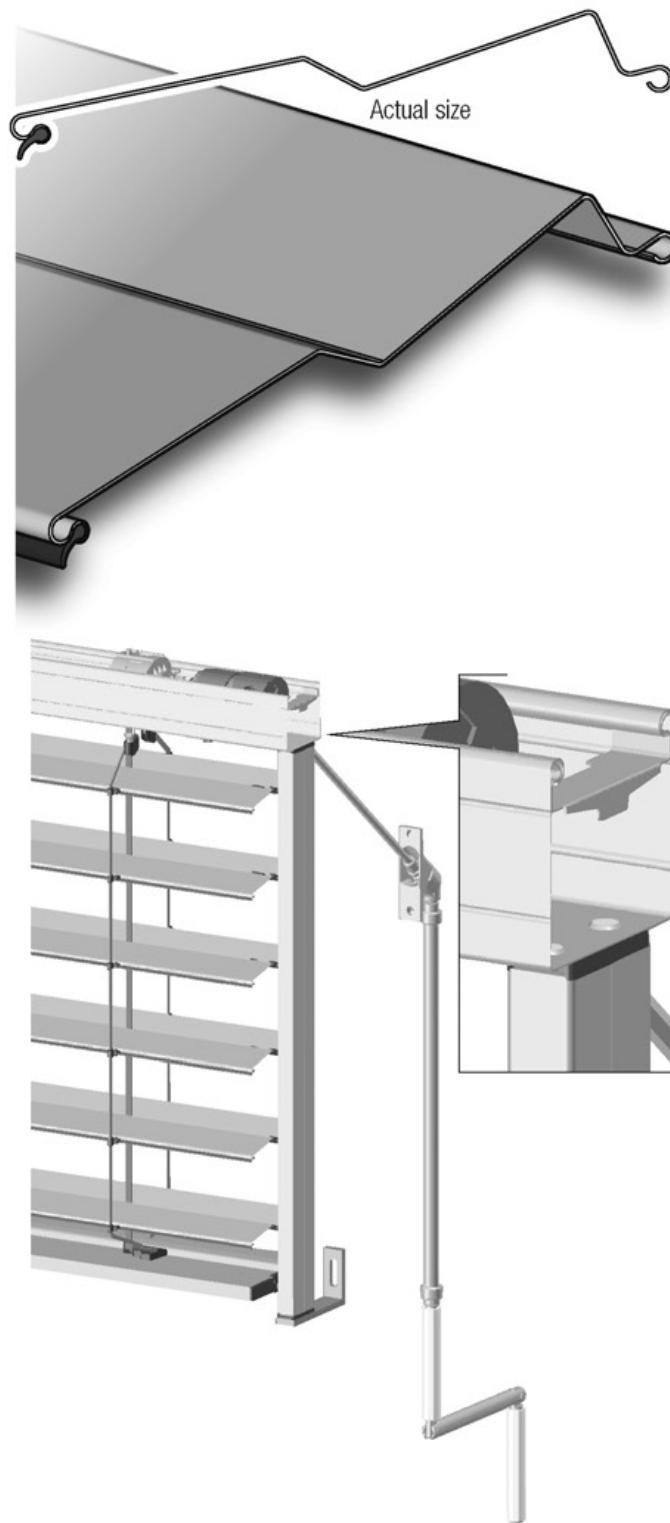
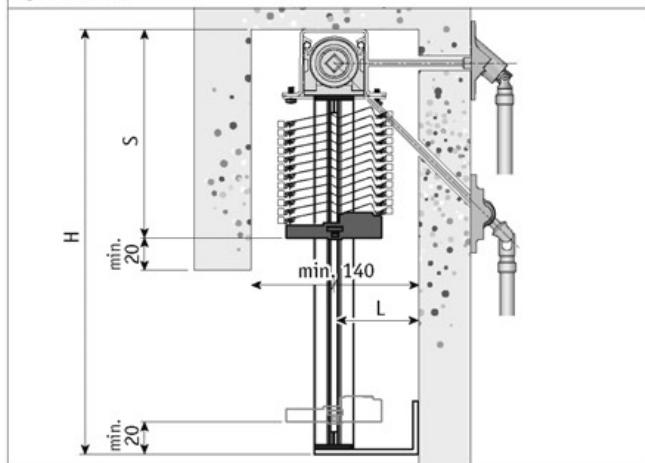
SIDE GUIDING PROFILE



PUSH-ON BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|-----------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single K 88 ASS | 50 | 300 | 250 | 7 |
| Group K 88 ASS | | 1000 | 250 | 10 |

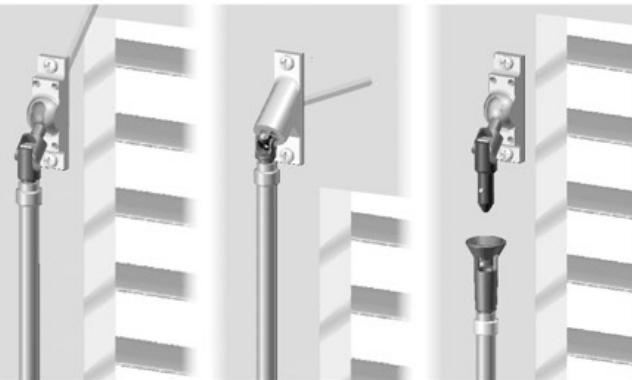
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height K88ASS | Blind height H | Stacking height K88ASS |
|-------------------|---------------------------|-------------------|---------------------------|
| 1000 | 160 | 2000 | 220 |
| 1500 | 180 | 2500 | 255 |

OPTIONS K88ASS

CRANK WAND

45° 90° detachable

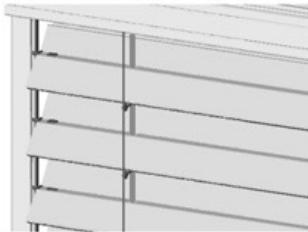


40° TIMER

Standard;
lowering with closed slats

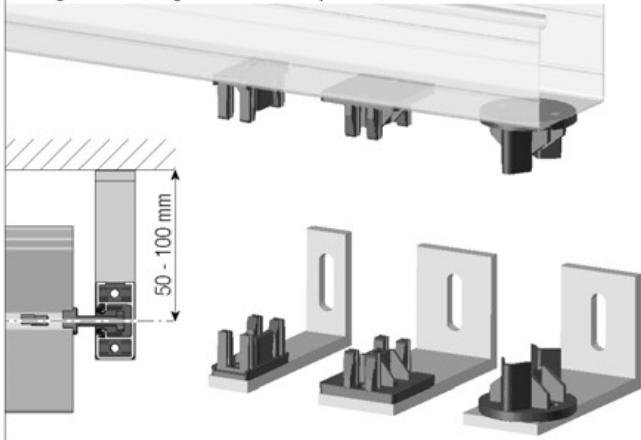


40° Timer;
lowering with slats 40° open

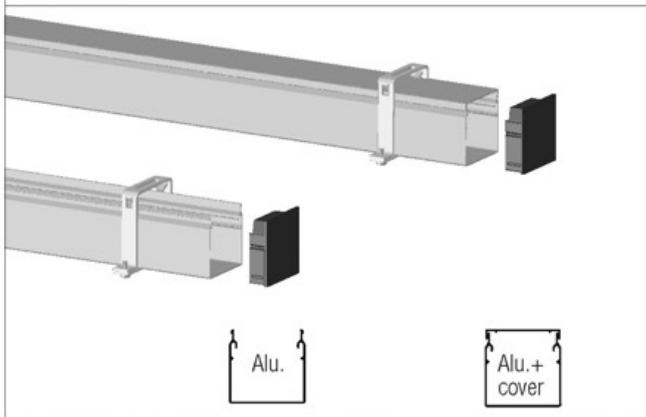


SIDE TRACK BRACKETS

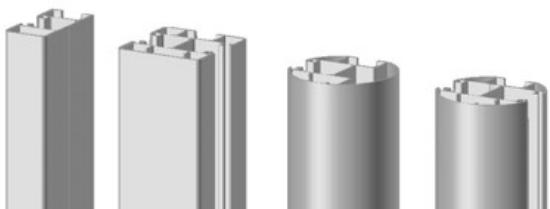
Length according to customer specifications.



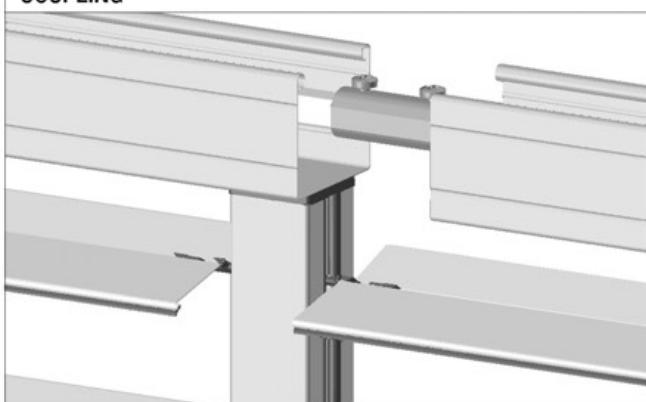
HEAD RAIL



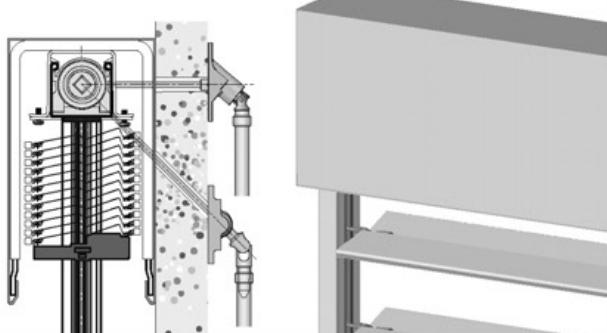
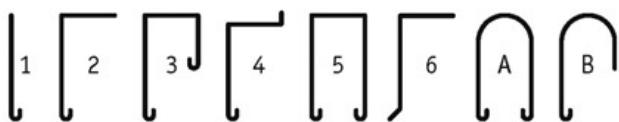
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS

(Additional information on page 73)

- Spindle stop
- Dual Light Control
- Head rail end caps in milky white
- Perforated slats

EVB EL88ASK

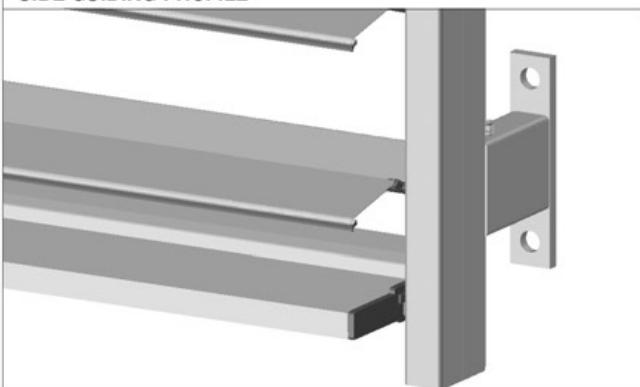
MOTOR OPERATED EXTERNAL VENETIAN BLIND 88 MM SLATS WITH CLAMP-ON SIDE GUIDING CHANNELS

EL88ASK: Z-shaped beaded 88 mm slats with seal

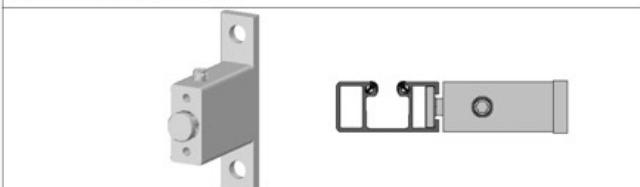
Description

- Installation on or in between side tracks
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats open
- Roll formed coil coated 88 mm slats of partly recycled aluminium
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Natural anodised or powder coated extruded aluminium bottom rail 90 x 24 mm, alternatively heavy-duty 90 x 45 mm for blinds over 1,800 mm width
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps and lift tape
- Grey ball tape for good stacking of the slats
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

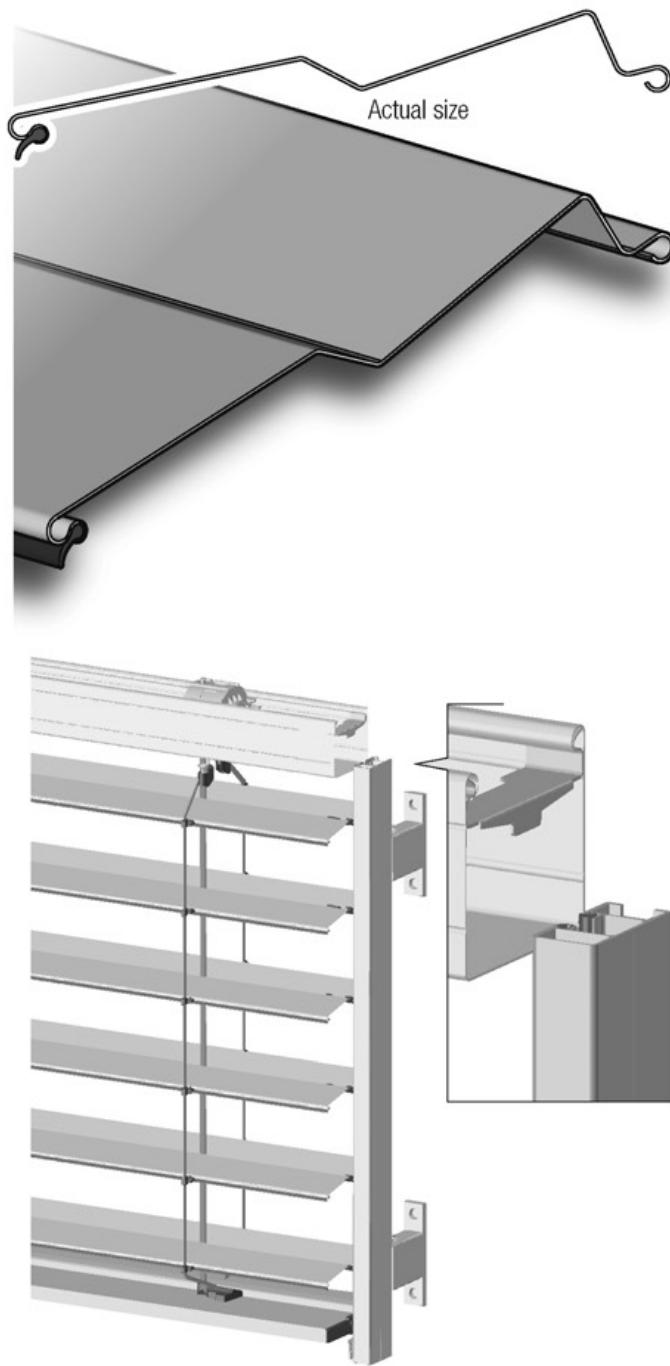
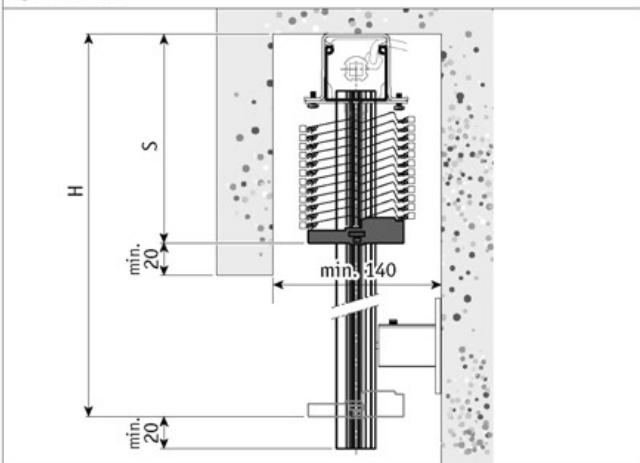
SIDE GUIDING PROFILE



SIDE TRACK BRACKET



SIDE VIEW



SIZE LIMITATIONS

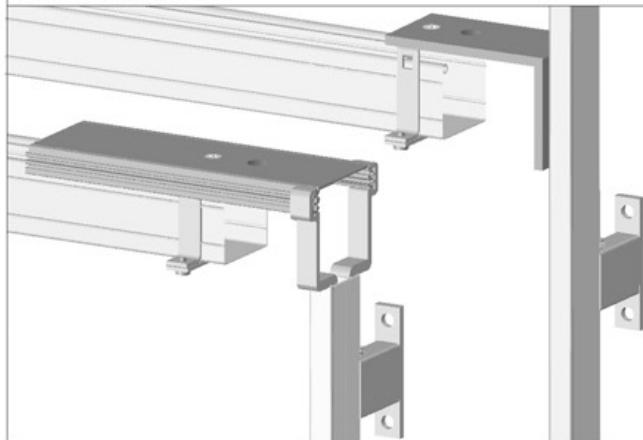
| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|------------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single EL 88 ASK | 56 | 400 | 400 | 12 |
| Group EL 88 ASK | | 1000 | 400 | 16 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height EL88ASK | Blind height H | Stacking height EL88ASK |
|-------------------|----------------------------|-------------------|----------------------------|
| 1000 | 170 | 3000 | 300 |
| 1500 | 190 | 3500 | 335 |
| 2000 | 230 | 4000 | 370 |
| 2500 | 265 | | |

OPTIONS EL88ASK

FREE HANGING

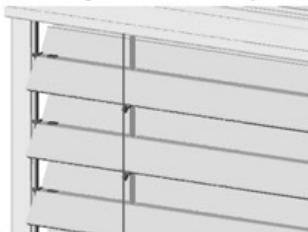


40° TIMER

Standard;
lowering with closed slats

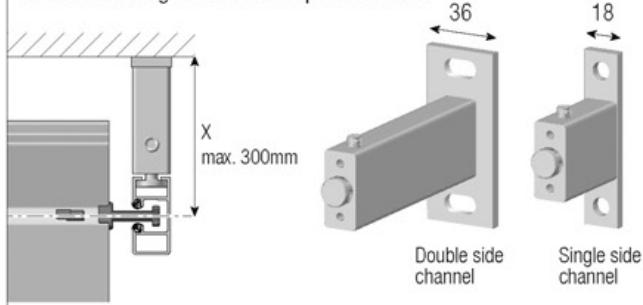


40° Timer;
lowering with slats 40° open

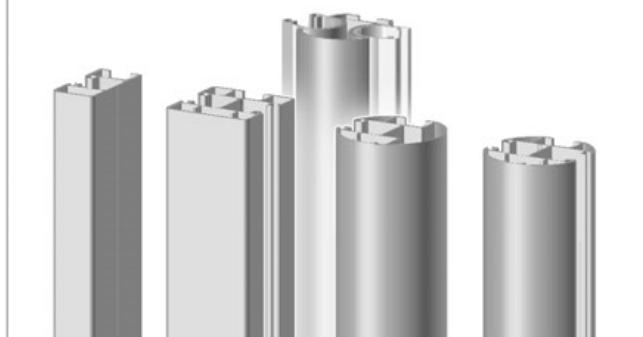


SIDE TRACK BRACKETS

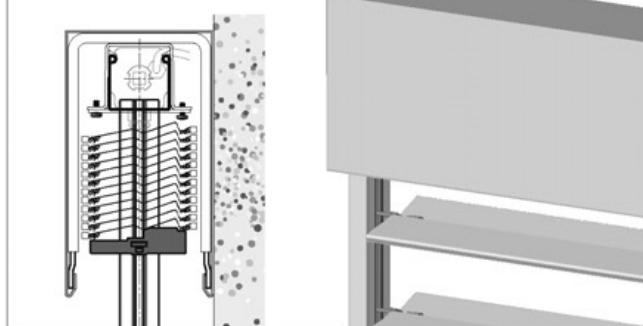
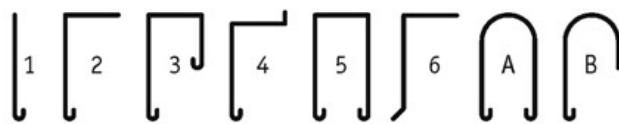
Sizes according to customer specifications.



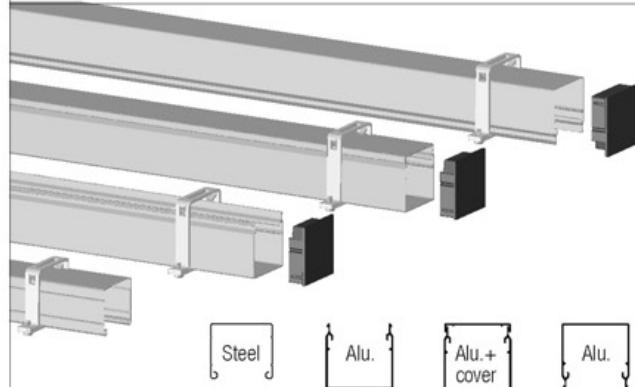
SIDE TRACKS



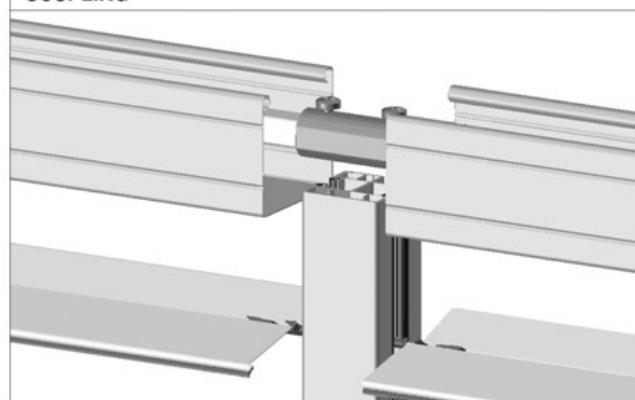
PELMET



HEAD RAIL



COUPLING



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- For possible motor controls see separately available documentation

EVB K88ASK

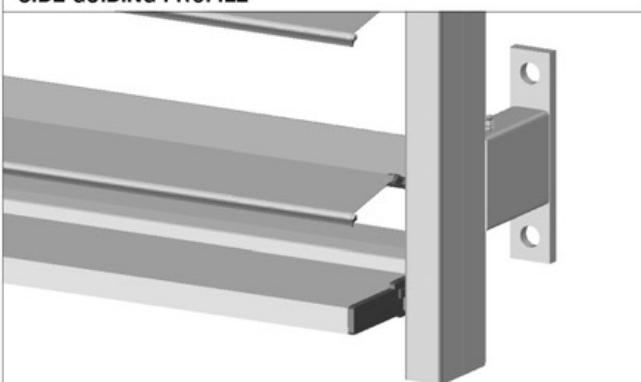
CRANK OPERATED EXTERNAL VENETIAN BLIND 88 MM SLATS WITH CLAMP-ON SIDE GUIDING CHANNELS

K88ASK: Z-shaped beaded 88 mm slats with seal

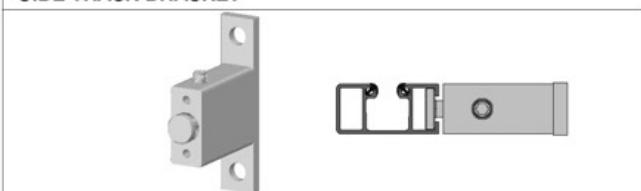
Description

- Installation on or in between side tracks
- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats open
- Roll formed coil coated 88 mm slats of partly recycled aluminium
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Natural anodised or powder coated extruded aluminium bottom rail 90 x 24 mm, alternatively heavy-duty 90 x 45 mm for blinds over 1,800 mm width
- Extruded side guiding channels 18 x 37 mm with groove in similar finish with black insert for noise reduction
- Black bottom rail end caps and lift tape and Aramid reinforced polyester ladder cords
- Grey ball tape for good stacking of the slats
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

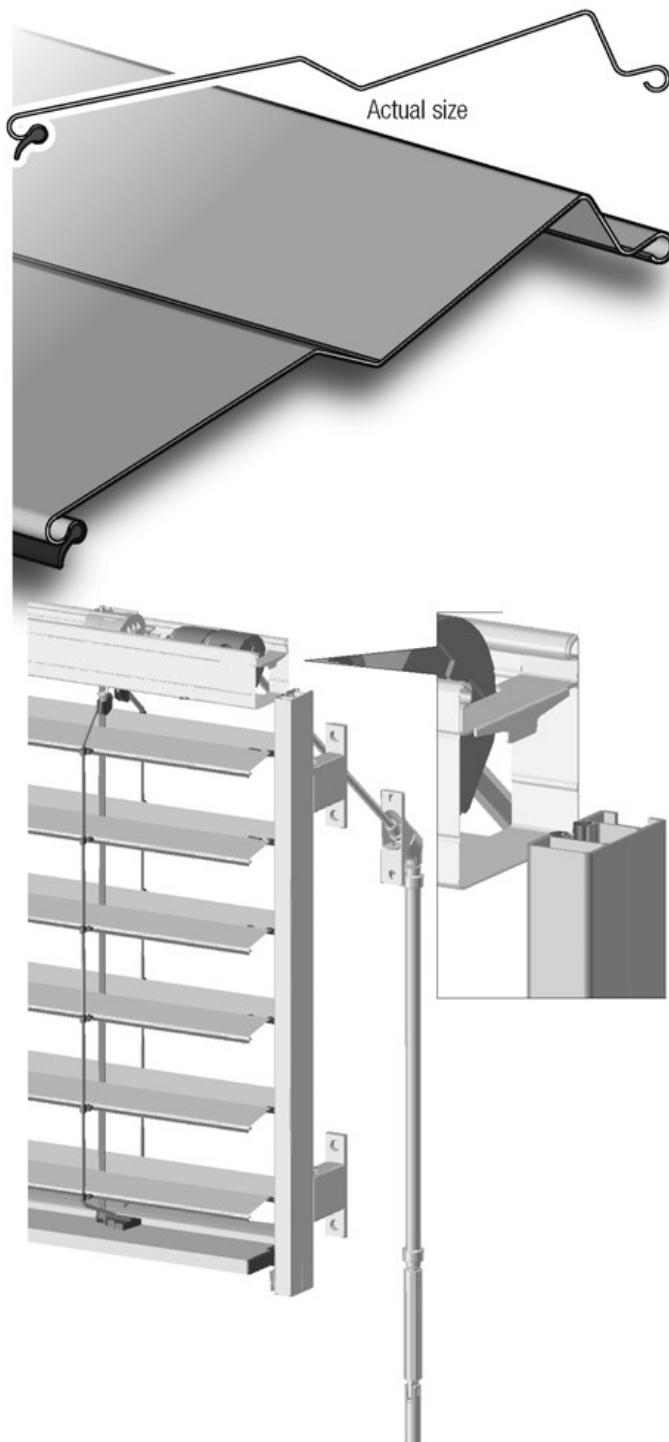
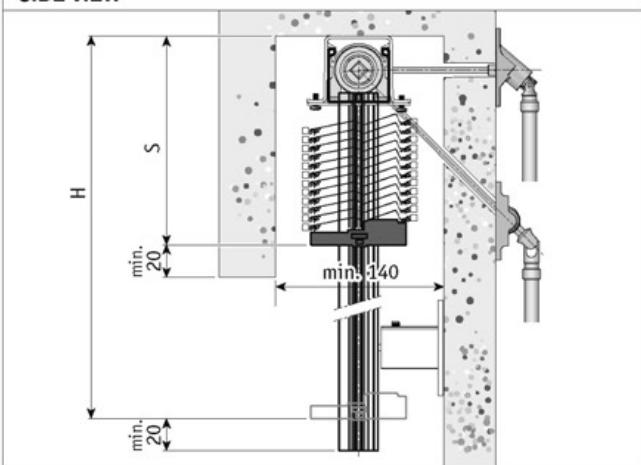
SIDE GUIDING PROFILE



SIDE TRACK BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|-----------------|--------------------|--------------------|---------------------|-----------------------------------|
| Single K 88 ASK | 50 | 400 | 400 | 10 |
| Group K 88 ASK | | 1000 | 400 | 10 |

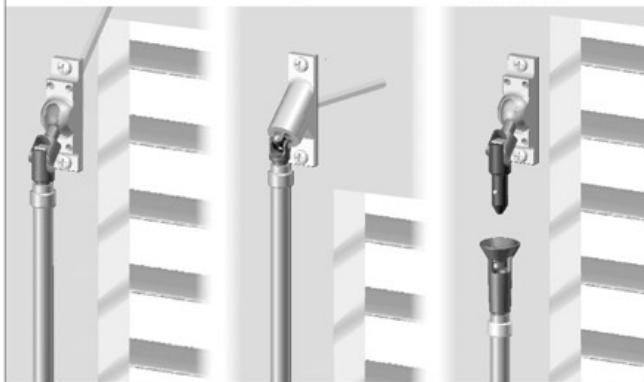
STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height K88ASK | Blind height H | Stacking height K88ASK |
|-------------------|---------------------------|-------------------|---------------------------|
| 1000 | 160 | 3000 | 290 |
| 1500 | 180 | 3500 | 325 |
| 2000 | 220 | 4000 | 360 |
| 2500 | 255 | | |

OPTIONS K88ASK

CRANK WAND

45° 90° detachable

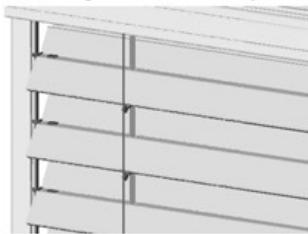


40° TIMER

Standard;
lowering with closed slats

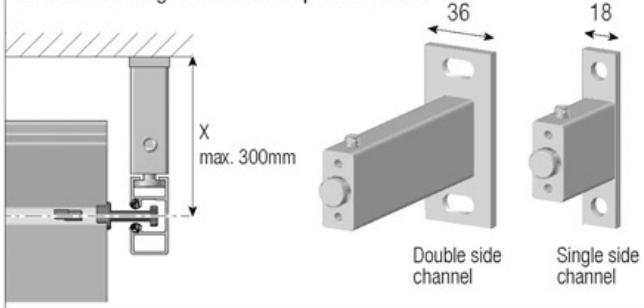


40° Timer;
lowering with slats 40° open

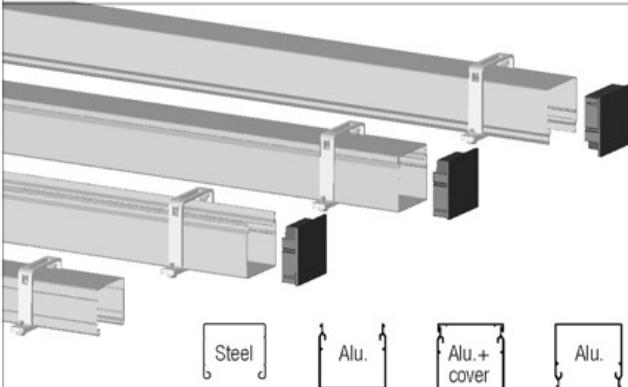


SIDE TRACK BRACKETS

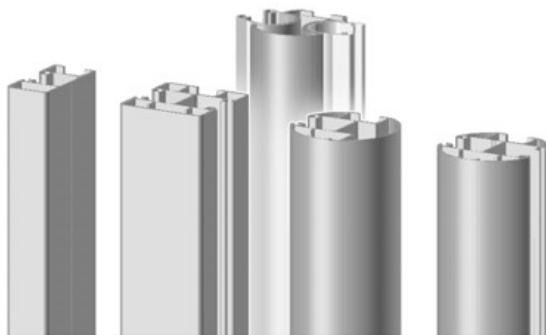
Sizes according to customer specifications.



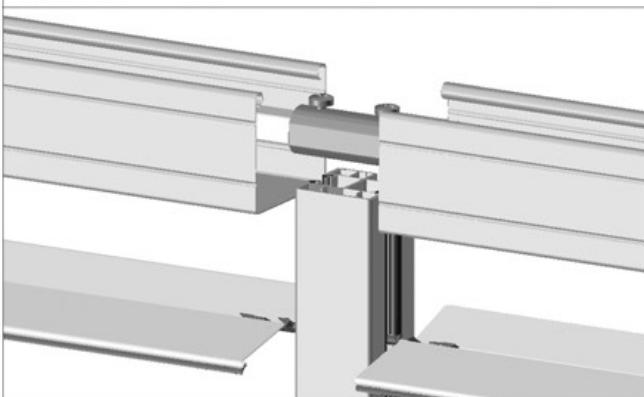
HEAD RAIL



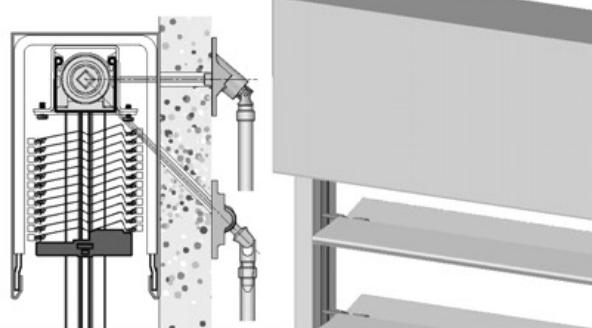
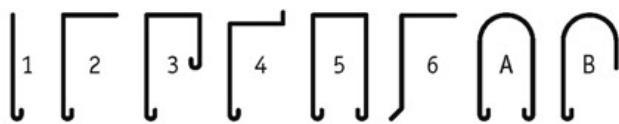
SIDE TRACKS



COUPLING



PELMET



FURTHER OPTIONS

(Additional information on page 73)

- Spindle stop
- Dual Light Control
- Perforated slats
- Free hanging system

EVB ELV88AS

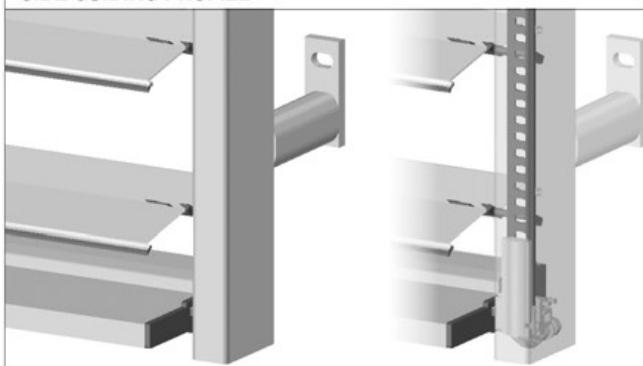
MOTOR OPERATED EXTERNAL VENETIAN BLIND 88 MM SLATS WITH SIDE GUIDING CHANNELS AND INTEGRATED LIFT TAPE

ELV88AS: Z-shaped beaded 88 mm slats with seal

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats open
- Roll formed coil coated 88 mm slats of partly recycled aluminium
- Beaded slat with inserted black seal to reduce contact noise and light leakage
- Natural anodised or powder coated extruded aluminium bottom rail 90 x 45 mm
- Extruded side guiding channels 26 x 44 mm with groove and integrated lifting tape in similar finish and black insert for noise reduction
- Black bottom rail end caps and lift tape
- Grey ball tape for good stacking of the slats
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

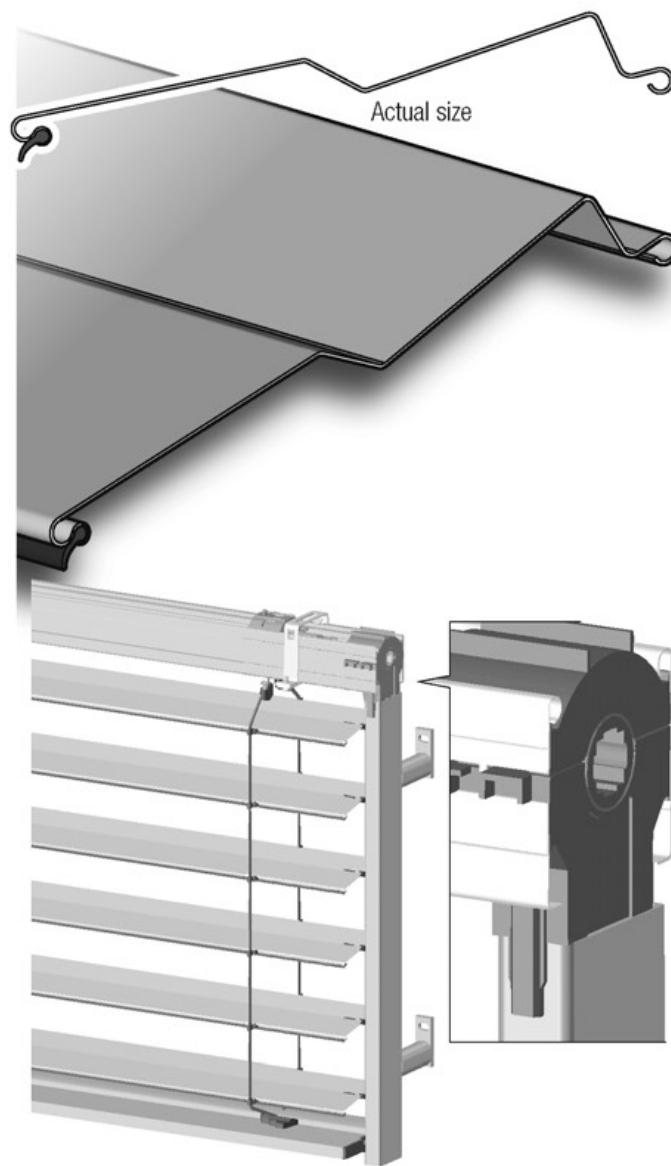
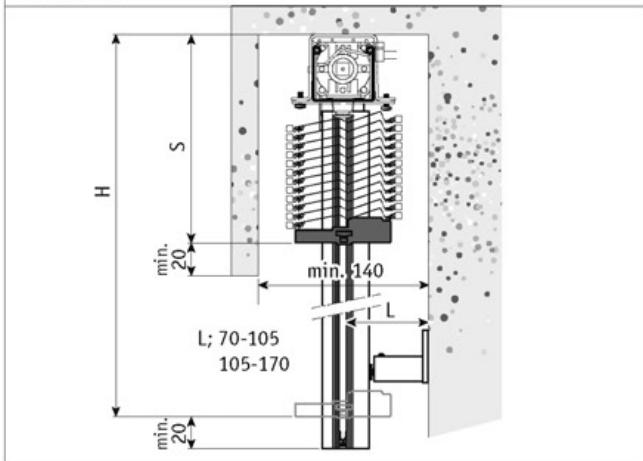
SIDE GUIDING PROFILE



SIDE TRACK BRACKET

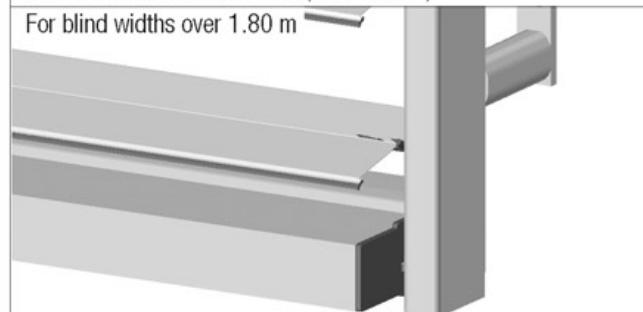


SIDE VIEW



HEAVY DUTY BOTTOM RAIL (90 x 45 mm)

For blind widths over 1.80 m



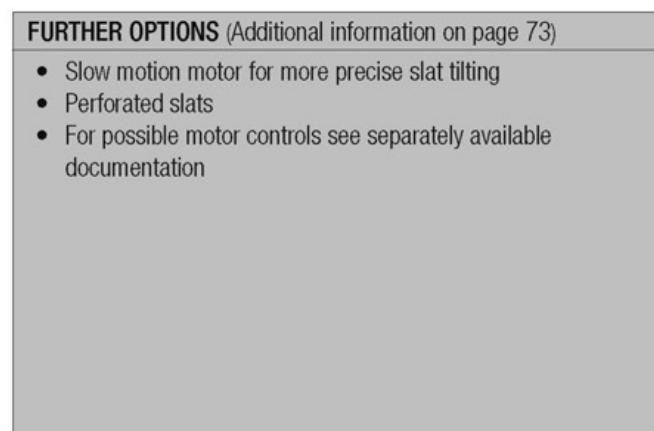
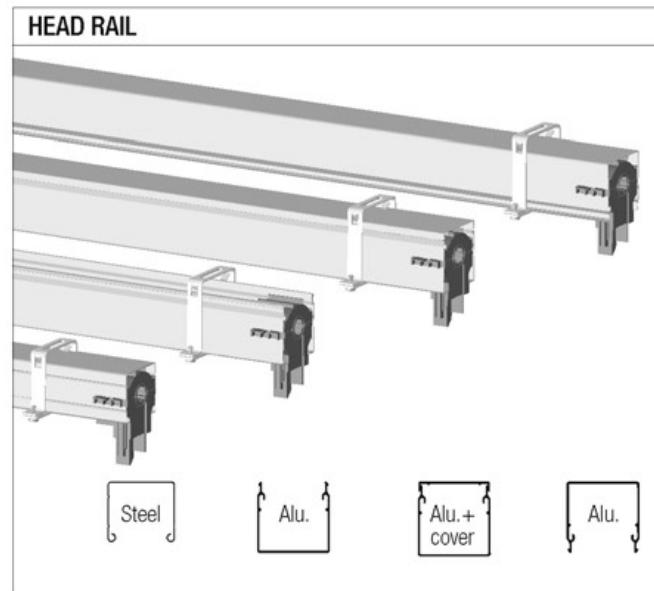
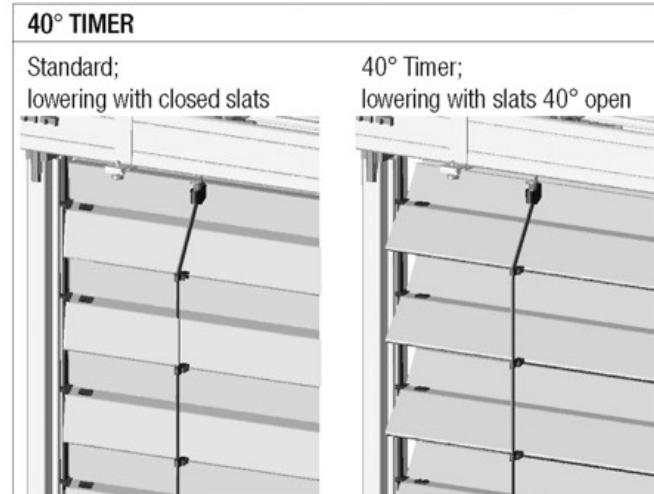
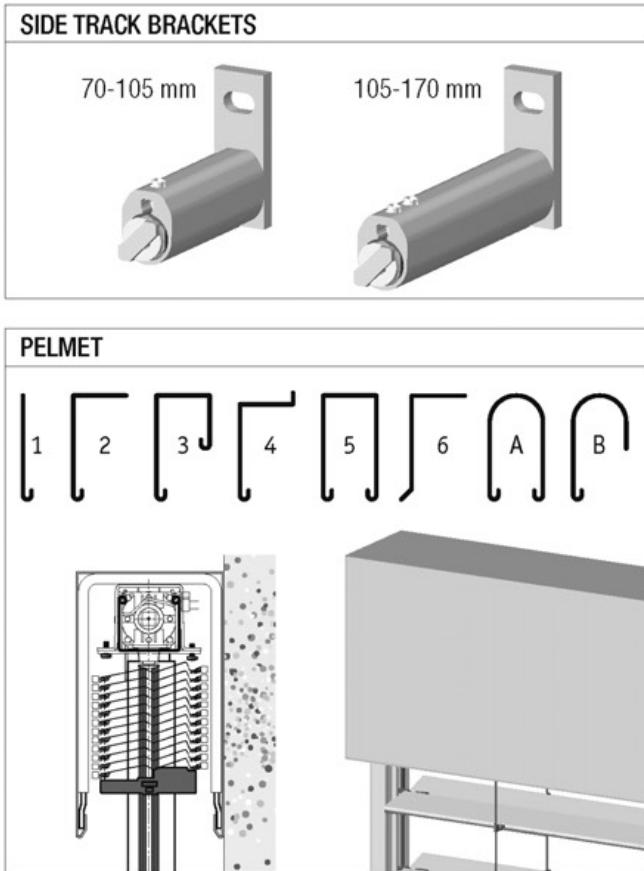
SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|----------|--------------------|--------------------|---------------------|-----------------------------------|
| ELV 88AS | 62 | 300 | 350 | 10 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height S | S with heavy duty bottomrail | Blind height H | Stacking height S | S with heavy duty bottomrail |
|-------------------|----------------------|------------------------------------|-------------------|----------------------|------------------------------------|
| 1000 | 200 | 220 | 2500 | 305 | 325 |
| 1500 | 235 | 255 | 3000 | 340 | 360 |
| 2000 | 270 | 290 | 3500 | 375 | 395 |

OPTIONS ELV88AS



EVB EL100AF

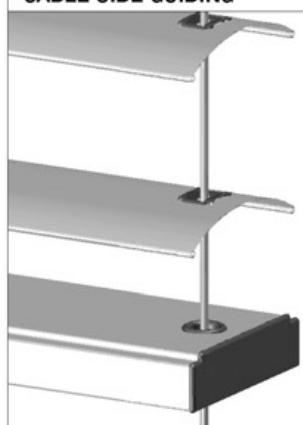
MOTOR OPERATED EXTERNAL VENETIAN BLIND 100 MM SLATS WITH SIDE GUIDING CABLES

EL100AF: flexible 100 mm slats

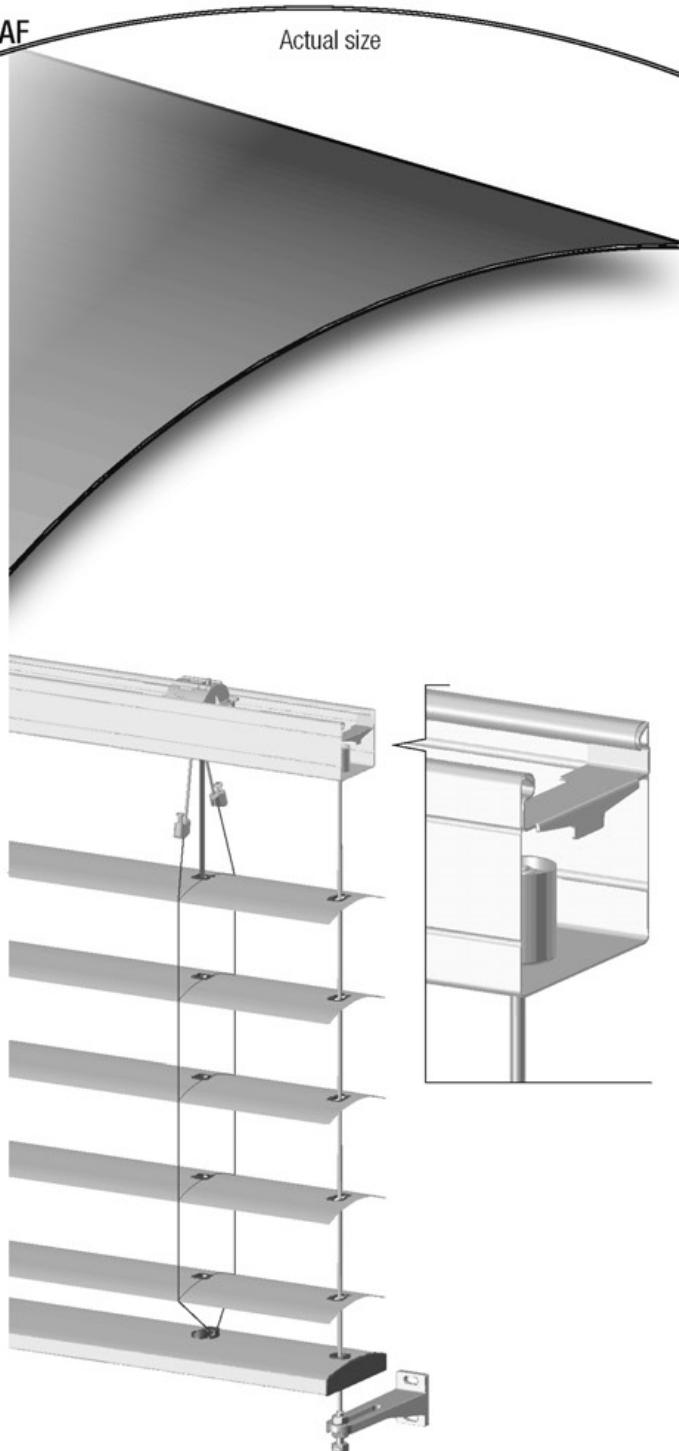
Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Thermally protected 230 V motor, dust and splash waterproof according to IP54
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 25° open
- Roll formed coil coated 100 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 100 x 20 mm
- Tensioned stainless steel cable Ø 3 mm with transparent Nylon jacket
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls

CABLE SIDE GUIDING



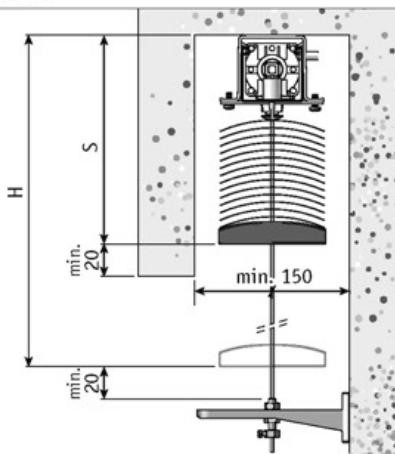
INTERMEDIATE GUIDING



GUIDE CABLE BRACKET



SIDE VIEW



SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|------------------|-----------------|-----------------|------------------|--------------------------------|
| Single EL 100 AF | 56 | 440 | 400 | 16 |
| Group EL 100 AF | | 1000 | 400 | 20 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height EL100AF | Blind height H | Stacking height EL100AF |
|----------------|-------------------------|----------------|-------------------------|
| 1000 | 130 | 3000 | 170 |
| 1500 | 140 | 3500 | 180 |
| 2000 | 150 | 4000 | 190 |
| 2500 | 160 | | |

OPTIONS EL100AF

GUIDE CABLE BRACKETS

2 sizes (X, mm);
67 - 133
124 - 173

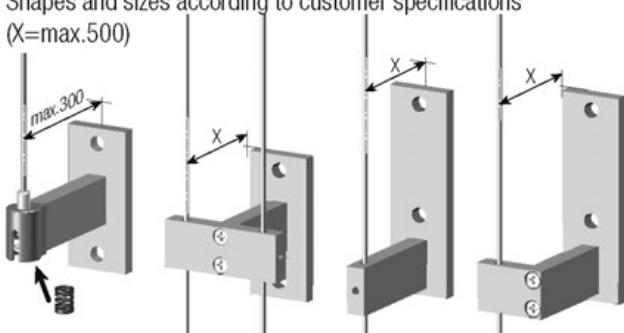


GUIDE CABLE BRACKETS, IDEFIX

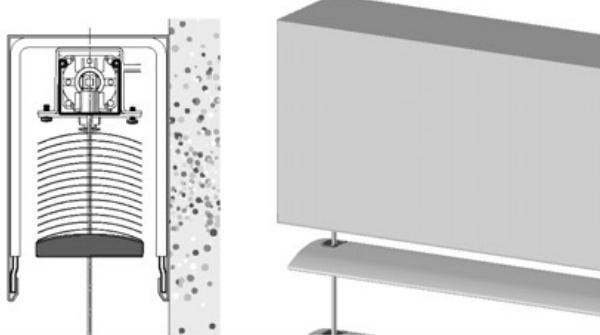
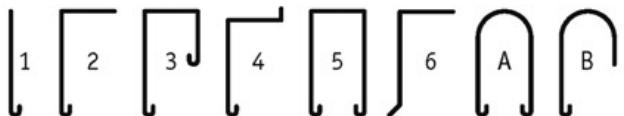


HEAVY DUTY CABLE BRACKETS

Shapes and sizes according to customer specifications
(X=max.500)



PELMET

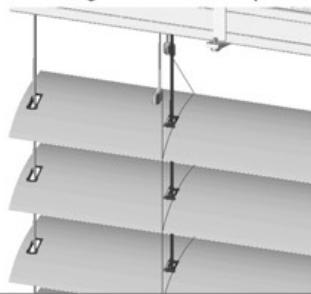


40° TIMER

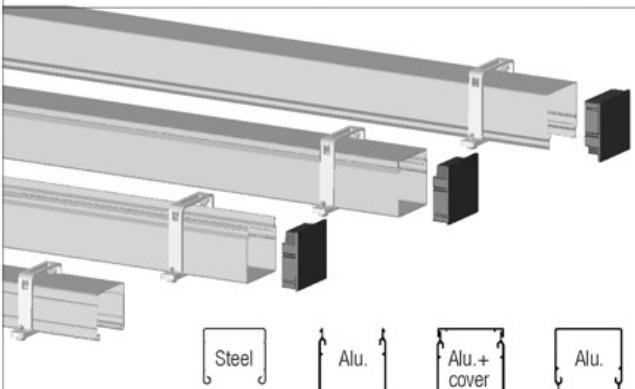
Standard;
lowering with closed slats



40° Timer;
lowering with slats 40° open



HEAD RAIL



COUPLING



FURTHER OPTIONS (Additional information on page 73)

- Dual Light Control
- Slow motion motor for more precise slat tilting
- Perforated slats
- Additional guiding cable(s)
- For possible motor controls see separately available documentation

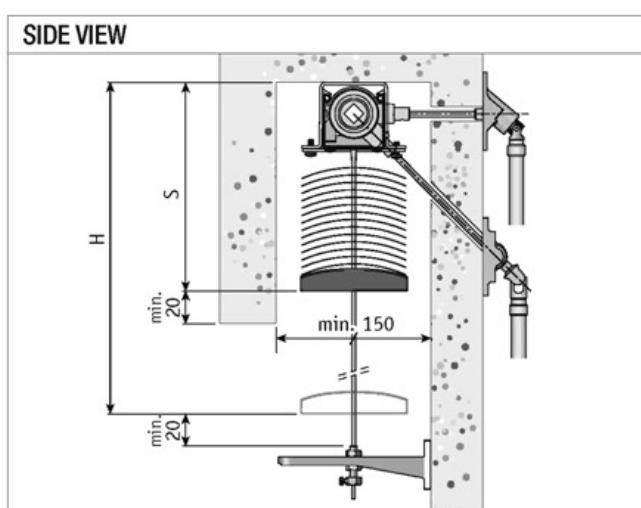
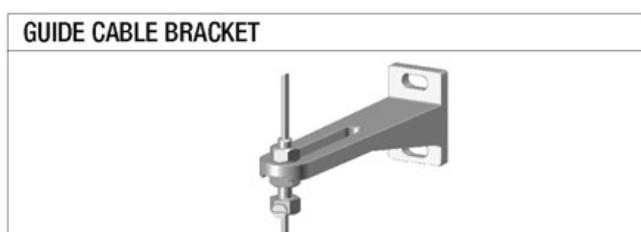
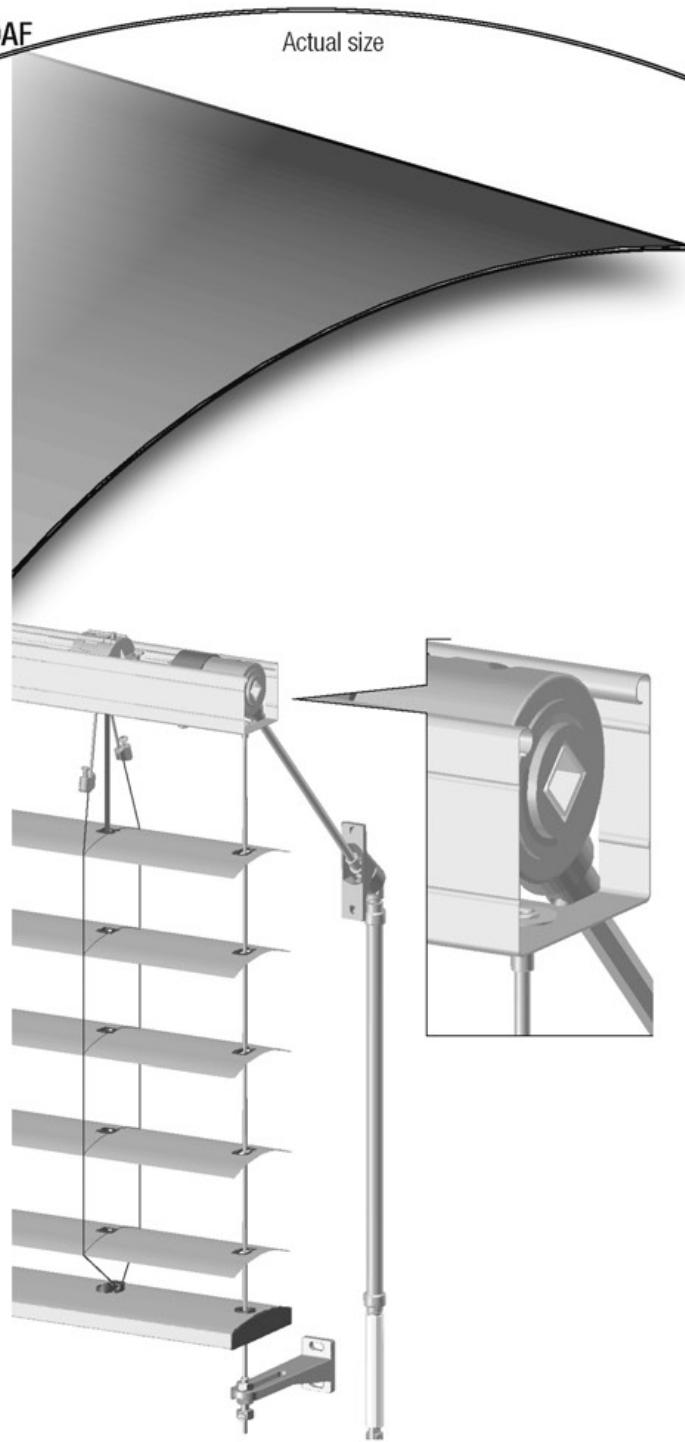
EVB K100AF

CRANK OPERATED EXTERNAL VENETIAN BLIND
100 MM SLATS WITH SIDE GUIDING CABLES

K100AF: flexible 100 mm slats

Description

- Roll formed zinc-plated steel U-shaped head rail 57 x 51 mm
- Fixed 15 mm crank wand on the inside
- Positive tilting mechanism to prevent slat movement by wind
- Lowering with slats closed, raising with slats 25° open
- Roll formed coil coated 100 mm slats of partly recycled aluminium
- Natural anodised or powder coated extruded aluminium bottom rail 100 x 20 mm
- Tensioned stainless steel cable Ø 3 mm with transparent Nylon jacket
- Black bottom rail end caps, lift tape and Aramid reinforced polyester ladder cords
- UV and weather resistant components of mixed composition
- Wind stable as further determined by size and controls



SIZE LIMITATIONS

| | Width min. (cm) | Width max. (cm) | Height max. (cm) | Surface max. (m ²) |
|-----------------|-----------------|-----------------|------------------|--------------------------------|
| Single K 100 AF | 45 | 440 | 400 | 12 |
| Group K 100 AF | | 1000 | 400 | 12 |

STACKING HEIGHT (MM) (intermediate blind heights on page 77)

| Blind height H | Stacking height K100AF | Blind height H | Stacking height K100AF |
|----------------|------------------------|----------------|------------------------|
| 1000 | 120 | 3000 | 160 |
| 1500 | 130 | 3500 | 170 |
| 2000 | 140 | 4000 | 180 |
| 2500 | 150 | | |

OPTIONS K100AF

CRANK WAND

45° 90° detachable

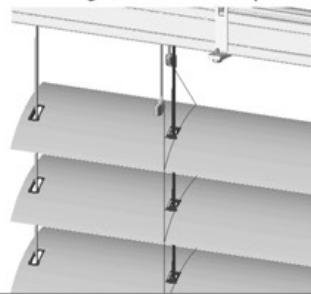


40° TIMER

Standard;
lowering with closed slats



40° Timer;
lowering with slats 40° open



GUIDE CABLE BRACKETS

2 sizes (X, mm);
67 - 133
124 - 173

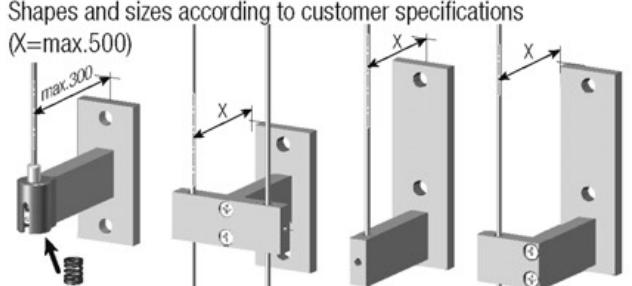


GUIDE CABLE BRACKETS, IDEFIX

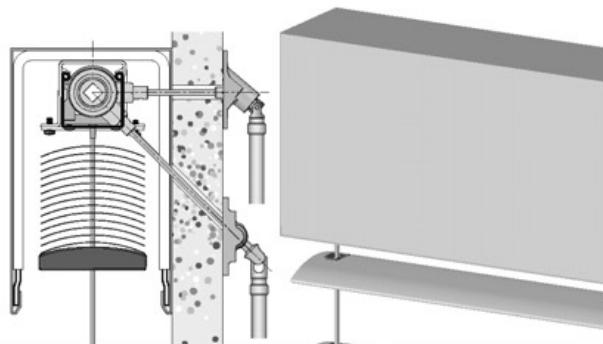
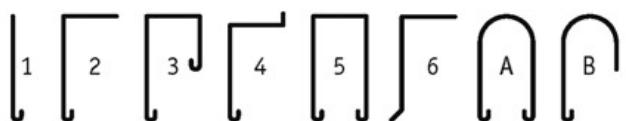


HEAVY DUTY CABLE BRACKETS

Shapes and sizes according to customer specifications
(X=max.500)



PELMET



COUPLING



FURTHER OPTIONS

(Additional information on page 73)

- Spindle stop
- Dual Light Control
- Perforated slats
- Additional guiding cable(s)

Additional Information

EXTERNAL VENETIAN BLINDS

CONTENT

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Dimensional restrictions 75

Stacking height 77

Wind load 78

Coupling 79

Crank 82

Click 83

Free hanging 84

Dual Light Control 85

SOLUTION FOR ESCAPE AND RESCUE ROUTES:

Lockable bottom rail 86

Quick Raise Spring Operated 87

Quick Raise Motorised 88

Building physics 90

Dimensional restrictions

EXTERNAL VENETIAN BLINDS

| EVB type | slat width (mm) | operation | side guiding | Dimensional restrictions | | | | | |
|------------|-----------------|-----------|--|--------------------------|-------------------|--------------------|----------------------------------|-------------------|--------------------|
| | | | | Single installation | | | Coupled installation | | |
| | | | | width min (cm) | width max (cm) | height max (cm) | surface max (m ²) | width max (cm) | height max (cm) |
| EL 50 AF | 50 | motor | cable | 51 | 400 | 400 | 16 | 800 | 400 |
| K 50 AF | 50 | crank | cable | 45 | 400 | 400 | 12 | 800 | 400 |
| EL 60 A | 60 | motor | cable | 51 | 500 | 450 | 16 | 1000 | 450 |
| EL 60 AN | 60 | motor | cable | 99 | 220 | 275 | 6 | - | - |
| EL 60 AF | 60 flexible | motor | cable | 51 | 500 | 400 | 16 | 1000 | 400 |
| EL 60 AFN | 60 flexible | motor | cable | 99 | 220 | 275 | 6 | - | - |
| K 60 A | 60 | crank | cable | 45 | 500 | 450 | 12 | 1000 | 450 |
| K 60 AF | 60 flexible | crank | cable | 45 | 500 | 400 | 12 | 1000 | 400 |
| EL 60 AS | 60 | motor | standard channels | 58 | 500 | 400 | 16 | 1000 | 400 |
| EL 60 ASN | 60 | motor | standard channels | 99 | 220 | 275 | 6 | - | - |
| EL 60 ASF | 60 flexible | motor | standard channels | 58 | 300 | 400 | 12 | 1000 | 400 |
| K 60 AS | 60 | crank | standard channels | 52 | 500 | 400 | 12 | 1000 | 400 |
| K 60 ASF | 60 flexible | crank | standard channels | 52 | 300 | 400 | 12 | 900 | 400 |
| EL 60 ASC | 60 | motor | click | 78 | 350 | 400 | 12 | - | - |
| EL 60 ASCF | 60 flexible | motor | click | 78 | 350 | 400 | 12 | - | - |
| EL 60 ASS | 60 | motor | push-on guiding channels | 56 | 300 | 250 | 7 | 1000 | 250 |
| EL 60 ASSF | 60 flexible | motor | push-on guiding channels | 56 | 300 | 250 | 7 | 1000 | 250 |
| K 60 ASS | 60 | crank | push-on guiding channels | 50 | 300 | 250 | 7 | 1000 | 250 |
| K 60 ASSF | 60 flexible | crank | push-on guiding channels | 50 | 300 | 250 | 7 | 1000 | 250 |
| EL 60 ASK | 60 | motor | guiding mounted with clamping brackets | 56 | 500 | 400 | 16 | 1000 | 400 |
| EL 60 ASKN | 60 | motor | guiding mounted with clamping brackets | 99 | 220 | 275 | 6 | - | - |
| EL 60 ASKF | 60 flexible | motor | guiding mounted with clamping brackets | 56 | 300 | 400 | 12 | 1000 | 400 |
| K 60 ASK | 60 | crank | guiding mounted with clamping brackets | 50 | 500 | 400 | 12 | 1000 | 400 |
| K 60 ASKF | 60 flexible | crank | guiding mounted with clamping brackets | 50 | 300 | 400 | 12 | 1000 | 400 |
| EL 80 A | 80 | motor | cable | 51 | 500 | 450 | 16 | 1000 | 450 |
| EL 80 AN | 80 | motor | cable | 99 | 220 | 275 | 6 | - | - |
| EL 80 AF | 80 flexible | motor | cable | 51 | 500 | 400 | 16 | 1000 | 400 |
| EL 80 AFN | 80 flexible | motor | cable | 99 | 220 | 275 | 6 | - | - |
| K 80 A | 80 | crank | cable | 45 | 500 | 450 | 12 | 1000 | 450 |
| K 80 AF | 80 flexible | crank | cable | 45 | 500 | 400 | 12 | 1000 | 400 |
| EL 80 AS | 80 | motor | standard channels | 58 | 500 | 400 | 16 | 1000 | 400 |
| EL 80 ASN | 80 | motor | standard channels | 99 | 220 | 275 | 6 | - | - |
| EL 80 ASF | 80 flexible | motor | standard channels | 58 | 300 | 400 | 12 | 1000 | 400 |

| EVB type | slat width (mm) | operation | side guiding | Dimensional restrictions | | | | | |
|------------|-----------------|-----------|--|--------------------------|-------------------|--------------------|----------------------------------|-------------------|--------------------|
| | | | | Single installation | | | Coupled installation | | |
| | | | | width min (cm) | width max (cm) | height max (cm) | surface max (m ²) | width max (cm) | height max (cm) |
| K 80 AS | 80 | crank | standard channels | 52 | 500 | 400 | 12 | 1000 | 400 |
| K 80 ASF | 80 flexible | crank | standard channels | 52 | 300 | 400 | 12 | 1000 | 400 |
| EL 80 ASC | 80 | motor | click | 78 | 350 | 400 | 12 | - | - |
| EL 80 ASCF | 80 flexible | motor | click | 78 | 350 | 400 | 12 | - | - |
| EL 80 ASS | 80 | motor | push-on guiding channels | 56 | 300 | 250 | 7 | 1000 | 250 |
| EL 80 ASSF | 80 flexible | motor | push-on guiding channels | 56 | 300 | 250 | 7 | 1000 | 250 |
| K 80 ASS | 80 | crank | push-on guiding channels | 50 | 300 | 250 | 7 | 1000 | 250 |
| K 80 ASSF | 80 flexible | crank | push-on guiding channels | 50 | 300 | 250 | 7 | 1000 | 250 |
| EL 80 ASK | 80 | motor | guiding mounted with clamping brackets | 56 | 500 | 400 | 16 | 1000 | 400 |
| EL 80 ASKW | 80 | motor | guiding mounted with clamping brackets | 76 | 300 | 300 | 6 | 900 | 300 |
| EL 80 ASKN | 80 | motor | guiding mounted with clamping brackets | 99 | 220 | 275 | 6 | - | - |
| EL 80 ASKF | 80 flexible | motor | guiding mounted with clamping brackets | 56 | 300 | 400 | 12 | 1000 | 400 |
| K 80 ASK | 80 | crank | guiding mounted with clamping brackets | 50 | 500 | 400 | 12 | 1000 | 400 |
| K 80 ASKF | 80 flexible | crank | guiding mounted with clamping brackets | 50 | 300 | 400 | 12 | 1000 | 400 |
| EL 88 AS | 88 | motor | standard channels | 58 | 400 | 400 | 12 | 1000 | 400 |
| K 88 AS | 88 | crank | standard channels | 52 | 400 | 400 | 10 | 1000 | 400 |
| EL 88 ASC | 88 | motor | click | 78 | 350 | 400 | 12 | - | - |
| EL 88 ASS | 88 | motor | push-on guiding channels | 56 | 300 | 250 | 7 | 1000 | 250 |
| K 88 ASS | 88 | crank | push-on guiding channels | 50 | 300 | 250 | 7 | 1000 | 250 |
| EL 88 ASK | 88 | motor | guiding mounted with clamping brackets | 56 | 400 | 400 | 12 | 1000 | 400 |
| K 88 ASK | 88 | crank | guiding mounted with clamping brackets | 50 | 400 | 400 | 10 | 1000 | 400 |
| ELV 88 AS | 88 | motor | standard channels | 62 | 300 | 350 | 10 | - | - |
| EL 100 AF | 100 flexible | motor | cable | 56 | 440 | 400 | 16 | 1000 | 400 |
| K 100 AF | 100 flexible | crank | cable | 45 | 440 | 400 | 12 | 1000 | 400 |

Stacking height

EXTERNAL VENETIAN BLINDS

The table shows bundle indicative height dimension (=stacking height S) for motor operated blinds. For crank operated blinds the bundle height is 10 mm less. Add at least 20 mm tolerance to indicated bundle heights for pelmet heights and pre-fabricated cavities.

Add 10 mm / meter product height for blinds with 80 mm slats with inserts.

Add 15 mm for the stacking height for the option freehanging systems.

Add 20 mm for the stacking height for the quick raise systems.

| Blind height incl. headrail bracket (mm) | 50 mm slats | 60 mm slats | 60 mm slats wflexible (with guiding eyelet flex) | 80 mm slats | 80 mm slats flexible (with guiding eyelet flex) | 88 mm slats | 88 mm slats (lift tape inside guiding channels) | 88 mm slats (lift tape inside guiding channels) heavy duty bottomrail | 100 mm flexible (with guiding eyelet flex) | | |
|--|-------------|-------------|--|-------------|---|-------------|---|---|--|-----|-----|
| | cable | profile | | cable | profile | | | | | | |
| 1000 | 127 | 183 | 142 | 164 | 173 | 133 | 153 | 170 | 200 | 220 | 130 |
| 1100 | 130 | 192 | 147 | 169 | 179 | 138 | 156 | 174 | 207 | 227 | 132 |
| 1200 | 132 | 200 | 151 | 171 | 185 | 142 | 159 | 178 | 214 | 234 | 134 |
| 1300 | 135 | 208 | 155 | 173 | 191 | 146 | 163 | 182 | 221 | 241 | 136 |
| 1400 | 137 | 215 | 160 | 175 | 197 | 150 | 169 | 186 | 228 | 248 | 138 |
| 1500 | 140 | 222 | 164 | 177 | 202 | 155 | 174 | 190 | 235 | 255 | 140 |
| 1600 | 142 | 230 | 168 | 179 | 209 | 160 | 176 | 196 | 242 | 262 | 142 |
| 1700 | 145 | 237 | 172 | 181 | 215 | 163 | 180 | 202 | 249 | 269 | 144 |
| 1800 | 147 | 245 | 176 | 183 | 222 | 166 | 183 | 208 | 256 | 276 | 146 |
| 1900 | 150 | 253 | 180 | 185 | 228 | 169 | 186 | 214 | 263 | 283 | 148 |
| 2000 | 152 | 260 | 185 | 201 | 234 | 172 | 189 | 230 | 270 | 290 | 150 |
| 2100 | 155 | 268 | 188 | 207 | 240 | 175 | 194 | 237 | 277 | 297 | 152 |
| 2200 | 157 | 276 | 192 | 218 | 246 | 178 | 199 | 244 | 284 | 304 | 154 |
| 2300 | 160 | 283 | 196 | 224 | 252 | 180 | 201 | 251 | 291 | 311 | 156 |
| 2400 | 162 | 290 | 200 | 230 | 258 | 183 | 204 | 258 | 298 | 318 | 158 |
| 2500 | 165 | 297 | 205 | 236 | 263 | 185 | 211 | 265 | 305 | 325 | 160 |
| 2600 | 167 | 305 | 209 | 238 | 270 | 188 | 216 | 272 | 312 | 332 | 162 |
| 2700 | 170 | 313 | 214 | 244 | 276 | 190 | 219 | 279 | 319 | 339 | 164 |
| 2800 | 172 | 325 | 217 | 246 | 282 | 193 | 224 | 286 | 326 | 346 | 166 |
| 2900 | 175 | 333 | 221 | 255 | 288 | 195 | 227 | 293 | 333 | 353 | 168 |
| 3000 | 177 | 340 | 225 | 260 | 294 | 197 | 232 | 300 | 340 | 360 | 170 |
| 3100 | 180 | 348 | 229 | 262 | 300 | 200 | 235 | 307 | 347 | 367 | 172 |
| 3200 | 183 | 356 | 232 | 266 | 306 | 202 | 238 | 314 | 354 | 374 | 174 |
| 3300 | 186 | 364 | 236 | 270 | 312 | 205 | 243 | 321 | 361 | 381 | 176 |
| 3400 | 189 | 372 | 239 | 274 | 318 | 208 | 246 | 328 | 368 | 388 | 178 |
| 3500 | 192 | 380 | 242 | 277 | 324 | 210 | 250 | 335 | 375 | 395 | 180 |
| 3600 | 195 | 388 | 245 | 281 | 330 | 213 | 256 | 342 | | | 182 |
| 3700 | 198 | 396 | 248 | 285 | 336 | 215 | 259 | 349 | | | 184 |
| 3800 | 201 | 404 | 250 | 288 | 342 | 218 | 261 | 356 | | | 186 |
| 3900 | 204 | 412 | 253 | 292 | 348 | 220 | 264 | 363 | | | 188 |
| 4000 | 207 | 420 | 256 | 296 | 354 | 222 | 267 | 370 | | | 190 |
| 4100 | | 428 | | | 361 | | | | | | |
| 4200 | | 436 | | | 368 | | | | | | |
| 4300 | | 444 | | | 375 | | | | | | |
| 4400 | | 452 | | | 381 | | | | | | |
| 4500 | | 460 | | | 387 | | | | | | |

Wind load

EXTERNAL VENETIAN BLINDS

WIND LIMITS

For External Venetian Blinds the use of wind limits is recommended depending on the product. If the limits are reached, the system must be retracted.

The table can be used for External Venetian Blinds with: Distance to the facade \leq 100 mm

Slat thickness \geq 0.4 mm

Blind height \leq 2400 mm

| Width (mm) | Beaded slats with side guiding (m/s) | Beaded slats with cable guiding (m/s) | Flexible slats with side guiding (m/s) | Flexible slats with cable guiding (m/s) |
|---------------|---|--|---|--|
| 1500 | 17 | 17 | 17 | 17 |
| 2000 | 17 | 17 | 13 | 13 |
| 2500 | 17 | 13 | 13 | 13 |
| 3000 | 17 | 13 | 13 | 13 |
| 4000 | 13 | 13 | 10 | 10 |
| 5000 | 13 | 13 | 10 | 10 |

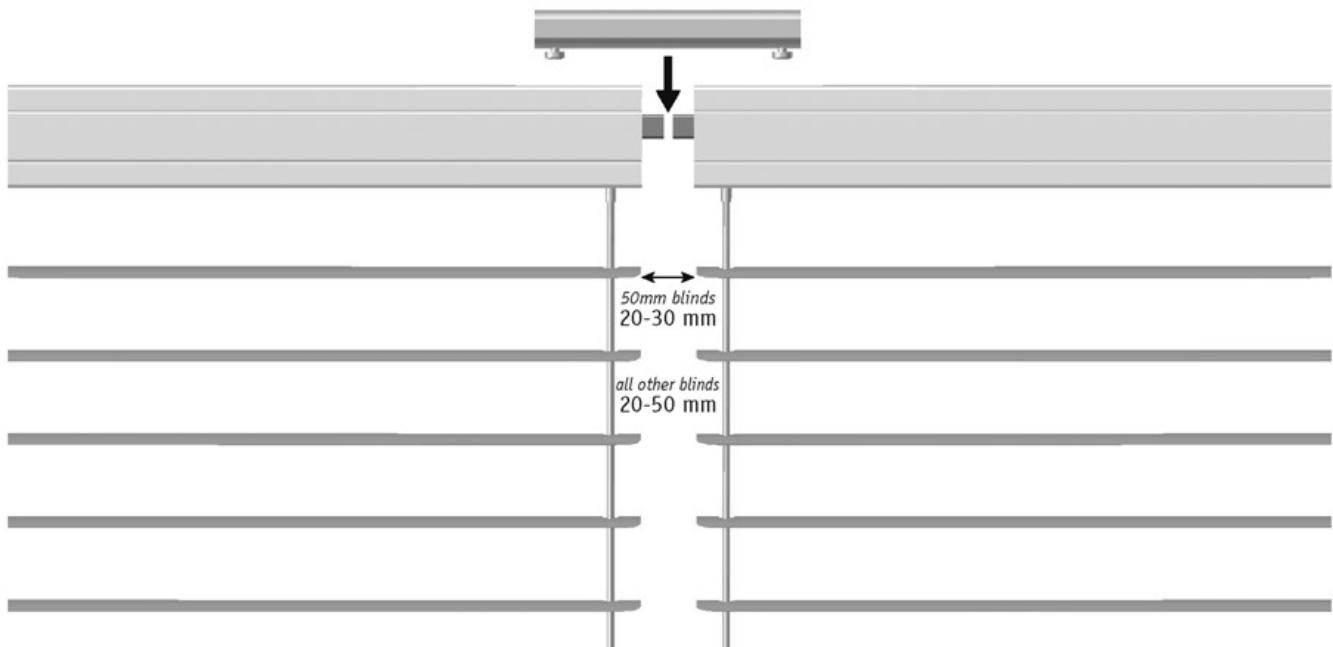
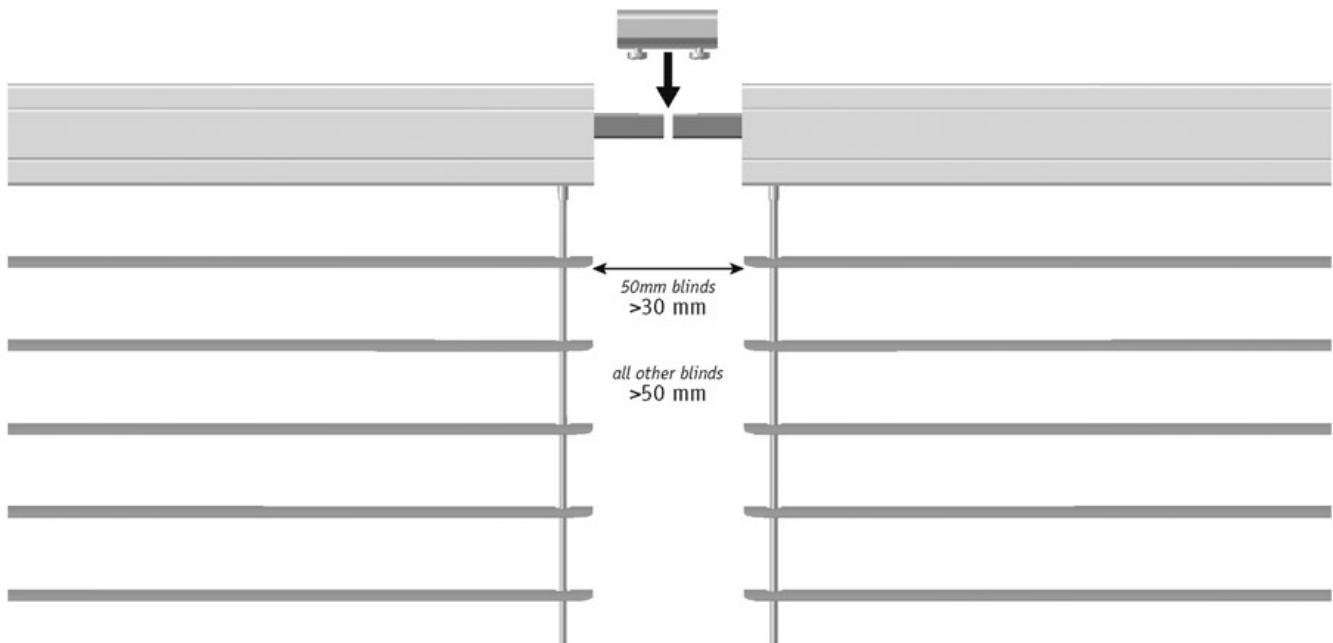
Attention!

- 100 mm < Distance to the facade \leq 300 mm, reduce the allowable wind force by 4 m/s
- 300 mm < Distance to the facade \leq 500 mm, reduce the allowable wind force by 7 m/s
- Distance to the facade $>$ 500 mm, the table is not valid
- Slat thickness $<$ 0.4 mm, reduce the allowable wind force by 4 m/st
- 2400 mm < Blind height \leq 4000 mm with tension cables, reduce the allowable wind force by 4 m/s
- Blind height $>$ 4000 mm with tension cables, reduce the allowable wind force by 7 m/s

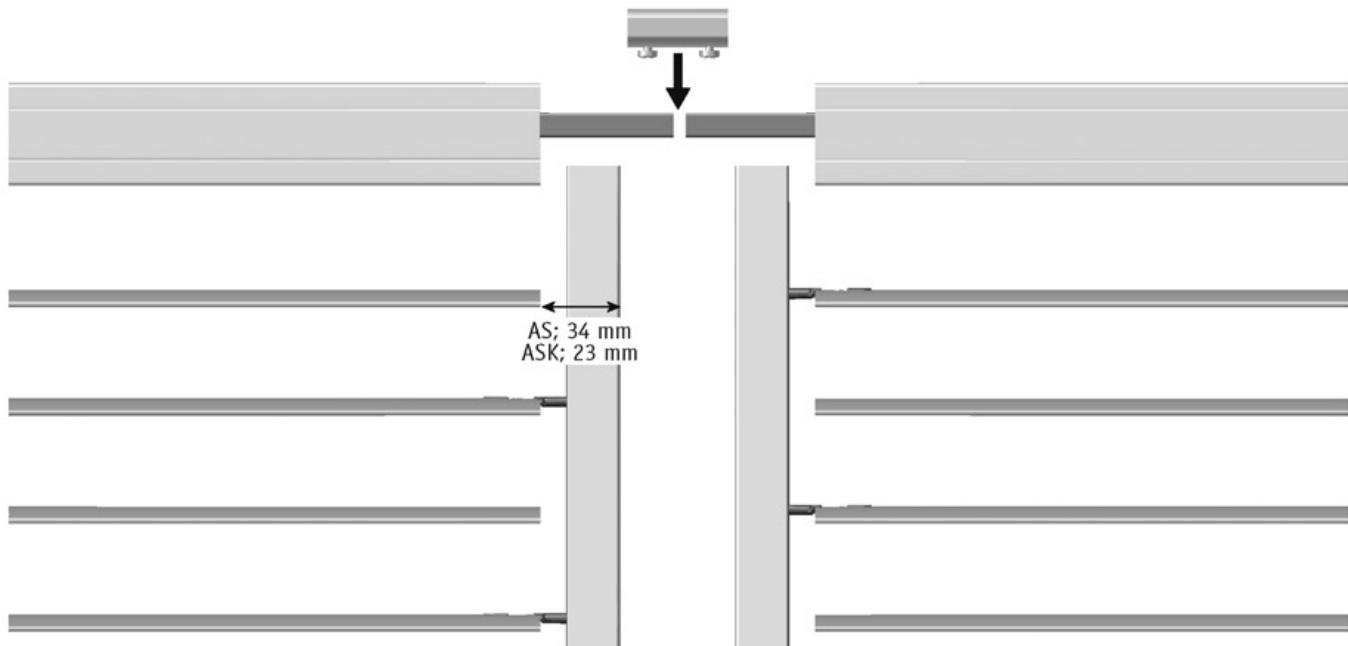
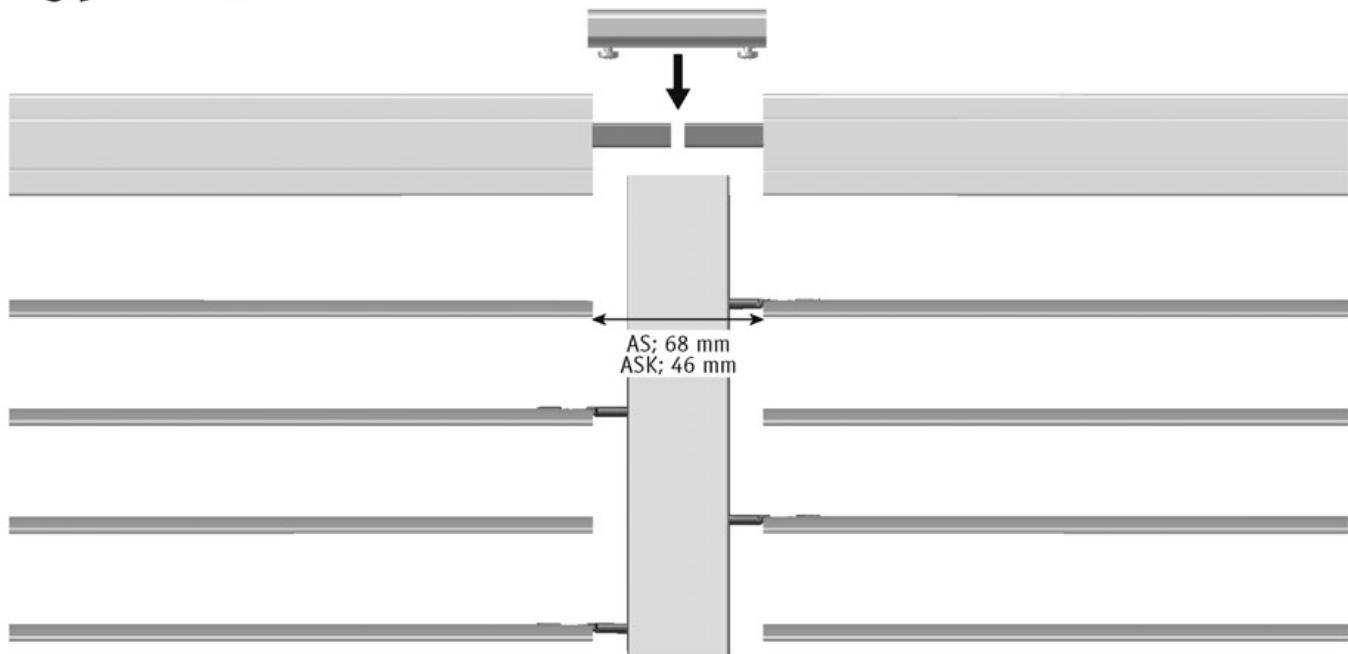
Coupling

EXTERNAL VENETIAN BLINDS

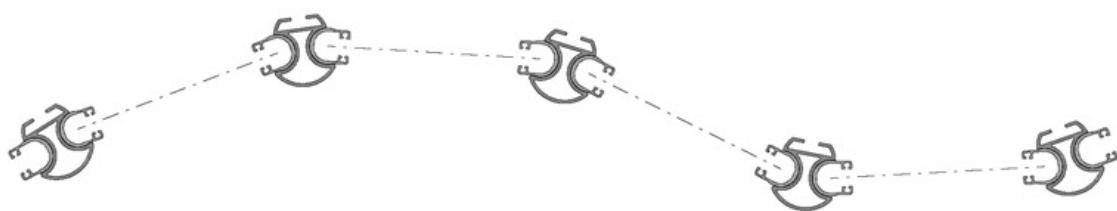
Type A



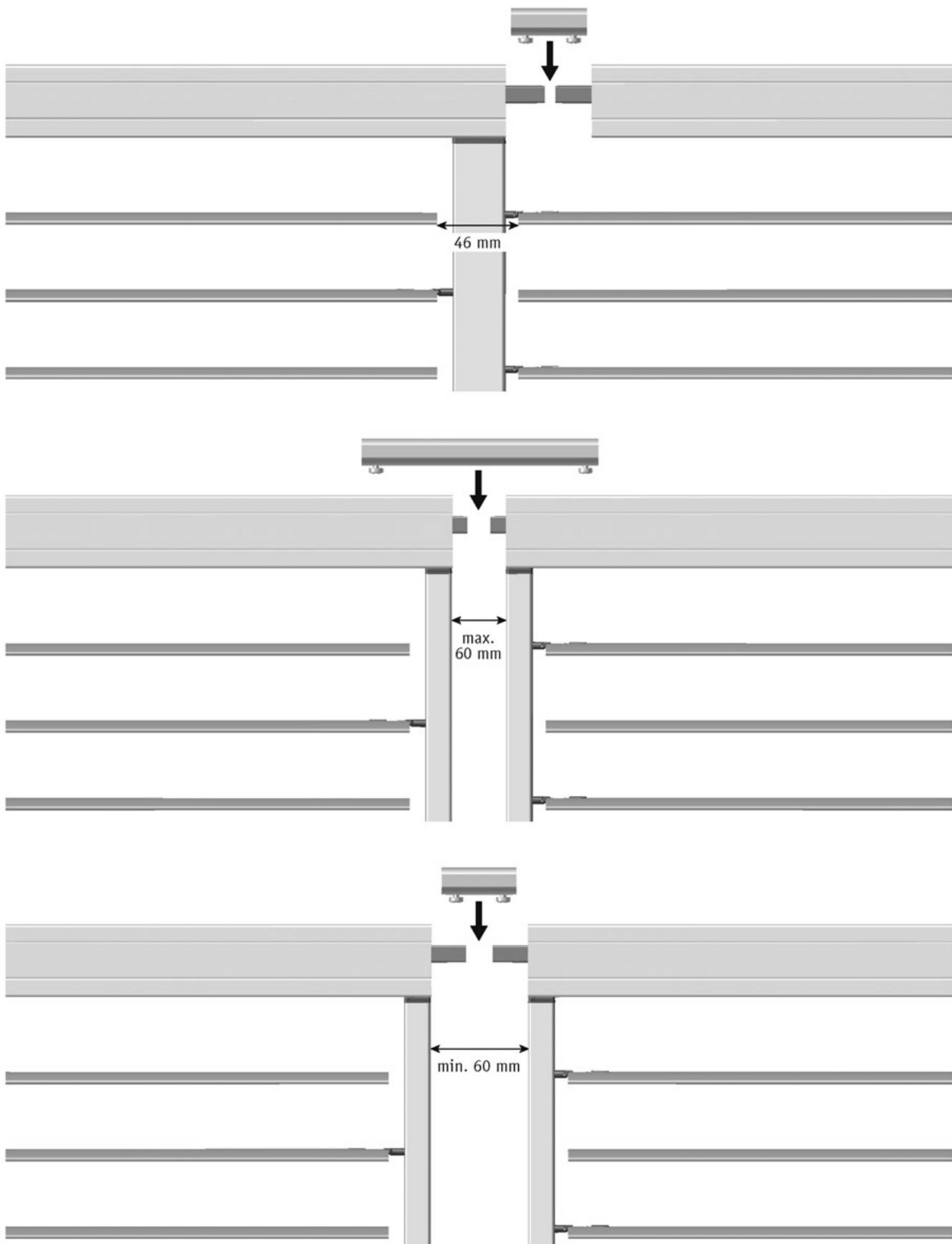
Type AS, ASK



ASK for curved facades



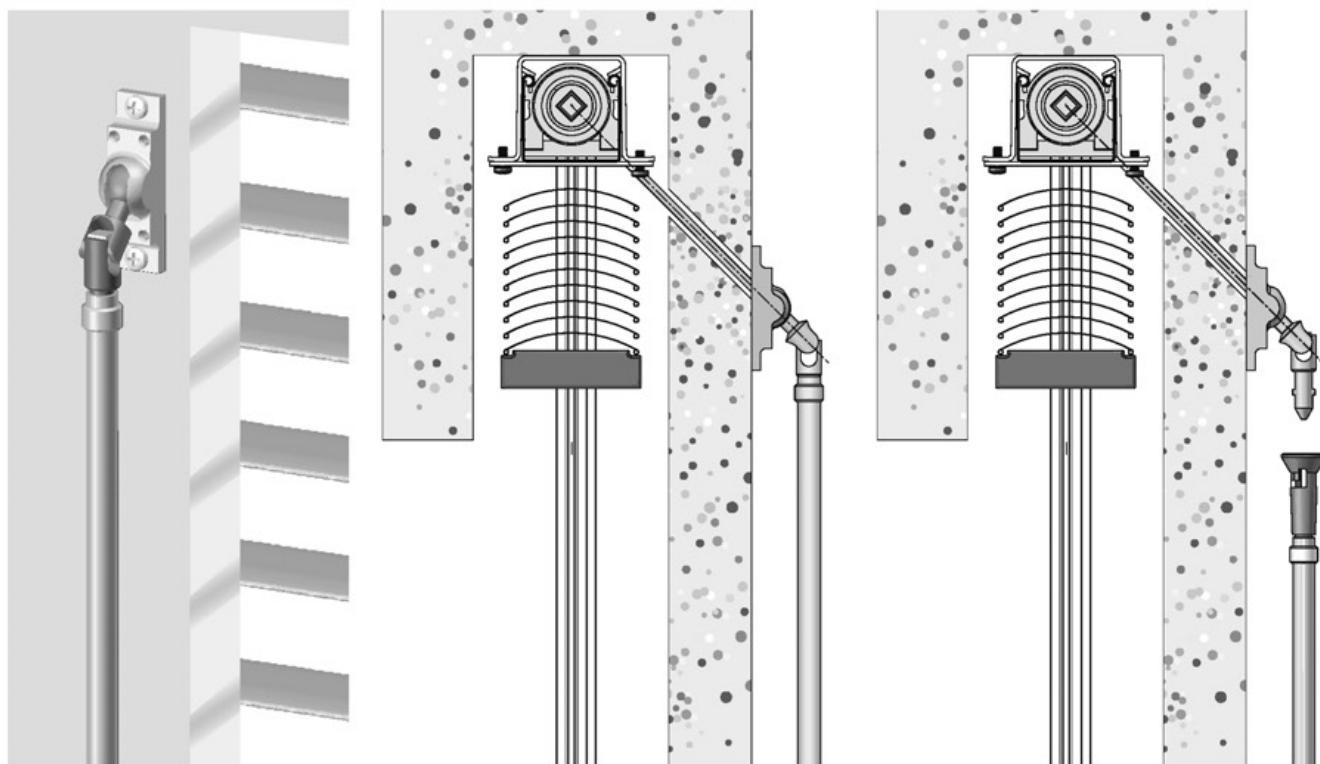
Type ASS



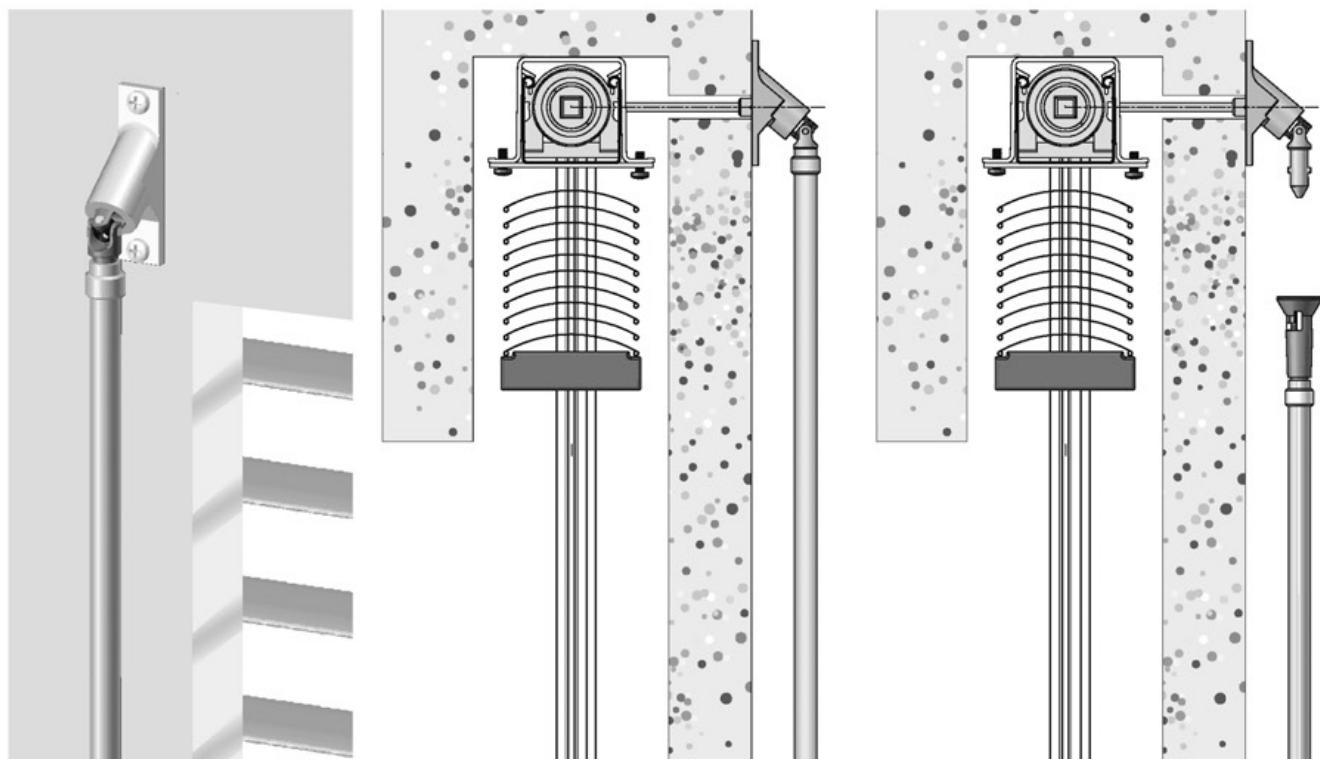
Crank

EXTERNAL VENETIAN BLINDS

45°

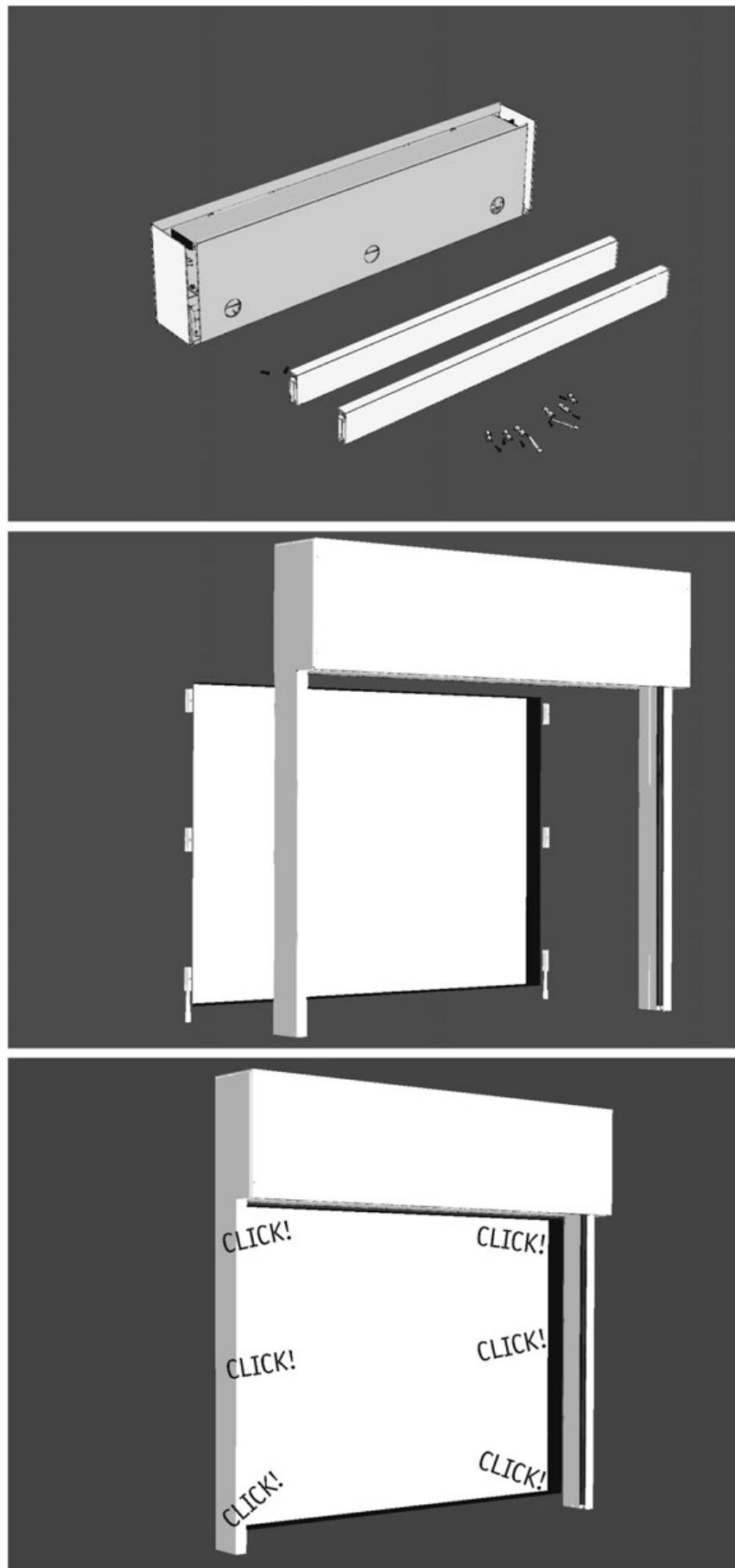


90°



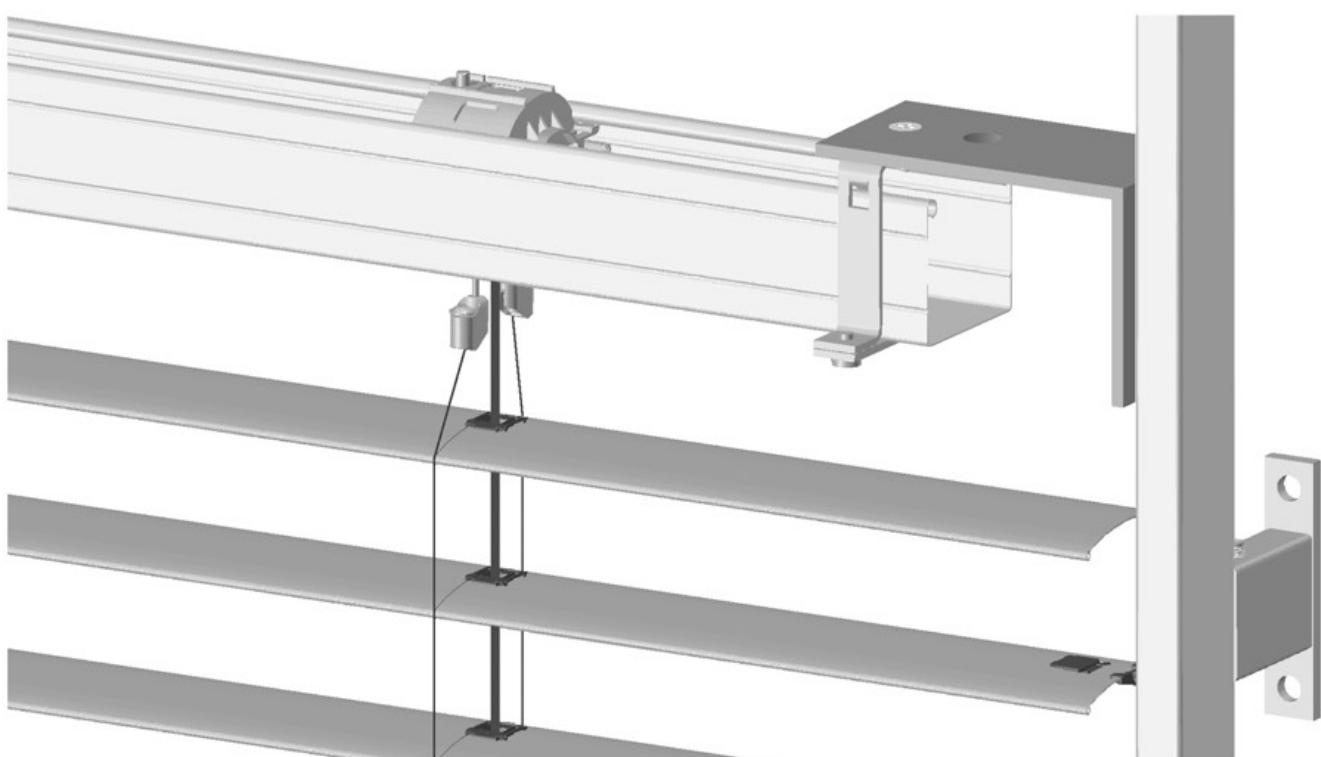
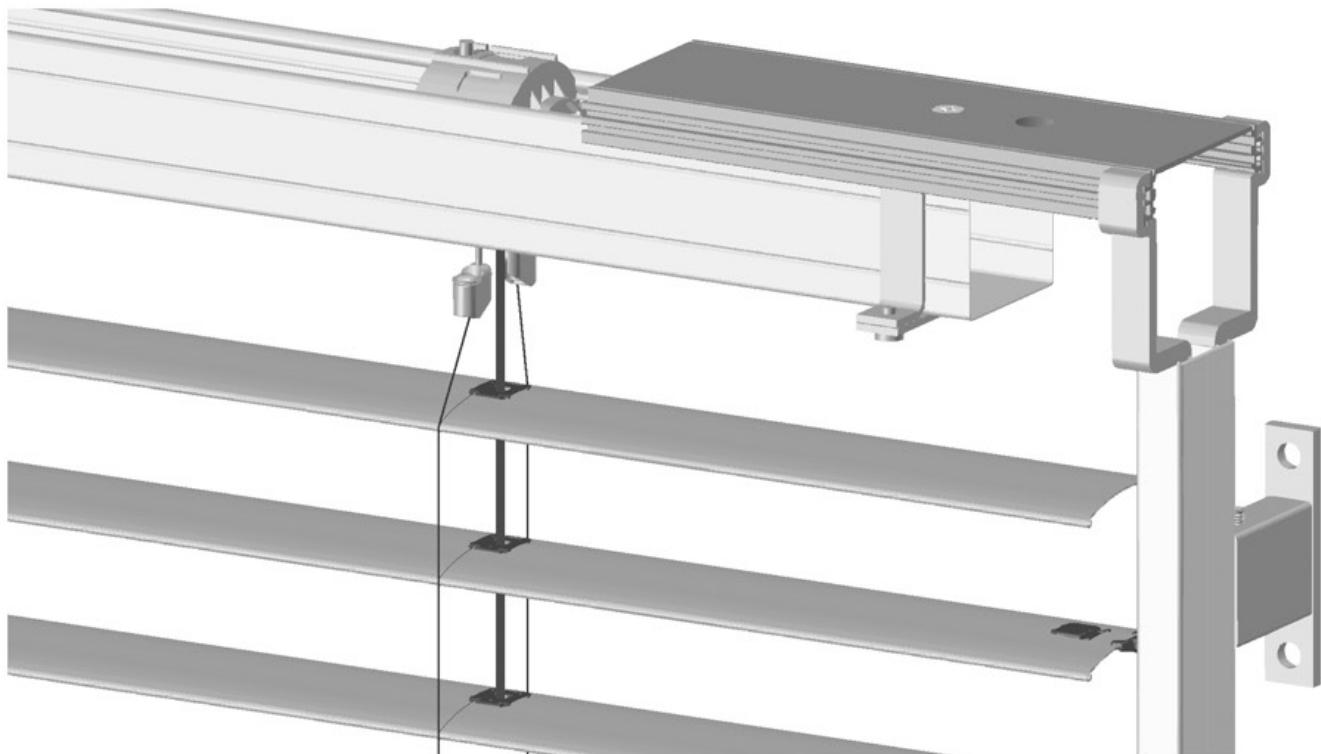
ASC, ASCF; "Click"

EXTERNAL VENETIAN BLINDS



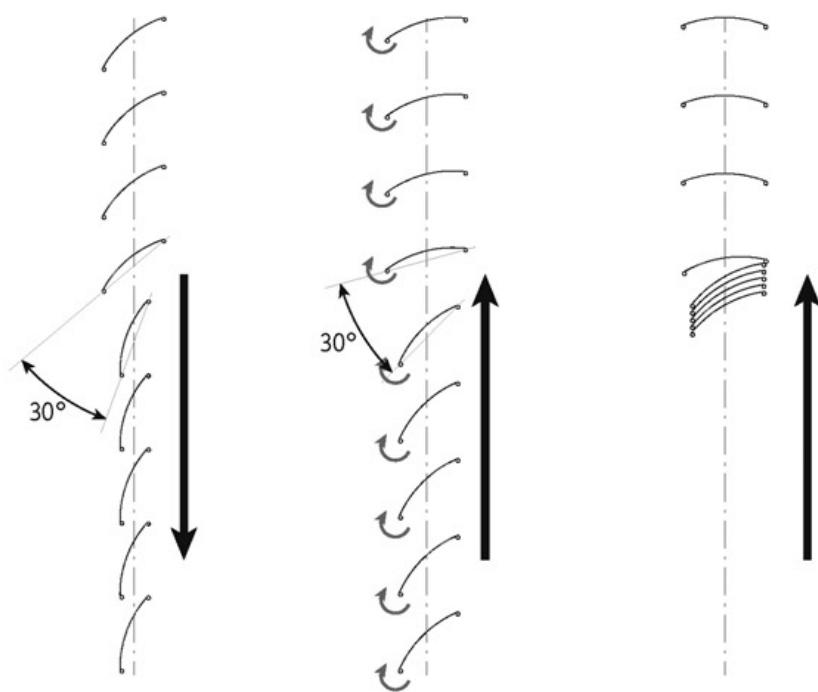
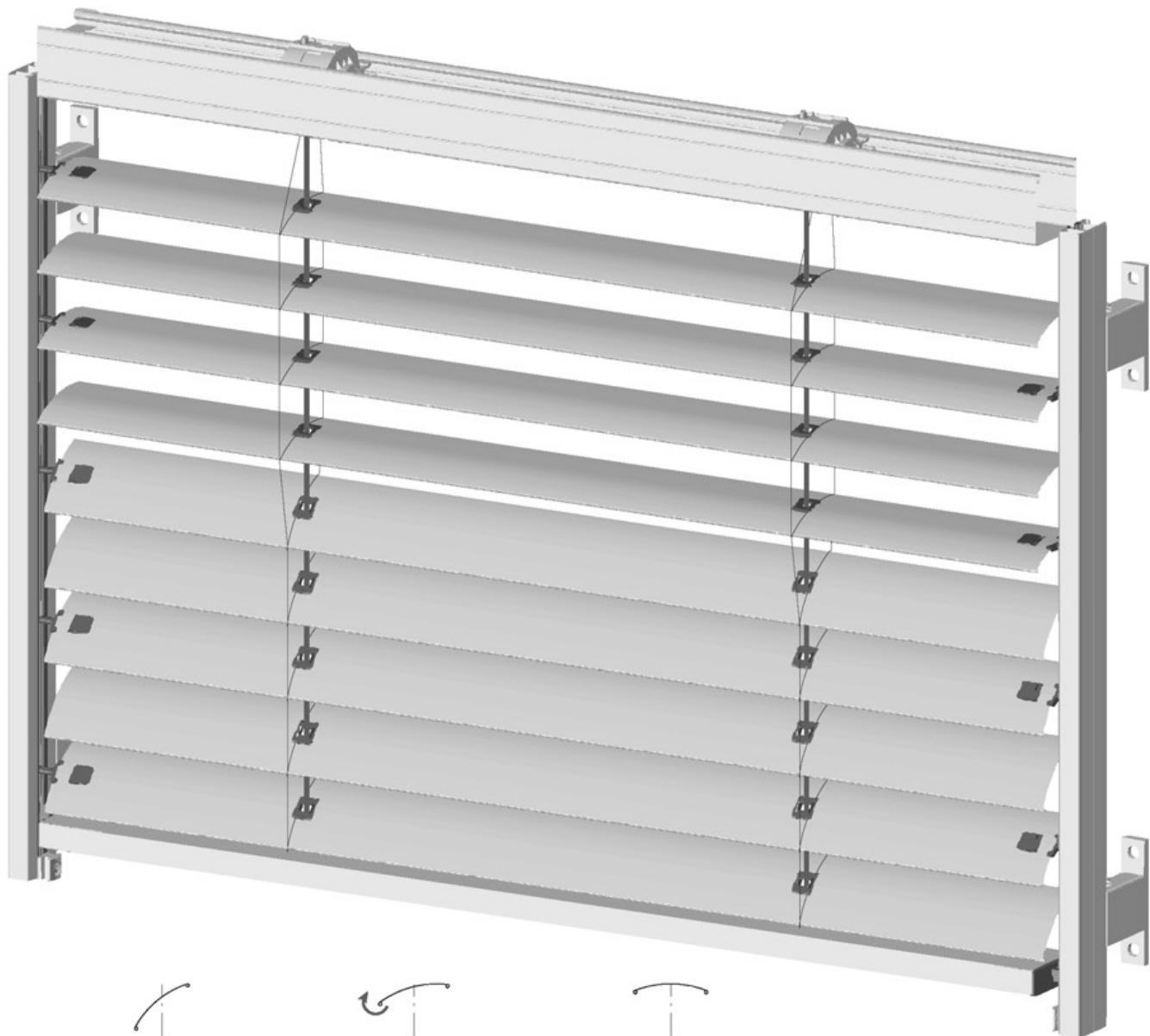
Free hanging

EXTERNAL VENETIAN BLINDS



Dual Light Control

EXTERNAL VENETIAN BLINDS



Lockable bottomrail

EXTERNAL VENETIAN BLINDS

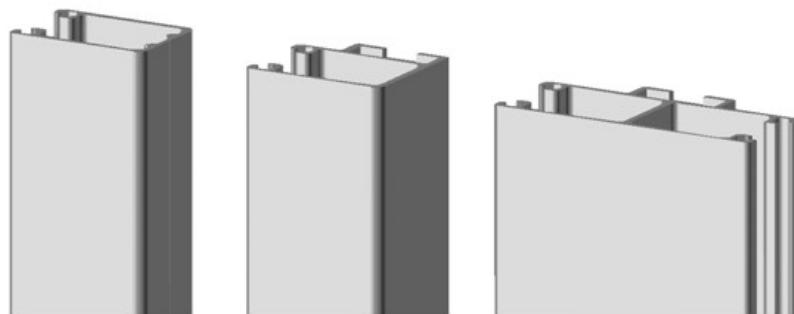


The option of a *manual operated bottom rail in case of emergency* is developed to create easy access from the exterior by lifting the bottom rail and lock in "up" position. This option is also usable in case of emergency from the inside. In that case the windows must open to the inside.

After lifting the bottom rail it can be locked by turning the bottom rail 90°. The locking pins on each side of the bottom rail will be locking in the side guiding profiles. The bottom rail will remain in "up" position.

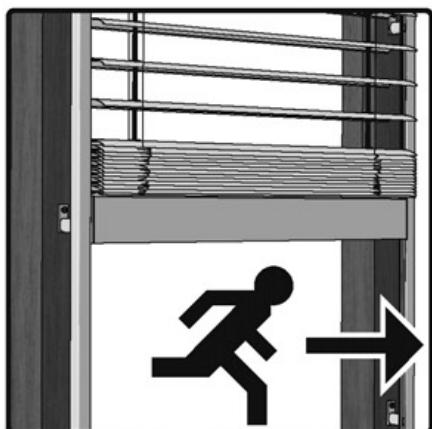
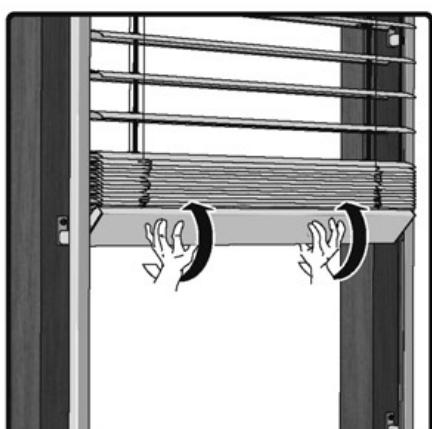
Characteristics

- Available for 60, 60 flex, 80 and 80 flex slats
- Only with use of 80 mm bottomrail
- Suitable with side guidings:



- Length of the bottomrail is the same as at a normal blind
- Dimensions blind:
 - $800 \text{ mm} < W \leq 2200 \text{ mm}$
 - $H \leq 4000 \text{ mm}$
- Maximum position of the bottomrail in emergency function: due to the weight of the slats this is set to 2500 mm above bottom position
- Not for 88 and 100 mm slats
- Not suitable for cable guiding

A semi-transparent windowsticker (graphics shown on the left, appr. 85mm x 300mm) is available to indicate the windows that are equipped with a blind with lockable bottomrail.



Quick Raise Spring Operated

EXTERNAL VENETIAN BLINDS

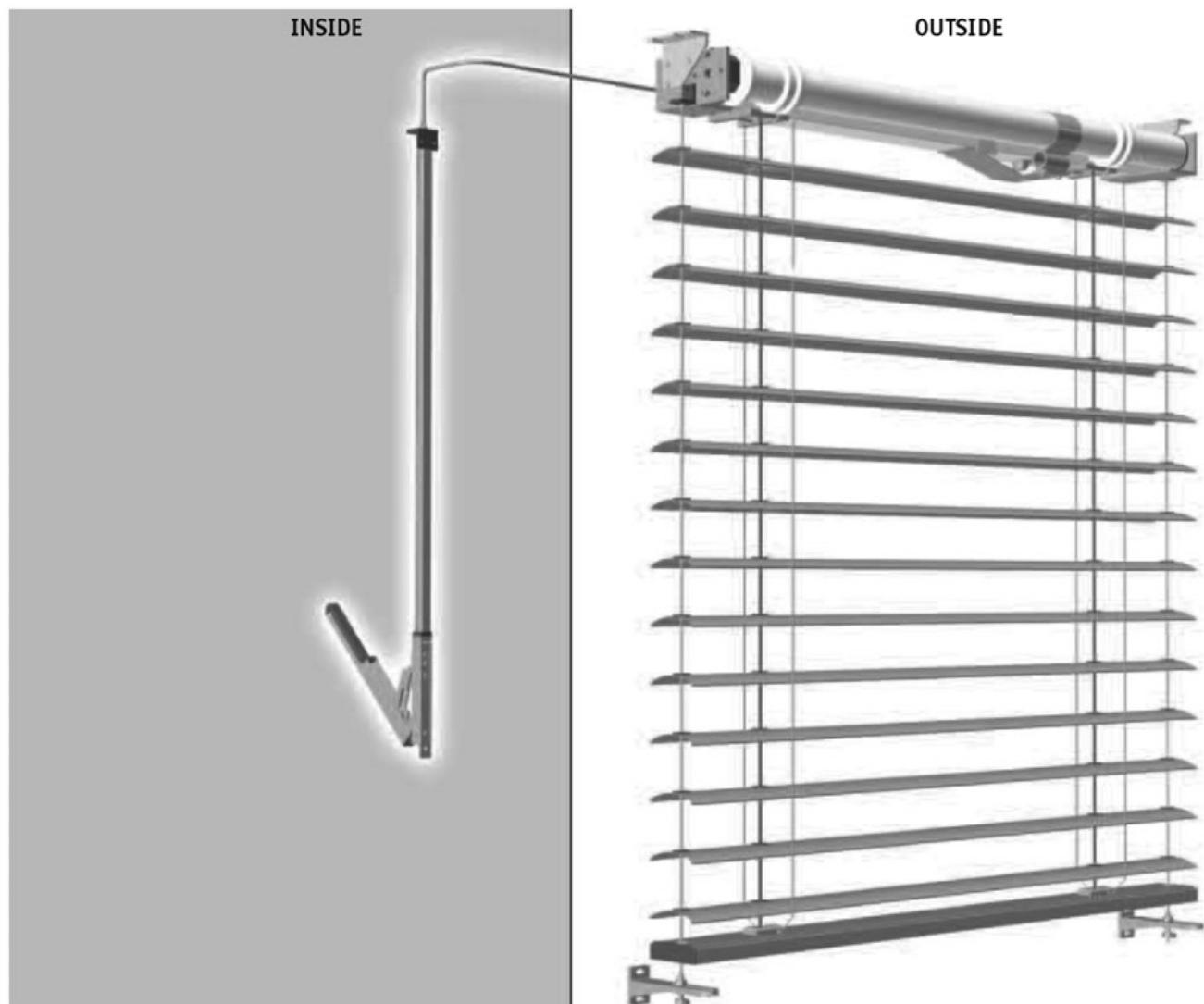
60 OR 80 MM SLATS, BEADED OR FLEXIBLE

- Quick raise by lever operation, blind raises within 1 second
- Can be used for openings in the façade where a uniform view of the buildings is required
- Reset function available, so the quick raise operation can be used several times
- Side guiding: by cable (type A) or guiding rails (type AS or ASK)
- Patented HD connecting system between bottom rail and lift cord
- Blind operation by motor
- Raising or lowering the blind with normal function takes twice the time of the other blinds

Dimensions

Maximum Surface: 6.6 m²

| | Maximum | Minimum |
|-------------|---------|---------|
| Width (mm) | 2200 | 990 |
| Height (mm) | 3000 | |



Quick Raise Motorised

EXTERNAL VENETIAN BLINDS

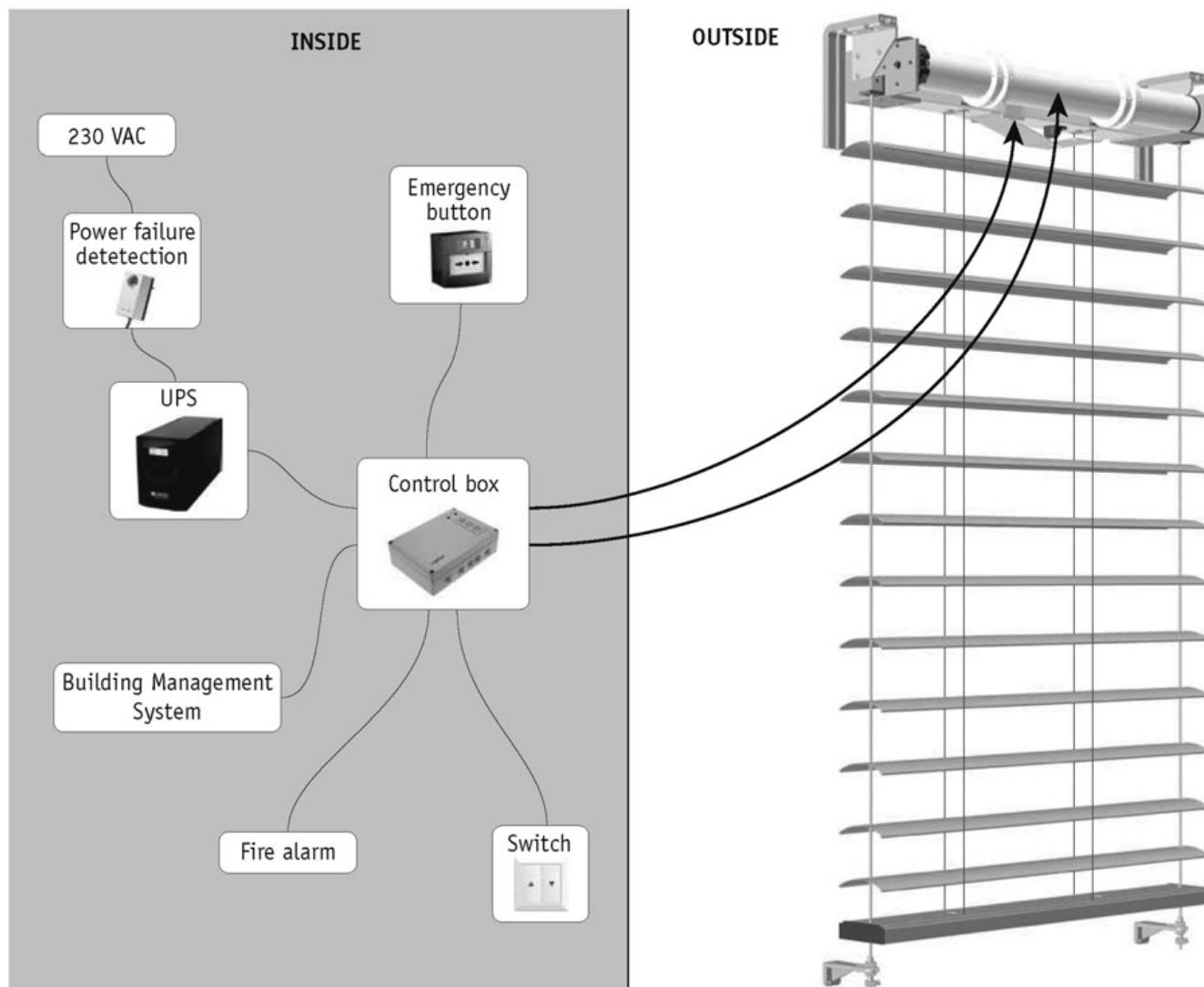
60 OR 80 MM, BEADED OR FLEXIBLE

- Quick raise by motor operation, blind raises within 5 seconds
- Can be used for openings in the façade where a uniform view of the buildings is required
- Side guiding: by cable (type A) or guiding rails (type AS or ASK)
- Blind operation by motor
- Raising or lowering the blind with normal function takes twice the time of the other blinds
- Quick raise through second motor
- Separate control system for quick raise function
- Operation through activating:
 - Emergency button
 - Fire alarm
 - Building management system
- UPS is back up energy source for quick raise function
- Patented HD connecting system between bottom rail and lift cord

Dimensions

Maximum Surface: 6.6 m²

| | Maximum | Minimum |
|-------------|---------|---------|
| Width (mm) | 2200 | 990 |
| Height (mm) | 3000 | |



Building physics

EXTERNAL VENETIAN BLINDS

BUILDING PHYSICS DATA

| Colour number | Description | Light values EN 410 | Energy values EN 410 | EN 13363-1 | | | | Slat angle 45° Sun angle 30° | | | | |
|---------------|-----------------------------|-------------------------|-------------------------|------------------------------|------------------------------|------------------------------|-------------------|---------------------------------|-------------------|-------------------|----------------------|-----------------------------------|
| | | Reflectance visible (%) | Reflectance solar (%) | g_{tot} (glazing B) | g_{tot} (glazing C) | g_{tot} (glazing D) | F_c (glazing C) | Solar transmittance | Solar reflectance | Solar absorptance | Visual transmittance | Visual reflectance to the outside |
| 0141 | Chalk blue | 84.2 | 76.9 | 0.03 | 0.02 | 0.02 | 0.03 | 0.19 | 0.53 | 0.28 | 0.21 | 0.58 |
| 0193 | Traffic white | 92.9 | 78.9 | 0.03 | 0.02 | 0.02 | 0.03 | 0.21 | 0.57 | 0.22 | 0.25 | 0.66 |
| 0264 | Clean white | 92.7 | 78.1 | 0.03 | 0.02 | 0.02 | 0.03 | 0.19 | 0.52 | 0.29 | 0.22 | 0.6 |
| 0298 | White frost | 73.4 | 66.5 | 0.05 | 0.03 | 0.03 | 0.04 | 0.16 | 0.45 | 0.39 | 0.17 | 0.5 |
| 0663 | Light grey | 63.4 | 53.9 | 0.07 | 0.04 | 0.04 | 0.06 | 0.13 | 0.37 | 0.5 | 0.14 | 0.42 |
| 0664 | Agate grey | 47.7 | 40.1 | 0.09 | 0.05 | 0.05 | 0.07 | 0.09 | 0.27 | 0.64 | 0.11 | 0.31 |
| 1547 | Dusty grey | 23.4 | 20.6 | 0.12 | 0.07 | 0.07 | 0.10 | 0.06 | 0.13 | 0.81 | 0.06 | 0.15 |
| 1645 | Obsidian | 8.4 | 8.1 | 0.14 | 0.08 | 0.08 | 0.11 | 0.05 | 0.05 | 0.9 | 0.05 | 0.06 |
| 1699 | Black frost | 8.9 | 10.9 | 0.14 | 0.08 | 0.07 | 0.11 | 0.04 | 0.03 | 0.93 | 0.04 | 0.03 |
| 1740 | Umbra grey | 10.2 | 10 | 0.14 | 0.08 | 0.07 | 0.11 | 0.05 | 0.07 | 0.88 | 0.05 | 0.07 |
| 1849 | Jet Black | 4.5 | 4.5 | 0.15 | 0.08 | 0.08 | 0.12 | 0.04 | 0.03 | 0.93 | 0.04 | 0.03 |
| 2343 | Pigeon blue | 23.5 | 25.7 | 0.12 | 0.07 | 0.06 | 0.09 | 0.07 | 0.17 | 0.76 | 0.06 | 0.15 |
| 2440 | Blue vase | 12.1 | 28.1 | 0.11 | 0.06 | 0.06 | 0.09 | 0.08 | 0.19 | 0.73 | 0.05 | 0.08 |
| 2743 | Deep blue | 8.7 | 27.4 | 0.11 | 0.06 | 0.06 | 0.09 | 0.08 | 0.19 | 0.73 | 0.05 | 0.06 |
| 3240 | Robin hood woods | 8.4 | 16.1 | 0.13 | 0.07 | 0.07 | 0.10 | 0.06 | 0.11 | 0.83 | 0.05 | 0.05 |
| 4041 | Gold gleam | 58.8 | 58.9 | 0.06 | 0.04 | 0.03 | 0.05 | 0.14 | 0.37 | 0.49 | 0.12 | 0.32 |
| 4441 | Pearl white | 79.8 | 69 | 0.05 | 0.03 | 0.03 | 0.04 | 0.17 | 0.48 | 0.35 | 0.2 | 0.55 |
| 4443 | Light Ivory | 71.7 | 65.3 | 0.05 | 0.03 | 0.03 | 0.04 | 0.16 | 0.44 | 0.4 | 0.17 | 0.49 |
| 4540 | French silk | 61.8 | 57.4 | 0.07 | 0.04 | 0.04 | 0.05 | 0.14 | 0.39 | 0.47 | 0.14 | 0.41 |
| 4742 | Gaucho espresso | 36.8 | 36.1 | 0.10 | 0.06 | 0.05 | 0.08 | 0.08 | 0.22 | 0.7 | 0.08 | 0.21 |
| 4846 | Espresso | 8.3 | 9.5 | 0.14 | 0.08 | 0.07 | 0.11 | 0.05 | 0.06 | 0.89 | 0.05 | 0.05 |
| 4872 | Spartan brown | 8.8 | 8.4 | 0.14 | 0.08 | 0.08 | 0.11 | 0.05 | 0.06 | 0.89 | 0.05 | 0.06 |
| 5043 | Toreador | 9.3 | 34.1 | 0.10 | 0.06 | 0.05 | 0.08 | 0.09 | 0.23 | 0.68 | 0.05 | 0.06 |
| 7040 | Silvercloud | 54.1 | 53.3 | 0.07 | 0.04 | 0.04 | 0.06 | 0.12 | 0.35 | 0.53 | 0.12 | 0.36 |
| 7042 | Grey aluminium | 43.1 | 46.5 | 0.08 | 0.05 | 0.04 | 0.07 | 0.1 | 0.31 | 0.59 | 0.1 | 0.28 |
| 7043 | Silver grey metallic DB 703 | 14.4 | 14.6 | 0.13 | 0.08 | 0.07 | 0.13 | 0.05 | 0.09 | 0.86 | 0.05 | 0.09 |
| 7082 | Silver frost | 48.9 | 49.4 | 0.08 | 0.04 | 0.04 | 0.06 | 0.11 | 0.33 | 0.56 | 0.11 | 0.32 |
| 7140 | Burnished bronce | 23.2 | 25.6 | 0.12 | 0.07 | 0.06 | 0.09 | 0.07 | 0.17 | 0.76 | 0.06 | 0.15 |
| 7141 | Pearl mouse grey | 32.6 | 34.8 | 0.10 | 0.06 | 0.05 | 0.08 | 0.08 | 0.23 | 0.69 | 0.08 | 0.21 |
| 7148 | Mink brown | 9.1 | 11.4 | 0.14 | 0.08 | 0.07 | 0.11 | 0.05 | 0.07 | 0.88 | 0.05 | 0.06 |
| 8569 | Brown Oak TF | 20.5 | 23.2 | 0.12 | 0.07 | 0.06 | 0.10 | 0.06 | 0.15 | 0.79 | 0.06 | 0.13 |
| 8570 | Red Oak TF | 9.3 | 11.4 | 0.14 | 0.08 | 0.07 | 0.11 | 0.05 | 0.07 | 0.88 | 0.05 | 0.06 |

The building physics data has been calculated based on the EN 13363-2

- Glazing B clear double glazing (4mm float + 12 mm space + 4 mm float) space filled with air, Ug= 2,90, g= 0,76
- Glazing C double glazing (4mm float + 16 mm space + 4 mm float) space filled with argon, low emissivity coating at outer surface of the inner pane, Ug= 1,20, g= 0,59
- Glazing D Reflective double glazing 4 + 16 + 4 with a low emissivity soft coating at inner surface of the outer pane, space filled with argon, Ug= 1,10, g= 0,32

| Visual absorptance | Colour rendering index | Slat angle 82° (closed) Sun angle 1° | | | | | | Slat angle 0° (horizontal) Sun angle 45° | | | | | | | |
|--------------------|------------------------|---|-------------------|-------------------|----------------------|-----------------------------------|--------------------|---|---------------------|-------------------|-------------------|----------------------|-----------------------------------|--------------------|------------------------|
| | | Solar transmittance | Solar reflectance | Solar absorptance | Visual transmittance | Visual reflectance to the outside | Visual absorptance | Colour rendering index | Solar transmittance | Solar reflectance | Solar absorptance | Visual transmittance | Visual reflectance to the outside | Visual absorptance | Colour rendering index |
| 0.21 | 96 | 0.04 | 0.71 | 0.25 | 0.04 | 0.78 | 0.18 | 95 | 0.36 | 0.33 | 0.31 | 0.39 | 0.37 | 0.24 | 97 |
| 0.09 | 97 | 0.04 | 0.76 | 0.2 | 0.06 | 0.88 | 0.06 | 96 | 0.39 | 0.37 | 0.24 | 0.46 | 0.44 | 0.1 | 97 |
| 0.18 | 98 | 0.04 | 0.71 | 0.25 | 0.05 | 0.81 | 0.14 | 97 | 0.36 | 0.33 | 0.31 | 0.41 | 0.39 | 0.2 | 98 |
| 0.33 | 96 | 0.03 | 0.62 | 0.35 | 0.03 | 0.69 | 0.28 | 94 | 0.3 | 0.27 | 0.43 | 0.33 | 0.3 | 0.37 | 96 |
| 0.44 | 97 | 0.02 | 0.52 | 0.46 | 0.03 | 0.59 | 0.38 | 96 | 0.25 | 0.21 | 0.54 | 0.28 | 0.25 | 0.47 | 97 |
| 0.58 | 98 | 0.01 | 0.38 | 0.61 | 0.02 | 0.44 | 0.54 | 98 | 0.18 | 0.14 | 0.68 | 0.21 | 0.17 | 0.62 | 98 |
| 0.79 | 99 | 0.01 | 0.19 | 0.8 | 0.01 | 0.22 | 0.77 | 99 | 0.11 | 0.06 | 0.83 | 0.12 | 0.07 | 0.81 | 99 |
| 0.89 | 99 | 0 | 0.08 | 0.92 | 0 | 0.08 | 0.92 | 99 | 0.08 | 0.02 | 0.9 | 0.08 | 0.03 | 0.89 | 98 |
| 0.93 | 100 | 0 | 0.05 | 0.95 | 0 | 0.04 | 0.96 | 100 | 0.07 | 0.02 | 0.91 | 0.07 | 0.01 | 0.92 | 100 |
| 0.88 | 100 | 0 | 0.1 | 0.9 | 0 | 0.1 | 0.9 | 99 | 0.08 | 0.03 | 0.89 | 0.08 | 0.03 | 0.89 | 99 |
| 0.93 | 100 | 0 | 0.05 | 0.95 | 0 | 0.04 | 0.96 | 100 | 0.07 | 0.01 | 0.92 | 0.07 | 0.01 | 0.92 | 100 |
| 0.79 | 90 | 0.01 | 0.25 | 0.74 | 0.01 | 0.22 | 0.77 | 84 | 0.13 | 0.09 | 0.78 | 0.12 | 0.07 | 0.81 | 89 |
| 0.87 | 90 | 0.01 | 0.27 | 0.72 | 0.01 | 0.11 | 0.88 | 85 | 0.15 | 0.1 | 0.75 | 0.09 | 0.04 | 0.87 | 85 |
| 0.89 | 89 | 0.01 | 0.26 | 0.73 | 0 | 0.08 | 0.92 | 83 | 0.15 | 0.1 | 0.75 | 0.08 | 0.03 | 0.89 | 84 |
| 0.9 | 96 | 0.01 | 0.16 | 0.83 | 0 | 0.08 | 0.92 | 96 | 0.11 | 0.05 | 0.84 | 0.08 | 0.03 | 0.89 | 93 |
| 0.56 | 55 | 0.03 | 0.51 | 0.46 | 0.02 | 0.45 | 0.53 | 38 | 0.26 | 0.22 | 0.52 | 0.23 | 0.19 | 0.58 | 54 |
| 0.25 | 94 | 0.03 | 0.66 | 0.31 | 0.04 | 0.75 | 0.21 | 93 | 0.33 | 0.3 | 0.37 | 0.37 | 0.34 | 0.29 | 95 |
| 0.34 | 87 | 0.03 | 0.61 | 0.36 | 0.03 | 0.67 | 0.3 | 83 | 0.3 | 0.26 | 0.44 | 0.32 | 0.29 | 0.39 | 89 |
| 0.45 | 87 | 0.02 | 0.55 | 0.43 | 0.03 | 0.58 | 0.39 | 81 | 0.26 | 0.23 | 0.51 | 0.27 | 0.24 | 0.49 | 88 |
| 0.71 | 90 | 0.01 | 0.32 | 0.67 | 0.01 | 0.31 | 0.68 | 84 | 0.16 | 0.11 | 0.73 | 0.15 | 0.11 | 0.74 | 89 |
| 0.9 | 97 | 0 | 0.09 | 0.91 | 0 | 0.08 | 0.92 | 97 | 0.08 | 0.03 | 0.89 | 0.08 | 0.02 | 0.9 | 95 |
| 0.89 | 100 | 0 | 0.08 | 0.92 | 0 | 0.08 | 0.92 | 99 | 0.08 | 0.03 | 0.89 | 0.08 | 0.03 | 0.89 | 99 |
| 0.89 | 75 | 0.01 | 0.33 | 0.66 | 0 | 0.09 | 0.91 | 61 | 0.18 | 0.13 | 0.69 | 0.08 | 0.03 | 0.89 | 63 |
| 0.52 | 97 | 0.02 | 0.49 | 0.49 | 0.02 | 0.5 | 0.48 | 95 | 0.23 | 0.2 | 0.57 | 0.24 | 0.2 | 0.56 | 97 |
| 0.62 | 99 | 0.02 | 0.44 | 0.54 | 0.01 | 0.4 | 0.59 | 99 | 0.21 | 0.17 | 0.62 | 0.19 | 0.15 | 0.66 | 99 |
| 0.86 | 100 | 0.01 | 0.13 | 0.86 | 0.01 | 0.13 | 0.86 | 100 | 0.09 | 0.04 | 0.87 | 0.1 | 0.04 | 0.86 | 100 |
| 0.57 | 99 | 0.02 | 0.46 | 0.52 | 0.02 | 0.45 | 0.53 | 98 | 0.22 | 0.18 | 0.6 | 0.21 | 0.17 | 0.62 | 99 |
| 0.79 | 97 | 0.01 | 0.24 | 0.75 | 0.01 | 0.22 | 0.77 | 95 | 0.13 | 0.08 | 0.79 | 0.12 | 0.07 | 0.81 | 96 |
| 0.71 | 97 | 0.01 | 0.33 | 0.66 | 0.01 | 0.3 | 0.69 | 96 | 0.16 | 0.12 | 0.72 | 0.15 | 0.11 | 0.74 | 97 |
| 0.89 | 99 | 0.01 | 0.11 | 0.88 | 0 | 0.09 | 0.91 | 98 | 0.09 | 0.04 | 0.87 | 0.08 | 0.03 | 0.89 | 98 |
| 0.81 | 91 | 0.01 | 0.21 | 0.78 | 0.01 | 0.19 | 0.8 | 85 | 0.12 | 0.07 | 0.81 | 0.11 | 0.06 | 0.83 | 88 |
| 0.89 | 95 | 0.01 | 0.1 | 0.89 | 0 | 0.08 | 0.92 | 94 | 0.09 | 0.03 | 0.88 | 0.08 | 0.03 | 0.89 | 91 |

The building physics data has been calculated based on the EN 13363-2

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In the last 50 years, we've been fortunate enough to help turn countless innovative sketches into innovative buildings.



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HunterDouglas

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The origin of our company goes back to 1919, in Düsseldorf, Germany. Throughout our history, we have introduced innovations that have shaped the industry, from the invention of the continuous aluminium caster, to the creation of the first aluminium Venetian Blinds, to the development of the latest high-quality building products.

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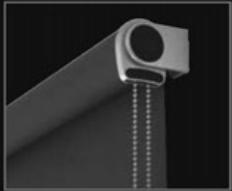
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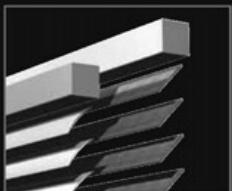
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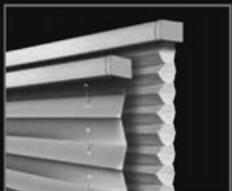
Roller Blinds

Belgium
Bulgaria
Croatia / Slovenia



Venetian Blinds

Czechia
Denmark
France
Germany
Greece



Plissé & Duette® Shades

Hungary
Italy
the Netherlands
Norway
Poland
Portugal
Romania
Russia
Serbia
Slovakia



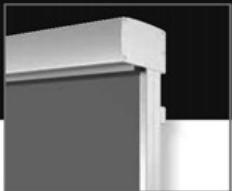
Vertical Venetian Blinds

Spain
Sweden
Switzerland
Turkey
United Kingdom



External Venetian Blinds

Africa
Middle East



External Roller Blinds

Asia
Australia
Latin America
North America

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