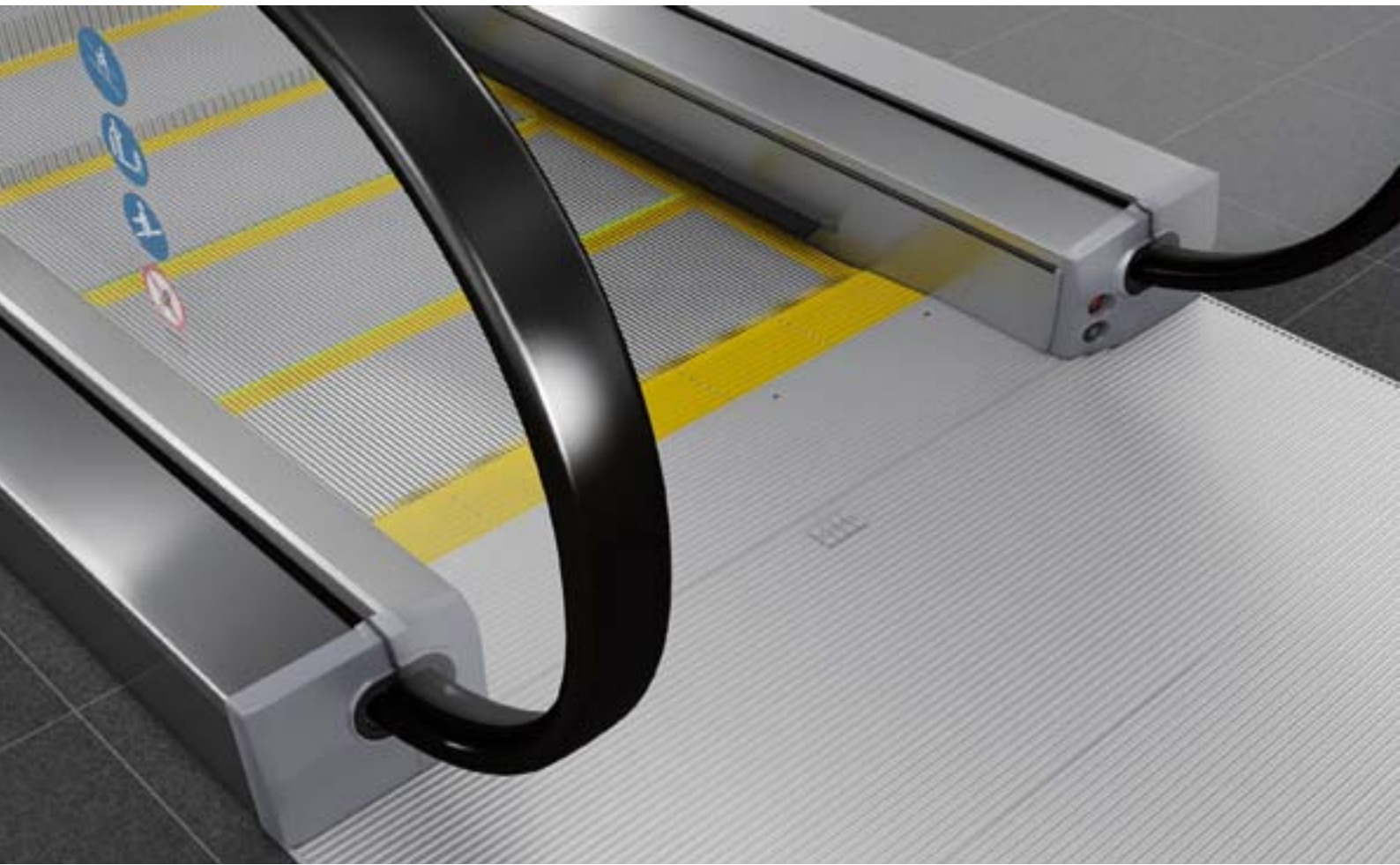


*Dedicated to People Flow™*



OPTIONS AND PLANNING DIMENSIONS

# KONE EcoMaster™ 130 escalators

# KONE EcoMaster™ and TransitMaster™ product range

Well designed and manufactured escalators are a must for today's highly demanding public areas. They are key to ensuring the smooth, efficient and safe flow of people traveling within a building's environment.

KONE prides itself on delivering the 'low risk' option to customers. We offer 'peace of mind' in terms of product design, customer support and project management, combined with the highest levels of efficiency and safety during the installation phase.

The versatile EcoMaster/TransitMaster escalator range is ideal for new installations whilst also providing one of the best small footprint options for customers looking for a replacement escalator solution.

**The EcoMaster/TransitMaster product range incorporates five specific models:**

- EcoMaster 130 escalator
- EcoMaster 135 inclined autowalk
- TransitMaster 150 escalator
- TransitMaster 180 escalator
- TransitMaster 155/195 horizontal autowalk

Each one is specifically designed to meet the exact demands and needs of the market sector, whether it's a low rise retail escalator you are looking for, or a mass transit airport or railway station system.



# EcoMaster™ 130 – the perfect retail solution

The KONE EcoMaster 130 is a commercial escalator targeted primarily towards the retail segment – supermarkets, hypermarkets, department stores and shopping centers. Here it is part of the total KONE solution offering together with other KONE products such as:

- Commercial inclined autowalks -- e.g. KONE EcoMaster 135, KONE TravelMaster 115
- Passenger elevators ----- e.g. KONE MonoSpace
- Goods elevators ----- e.g. KONE TranSys
- Scenic elevators ----- based on KONE MonoSpace or KONE MonoSpace Special
- Automatic building doors

Secondary focus areas for the KONE EcoMaster 130 include airports, hotels, hospitals and offices.

It is designed, from both a technical and visual point of view, to fulfill the main customer requirements of the target segments:

- Cost competitiveness
- High quality in terms of technical performance and visual appearance
- Large standard offering with some engineering flexibility
- Elegant and modern design
- Low energy consumption

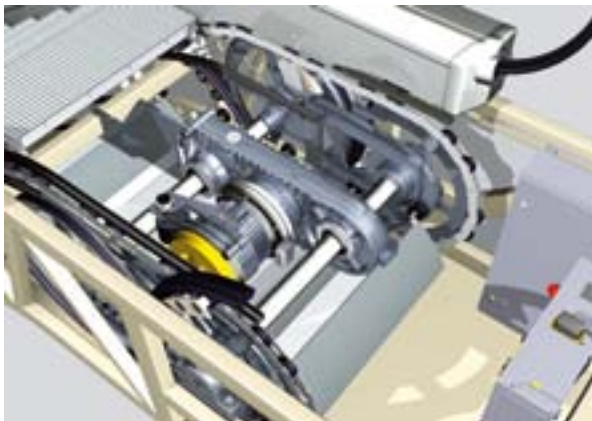
Overview of technical specifications

KONE EcoMaster 130 basic data		
	EcoMaster 130 (1.0)	EcoMaster 130 (1.5)
Inclination	30° or 35°	30°
Horizontal steps	2	2 or 3
Transition radii (top/bottom)	1.0 / 1.0	1.5 / 1.0
Maximum rise	6 m	15 m
Operational environment	Indoor, semi-outdoor	Indoor, semi-outdoor
Step width	600 mm, 800 mm, 1000 mm	600 mm, 800 mm, 1000 mm
Balustrade type	Glass, sandwich panels	Glass, sandwich panels, solid inclined
Balustrade height	1000 mm, 1100 mm	1000 mm, 1100 mm
Speed	0.5 m/s	0.5 m/s
Step chains	Inside roller chains (Ø 75 x 23.5 mm)	Inside roller chains (Ø 75 x 23.5 mm)
Duty cycle	Up to 16 hours/day	Up to 16 hours/day
Typical service life	100,000 hours	100,000 hours

# Eco-efficiency

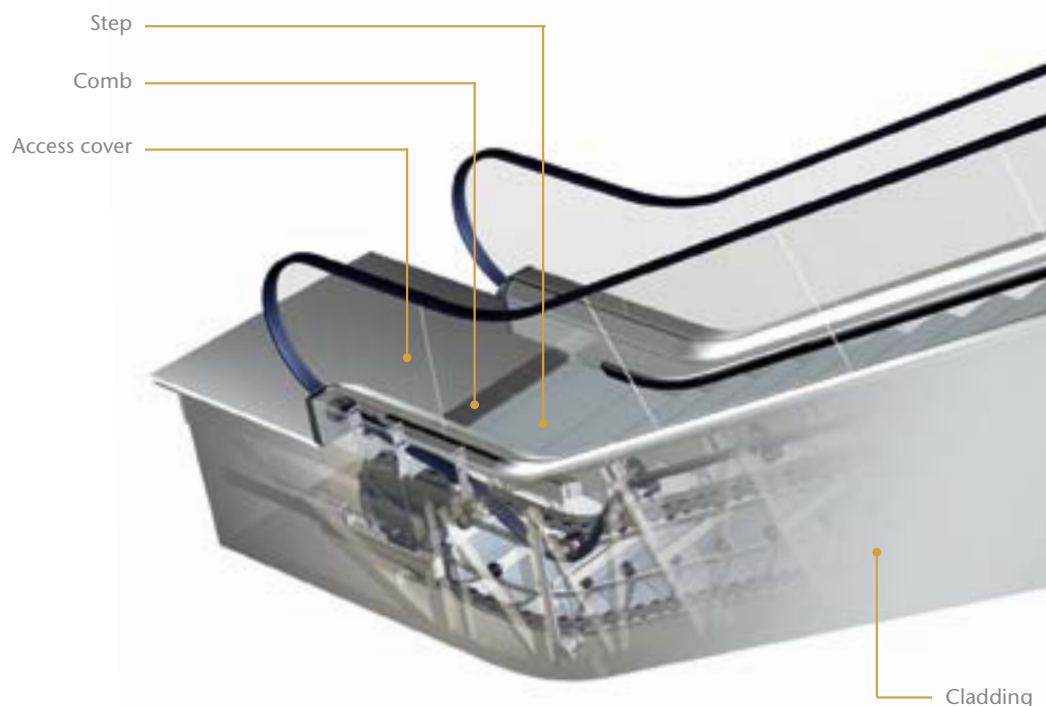
KONE firmly believes that sustainable buildings are our future. We are committed to helping customers achieve their environmental objectives by providing environmentally responsible products and services.

- The patented KONE ECO3000 drive is chainless (even for the handrail) and utilizes a 96% efficient planetary reduction gear, thereby improving operating efficiency, which in turn reduces energy consumption and environmental impact.



The heart of the escalator is the innovative KONE ECO3000 drive, which provides increased reliability, reduced energy consumption, extended service intervals and a longer operating life.

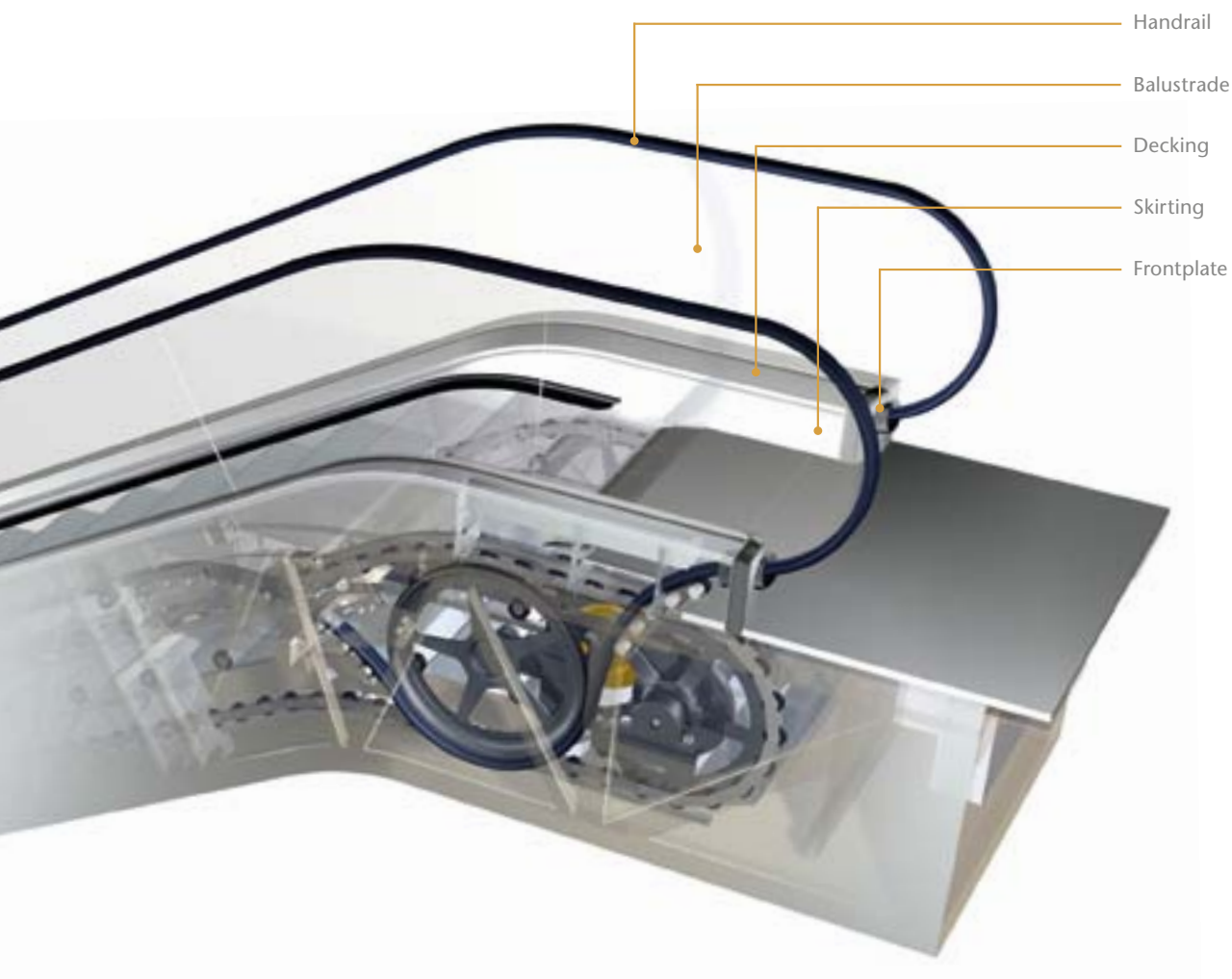
- The ECO3000 drive is available with Star/Delta Starting, which reduces the starting current. This feature also incorporates Star/Delta Energy Saving, which reduces energy costs by regulating the power consumption to suit actual passenger loading without reducing the contract speed.
- Stand-by speed operation, using a frequency inverter, reduces the escalator speed when no passengers are traveling, thus further reducing energy consumption and increasing equipment lifetime.
- The ECO3000 drive only requires an oil change after 30,000 operating hours (twice as long as conventional drive systems). This reduces downtime and oil disposal costs, and increases availability. And compared to conventional drives, oil leaks and their associated smells belong to the past.
- The optional lubrication-free step chain means no oil, a cleaner escalator and environment, reduced fire hazard, simpler cleaning and easier maintenance.
- Optional LED decorative lighting systems use 90% less energy and last up to 6 times longer than fluorescent tubes.
- Escalator packaging and timber protection are examples of our commitment to using wood taken from sustainable forests.
- At the end of March 2008, 90% of our production operations were certified according to the ISO 14001 standard.



# Safety options

The standard safety features of the KONE EcoMaster 130 according to the EN 115-1:2008 safety code are the following:

- Emergency stop buttons for passengers in the top left and bottom right handrail inlet front plates
- Broken step chain (chain tension) switches in the return station which stop the escalator in case of failure of the step chain
- Handrail inlet switches with contacts at the handrail inlets into the balustrade heads
- Comb plate impact device switches which stop the escalator in case objects become trapped between the comb teeth and the moving step band
- Step sag switches, which stop the escalator if a step sags by more than 5 mm before it enters the comb
- Step protection covers at the top and bottom
- Step band locking device
- Speed sensor system, which electronically monitors the motor for over/under speeds and step band reversal
- Motor thermal protection for temperature monitoring
- Main switch with thermal and magnetic release
- Stop switches for engineers' use within upper and lower end pits
- Sockets for inspection use installed in the upper and lower machine compartments
- Skirt deflector brushes
- Access cover contacts
- Handrail speed monitor
- Missing step monitor



# Visual options

## Access cover



Ribbed aluminium



Ribbed aluminium with black painted grooves



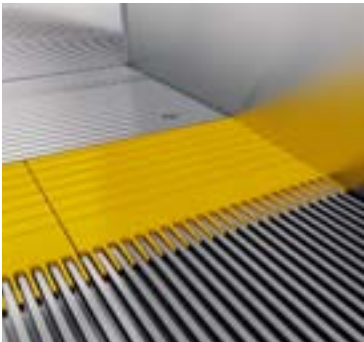
Stainless steel

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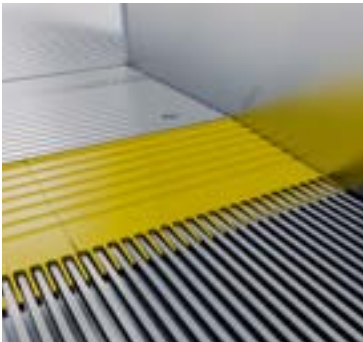
## Comb



Aluminium comb segments



Yellow plastic comb segments



Aluminium comb with yellow coating

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## Frontplate



Grey plastic



Satin polished stainless steel

## Balustrade



Clear glass balustrade panels



Brushed satin stainless steel sandwich panel balustrade



Balustrade extension

**Note:** 700 mm extended balustrade is available either at both ends or at the top end only.

## Balustrade joints



As standard, joints between glass balustrade panels are arranged perpendicular to the truss. Inclined panels are 1900 mm wide except for one make-up panel at the upper end which is used to compensate for the vertical rise.



As an option, the inclined panel widths can be equalized with joints arranged perpendicular to the floor.

## Handrail



Black



Black with white demarcation inserts



Red



Blue



Green



Brown



Beige



Grey

## Decking



Natural anodized aluminium



Brushed satin stainless steel



Center deck

**Note:** Common center deck recommended when truss-to-truss is less than 150 mm.

## Skirt



Sheet steel skirt with black anti-friction coating



Brushed satin stainless steel skirt with clear anti-friction coating

## Step



Silver aluminium



Black color aluminium with metal color ribs

## Step demarcation



Yellow painted (RAL1004)



Yellow plastic insert (RAL1023)

## KONE MovingMedia™ step



MovingMedia distribution:  
One sign on every step, every six steps or as specified by customers

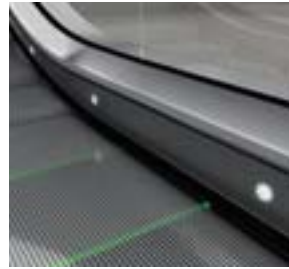
## Lighting



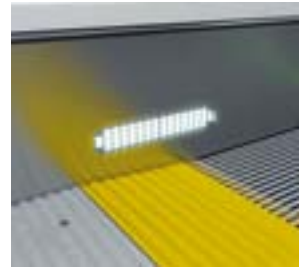
Continuous LED handrail lighting



Continuous LED skirt lighting



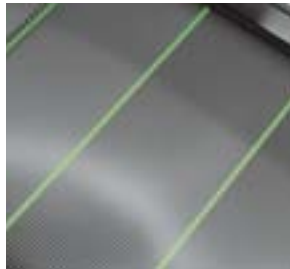
LED skirt spotlighting



LED comb lighting



Traffic lights located in the decking



Under step demarcation lighting

## Cladding



Grey primed sheet steel cladding (RAL7036) \*



Grey powder coated sheet steel cladding (RAL7036) \*\*\*\*\*



Brushed satin stainless steel cladding \*\*\*\*\*



Glass side cladding \*\*/\*\*



Side cladding fitted by the customer \*\*\*\*

### Note:

- \* If needed this can be used for local on site decoration.
- \*\* It is recommended to have a lubrication-free chain with glass side cladding. Options such as a painted truss in various colors as well as internal lighting are available.
- \*\*\* Glass cladding is not available for outdoor application.
- \*\*\*\* The truss is designed to allow a maximum weight of 25 kg/m<sup>2</sup>.
- \*\*\*\*\* Cladding joints perpendicular to truss and floor available.

## Horizontal steps



2 horizontal steps



3 horizontal steps



Diagnostics display

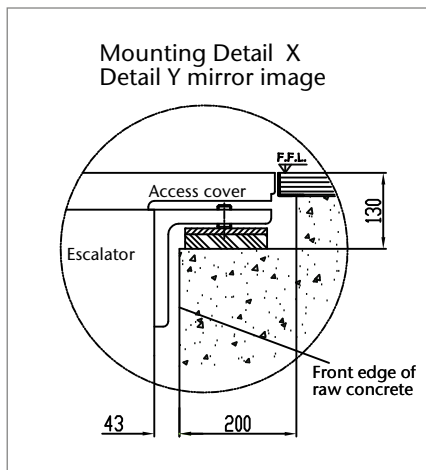
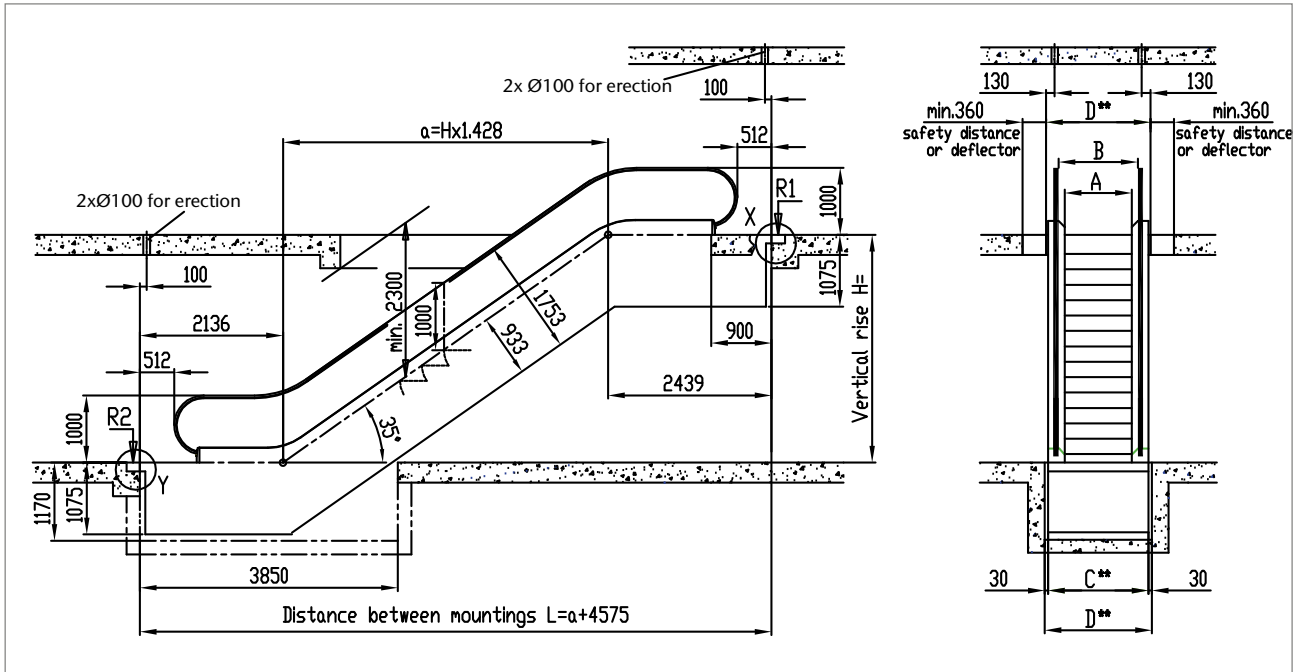
**Note:** If the vertical rise exceeds 6 m or the step speed exceeds 0.5 m/s, there must be a minimum of 3 horizontal steps at each landing (EN 115 compliance).

# KONE EcoMaster™ 130 planning dimensions

Architectural planning data

**35° inclination / 1.0 transition radii / 2 horizontal steps at each landing**

Code: EN 115-1:2008<sup>1)</sup>



- All dimensions are in millimeters
- Maximum vertical rise is 6000 mm
- Intermediate truss support required when distance between mountings (L) exceeds 15000 mm
- For stand-by speed, please contact your local KONE sales organization
- \*\* For special external panels, the escalator and pit widths will increase by 20 mm per covered side
- Access opening 2500 mm wide and 3300 mm high into and through the building is required

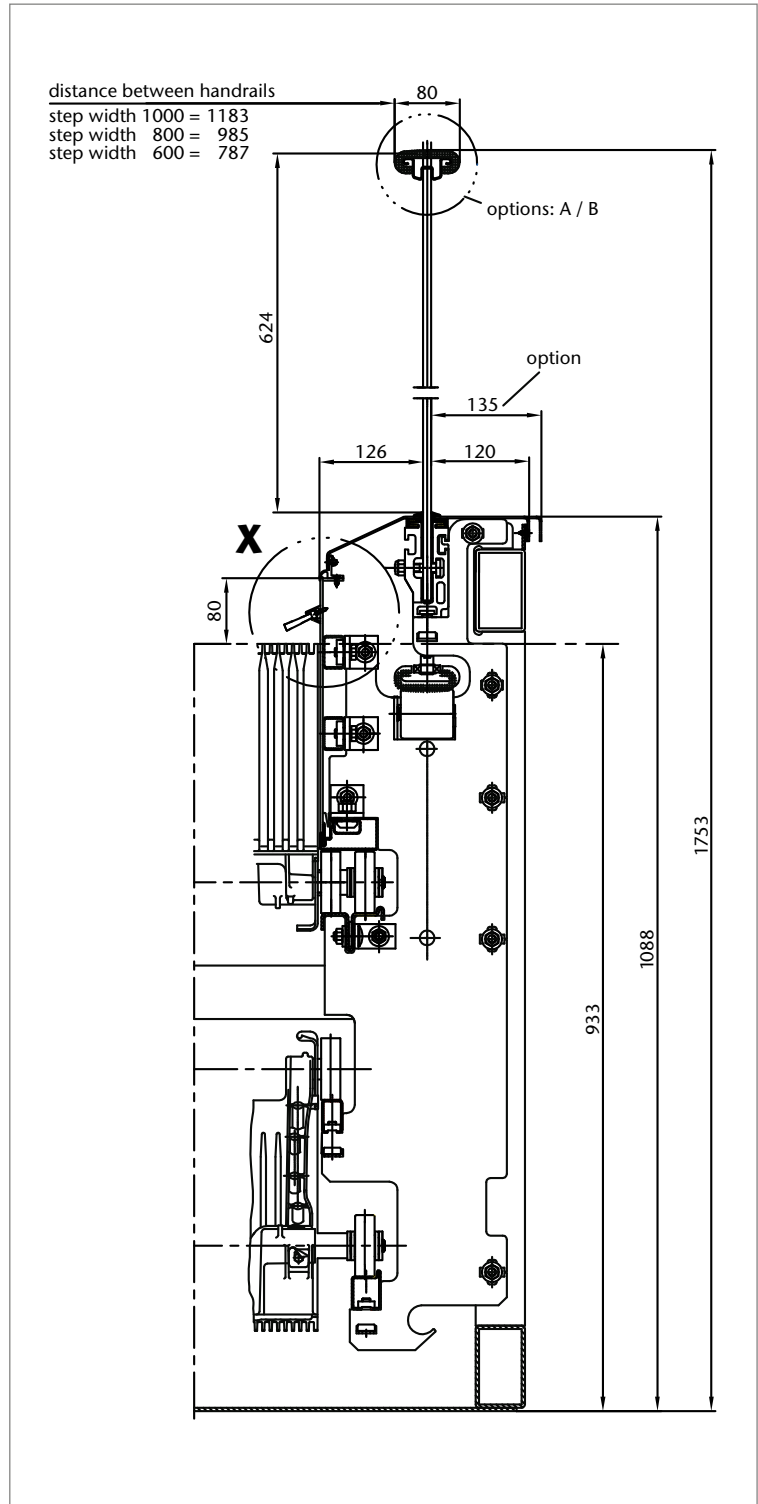
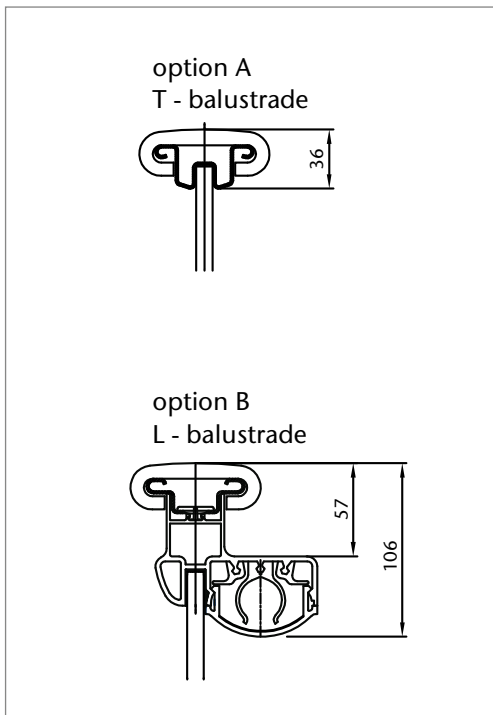
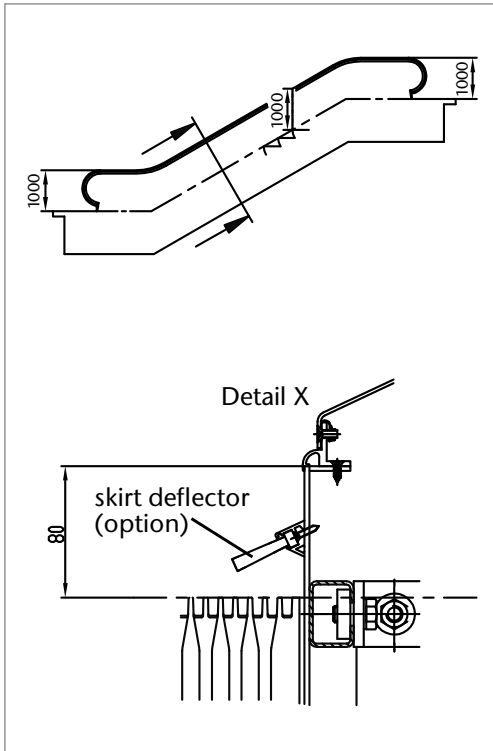
## Architectural planning data

Description	Step width (A)			
	600 mm	800 mm	1000 mm	
Width between handrails (B)	787	985	1183	
Width of escalator (C**)	1100	1300	1500	
Width of pit (D**)	1160	1360	1560	
Support loads (kN)	upper (R1)	$L/1000 \times 3.9 + 8$	$L/1000 \times 4.5 + 8$	$L/1000 \times 5.1 + 8$
	lower (R2)	$L/1000 \times 3.9 + 2$	$L/1000 \times 4.5 + 2$	$L/1000 \times 5.1 + 2$

<sup>1)</sup> Other local codes dimensional requirements are available upon request; please contact your local KONE Sales representative for more information.

# Balustrade details

Glass balustrade 35°



Note:

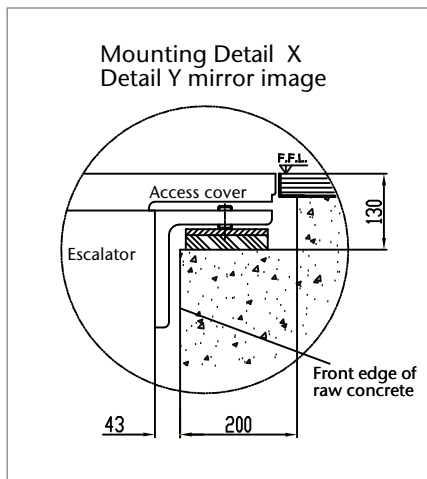
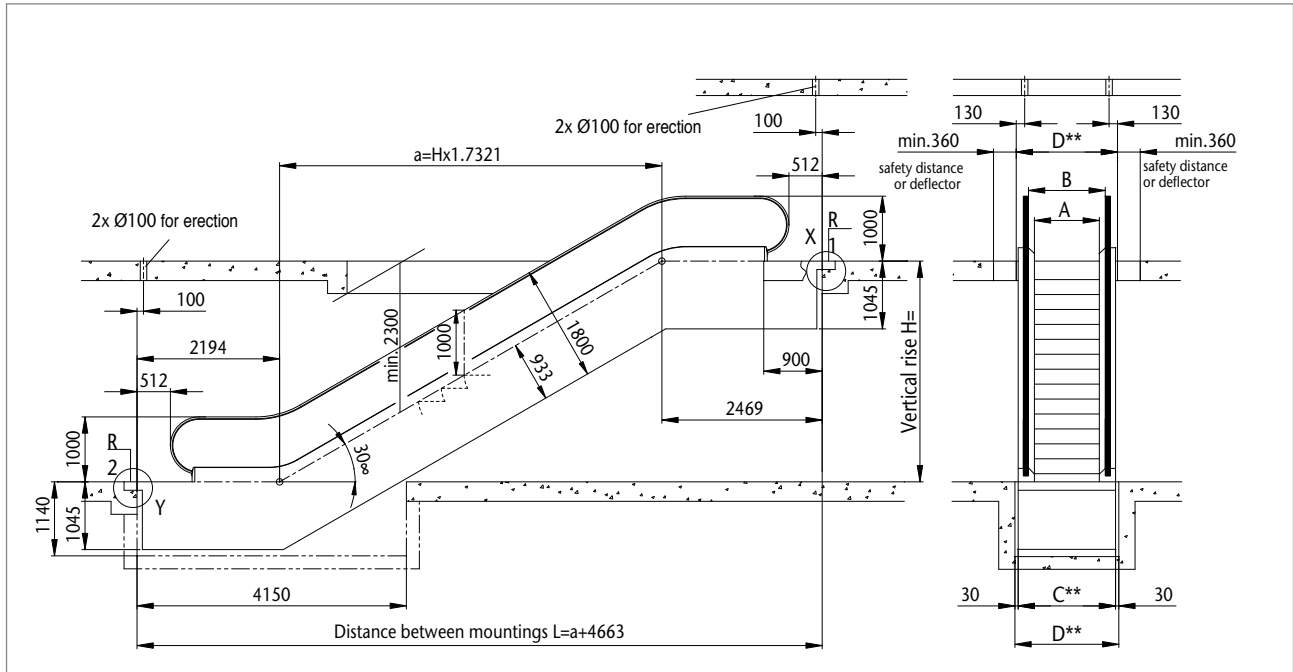
If you would like to obtain the exact dimensions for your specific project, we recommend you use the Escalator Design Tools, which can be found within the InfoPack.

# KONE EcoMaster™ 130 planning dimensions

Architectural planning data

**30° inclination / 1.0 transition radii / 2 horizontal steps at each landing**

Code: EN 115-1:2008<sup>1)</sup>



- All dimensions are in millimeters
- Maximum vertical rise is 6000 mm
- Intermediate truss support required when distance between mountings (L) exceeds 15000 mm
- For stand-by speed, please contact your local KONE sales organization
- \*\* For special external panels, the escalator and pit widths will increase by 20 mm per covered side
- Access opening 2500 mm wide and 3300 mm high into and through the building is required

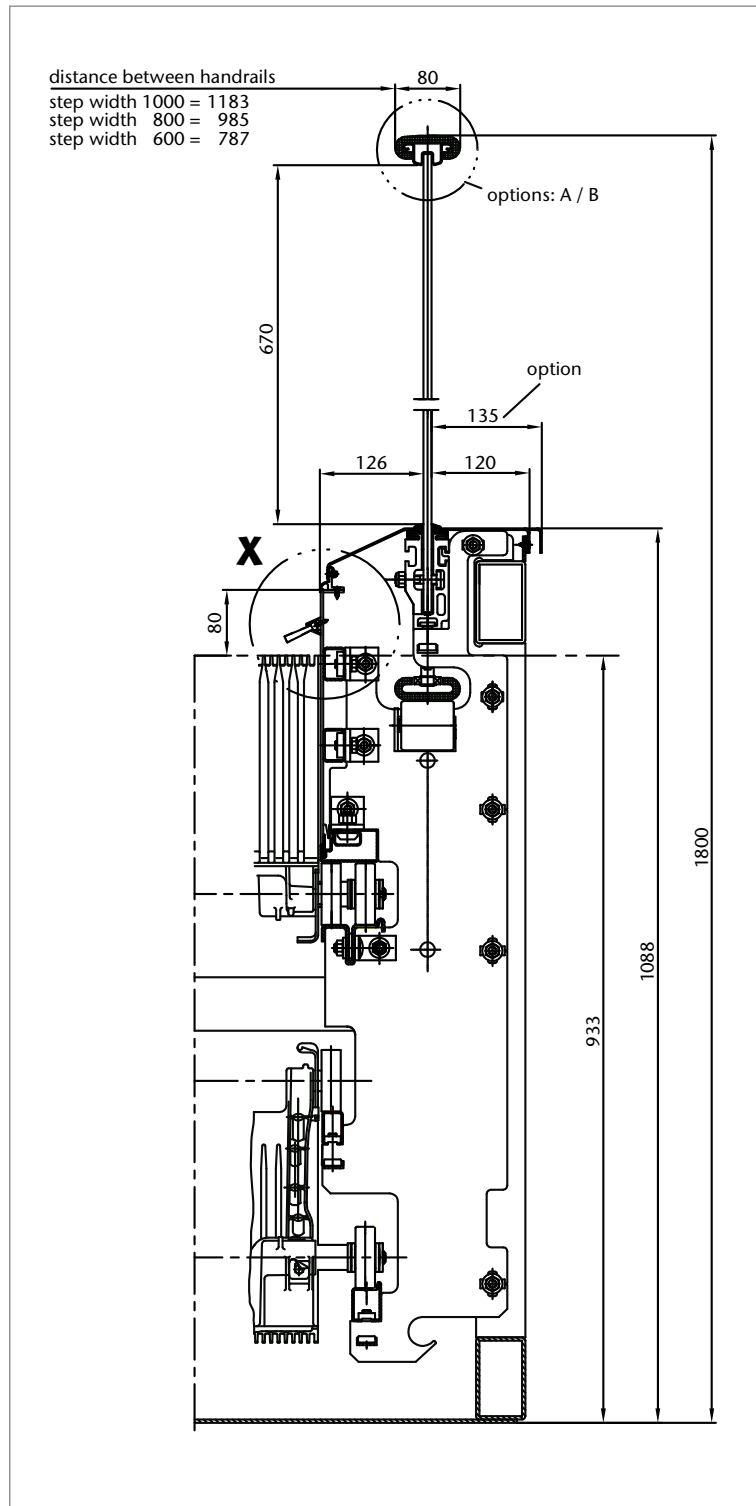
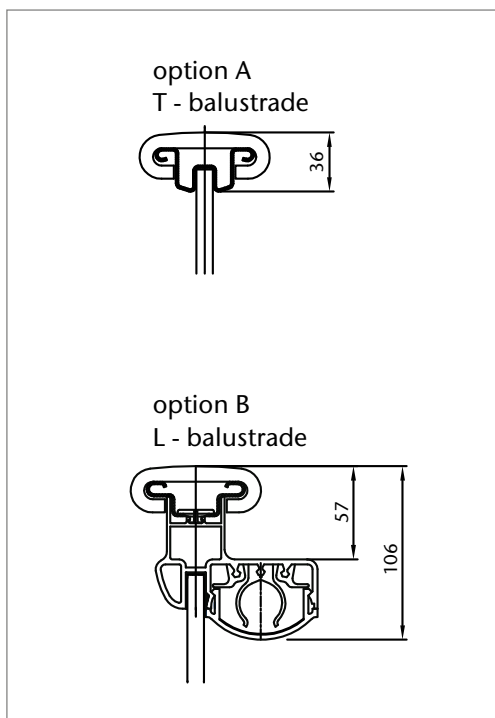
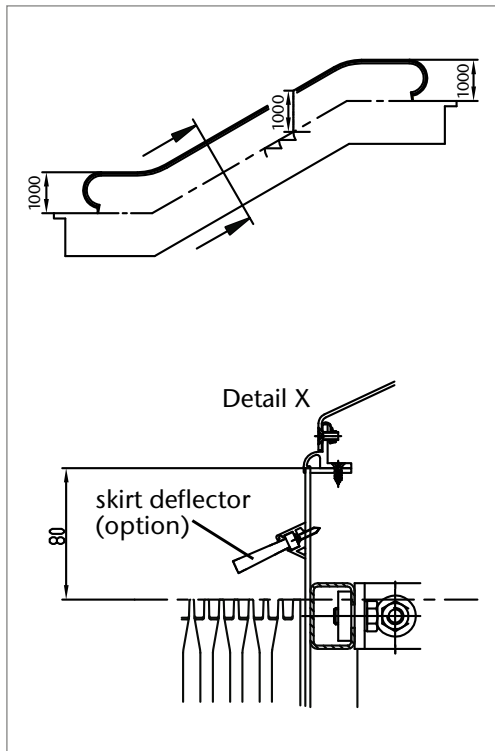
## Architectural planning data

Description	Step width (A)			
	600 mm	800 mm	1000 mm	
Width between handrails (B)	787	985	1183	
Width of escalator (C**)	1100	1300	1500	
Width of pit (D**)	1160	1360	1560	
Support loads (kN)	upper (R1)	$L/1000 \times 3.8 + 8$	$L/1000 \times 4.4 + 8$	$L/1000 \times 5 + 8$
	lower (R2)	$L/1000 \times 3.2 + 2$	$L/1000 \times 4.4 + 2$	$L/1000 \times 5 + 2$

<sup>1)</sup> Other local codes dimensional requirements are available upon request, please contact your local KONE Sales representative for more information.

# Balustrade details

Glass balustrade 30°



Note:

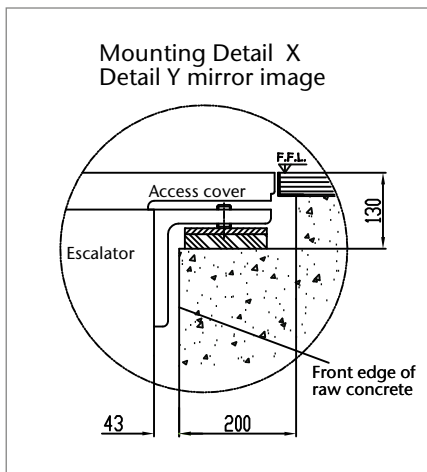
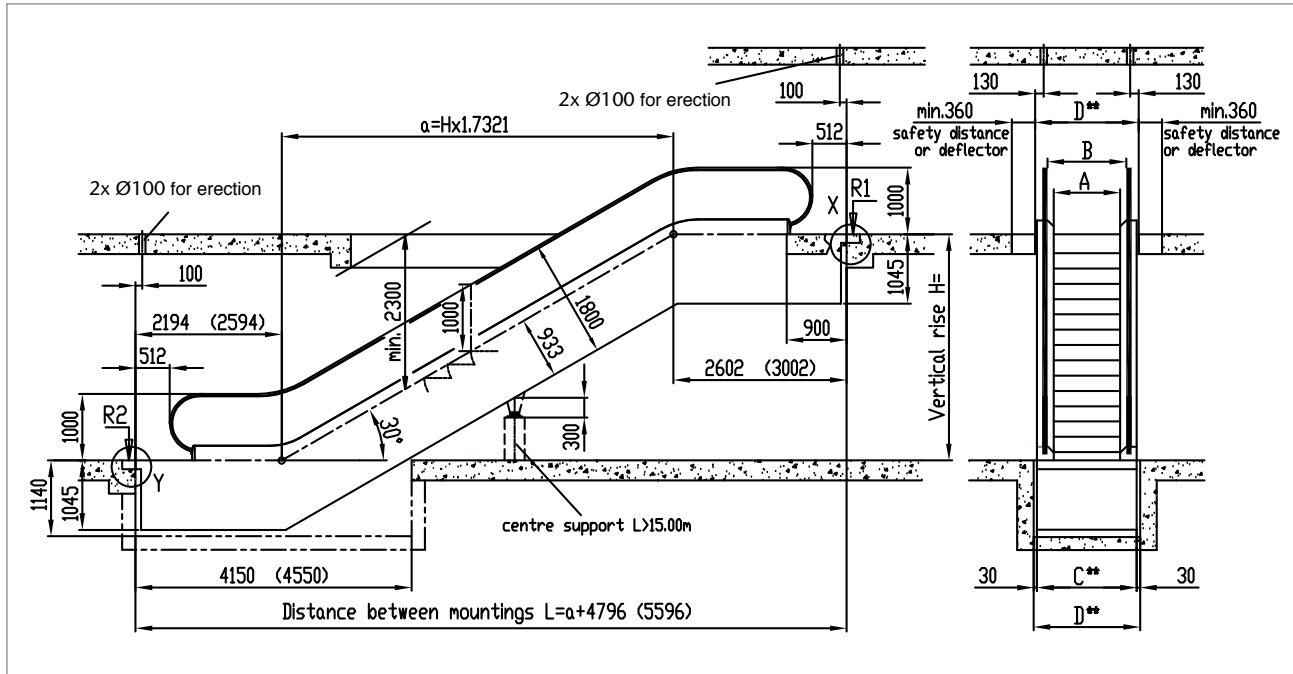
If you would like to obtain the exact dimensions for your specific project, we recommend you use the Escalator Design Tools, which can be found within the InfoPack.

# KONE EcoMaster™ 130 planning dimensions

Architectural planning data

**30° inclination / 1.5 transition radii / 2 or 3 horizontal steps at each landing**

Code: EN 115-1:2008<sup>1)</sup>



- All dimensions are in millimeters
- Dimensions in brackets (...) are for 3 horizontal steps
- Maximum vertical rise with:
  - two horizontal steps at each landing is 6000 mm
  - three horizontal steps at each landing is 14200 mm
- Intermediate truss support required, if the distance between mountings (L) exceeds 15000 mm (max. deflection is 1/750 of L)
- For higher rises or stand-by speed, please contact your local KONE sales organization
- \*\*For special external panels, the escalator and pit widths will increase by 20 mm per covered side
- Access opening 2500 mm wide and 3300 mm high into and through the building is required

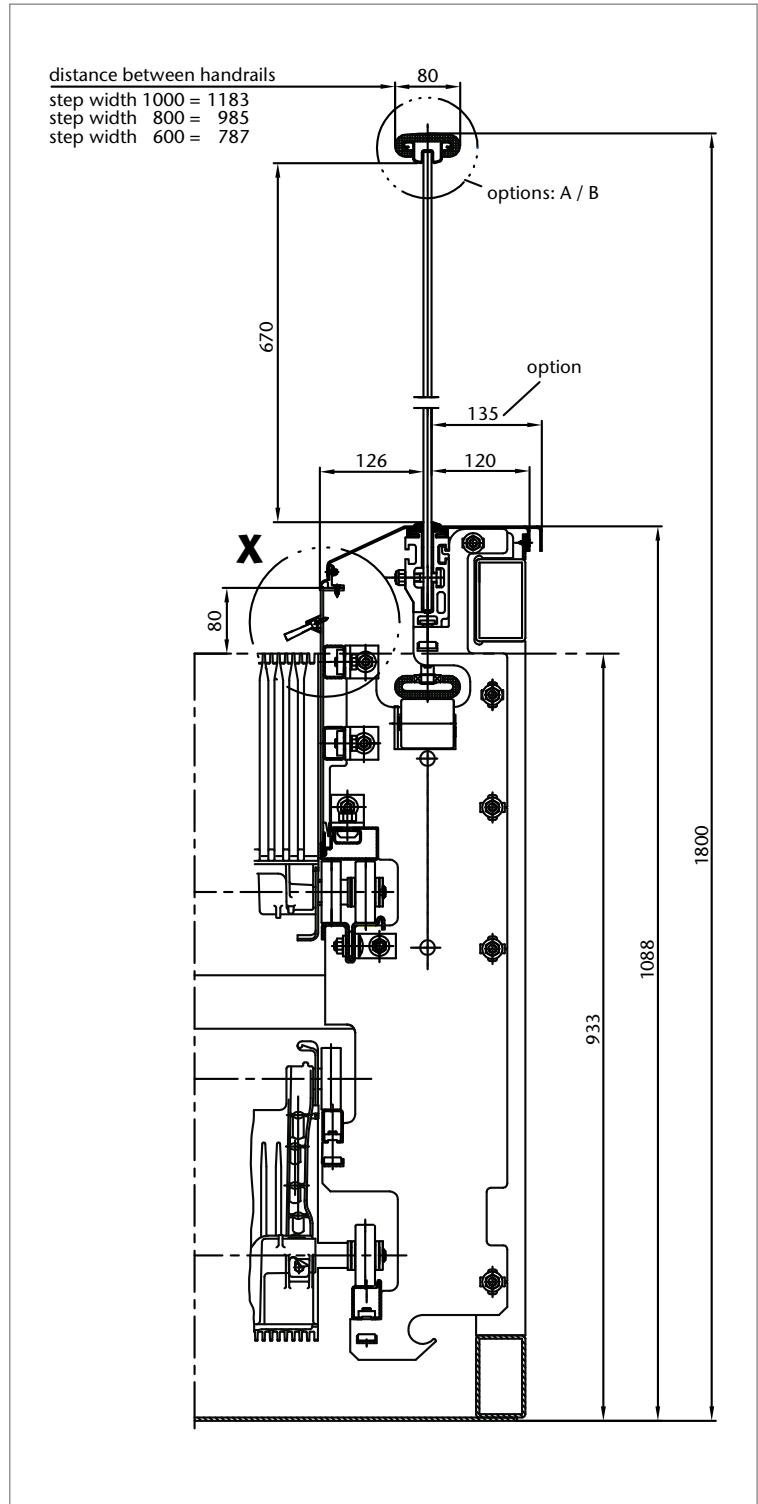
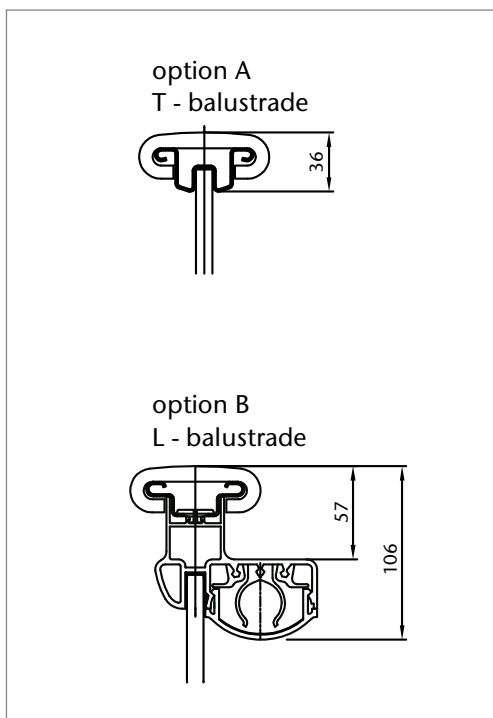
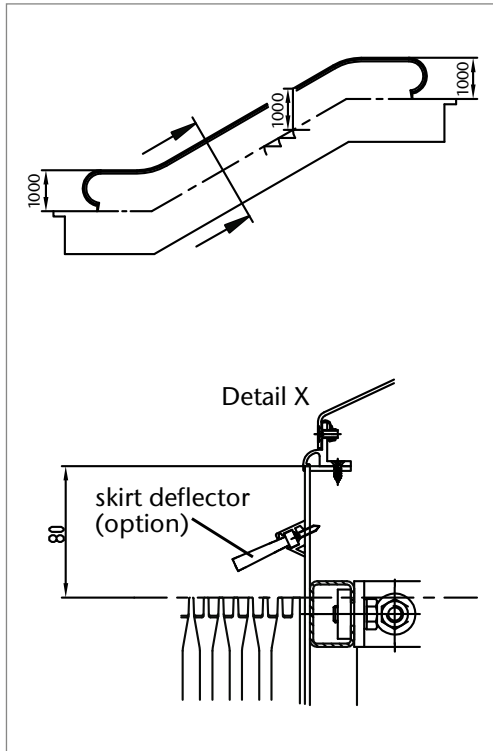
## Architectural planning data

Description	Step width (A)			
	600 mm	800 mm	1000 mm	
Width between handrails (B)	787	985	1183	
Width of escalator (C**)	1100	1300	1500	
Width of pit (D**)	1160	1360	1560	
Support loads (kN)	upper (R1)	L/1000 x 4.2 + 8	L/1000 x 4.8 + 11	L/1000 x 5.4 + 11
	lower (R2)	L/1000 x 4.2 + 3	L/1000 x 4.8 + 3	L/1000 x 5.4 + 3

<sup>1)</sup> Other local codes dimensional requirements are available upon request, please contact your local KONE Sales representative for more information.

# Balustrade details

Glass balustrade 30°



Note:

The solid inclined balustrade is also available with this package, please contact your local KONE sales representative for more details.

If you would like to obtain the exact dimensions for your specific project, we recommend you use the Escalator Design Tools, which can be found within the InfoPack.



KONE provides innovative and eco-efficient solutions for elevators, escalators and automatic building doors. We support our customers every step of the way; from design, manufacturing and installation to maintenance and modernization. KONE is a global leader in helping our customers manage the smooth flow of people and goods throughout their buildings.

Our commitment to customers is present in all KONE solutions. This makes us a reliable partner throughout the life-cycle of the building. We challenge the conventional wisdom of the industry. We are fast, flexible, and we have a well-deserved reputation as a technology leader, with such innovations as KONE MonoSpace®, KONE MaxiSpace™, and KONE InnoTrack™. You can experience these innovations in architectural landmarks such as the Trump Tower in Chicago, the 30 St Mary Axe building in London, the Schiphol Airport in Amsterdam and the Beijing National Grand Theatre in China.

KONE employs over 34,000 dedicated experts to serve you globally and locally in over 50 countries.

**KONE Corporation**  
**[www.kone.com](http://www.kone.com)**

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