

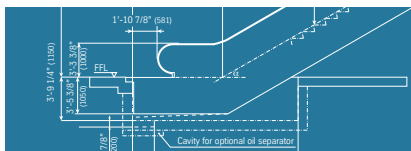


Escalators and Moving Walks planning guide

ThyssenKrupp Elevator
Americas Business Unit



ThyssenKrupp



Planning for Perfection Our Commitment to Customers

Onward and Upward!

The world is in constant motion. Every day sees a growing flow of active people winding their way through urban landscapes. This flow creates high demands in a fast-paced environment, and ThyssenKrupp Elevator's escalators and moving walks convert chaos into simple pleasure.

Escalators and moving walks are an indispensable part of a mobile society. Whether in department stores, train stations, modern stadiums, luxury casinos, hotels, office complexes or airports, ThyssenKrupp Elevator products keep people moving safely and effectively in virtually all areas of public life.

This brochure has been prepared to introduce you to ThyssenKrupp Elevator's escalators and moving walks, while assisting you with the planning of your projects. Our experts look forward to working with you to implement new and creative ideas.

For additional assistance with your escalator planning needs, call (877) 230-0303 (toll-free) to reach a ThyssenKrupp Elevator sales representative.

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Accept No Limits.

ThyssenKrupp Elevator, a segment of the parent company ThyssenKrupp AG, is the largest elevator company in the Americas. ThyssenKrupp Elevator has been and continues to be the market leader in the manufacturing, installation and service of elevators, escalators and moving walks. With seven manufacturing plants in North and South America and more than 200 branch and service locations, ThyssenKrupp Elevator can meet all your vertical transportation needs.

The Americas Business Unit Division oversees all aspects of business for ThyssenKrupp Elevator operations in the United States, Canada, Mexico, Central and South America. It is the only North American manufacturer of complete elevator systems. The Americas Business Unit Division has 12,000 employees across its territories.

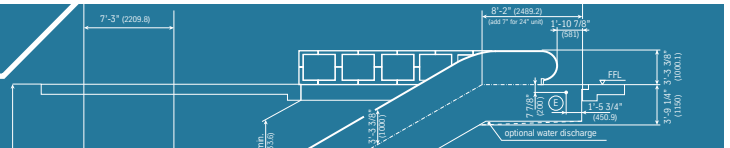
International Presence

The Elevator division of ThyssenKrupp AG is one of five core business units, which also include steel, stainless, services and technologies. ThyssenKrupp Elevator employs 40,000 people in over 800 locations worldwide. The corporation is the third largest elevator company in the world. ThyssenKrupp AG, ThyssenKrupp Elevator's parent company, is based in Germany, and has 193,000 employees worldwide.

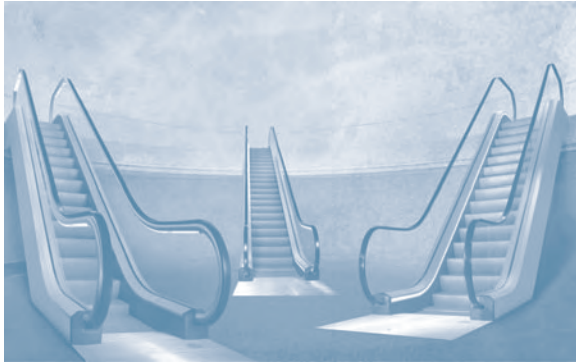
ThyssenKrupp Elevator supports the LEED Green Building Rating System™, a voluntary consensus-based national standard for developing high-performance, sustainable buildings through its Green Building Products.

To locate the ThyssenKrupp Elevator office nearest you visit www.thyssenkruppelevator.com or call (877) 230-0303 (toll-free).

Planning for Perfection Escalator and Moving Walk Overview



Commercial Duty Escalators



Two models, one distinction. More design features for modern buildings, including under-handrail lighting, stainless steel or custom powder-coated finishes. All models combine attractive design with the latest escalator technology for increased comfort and safety. Available for both indoor and outdoor applications.

Heavy Duty Escalators



Never have high-traffic escalators looked so good. Whether with a glass or metal balustrade, the heavy-duty models are made to direct the traffic of tomorrow. Economical, robust, and featuring advanced technology, our heavy-duty line is designed specifically for high-traffic, higher-rise institutional applications. Available for both indoor and outdoor applications.

Transit Duty Escalators



Our most powerful model. Extremely capable and designed for reliable 24-hour service, this escalator was designed for subway and other extreme high-traffic applications, designed with travel heights up to 165'-0" (50 m). Fully APTA (American Public Transit Association) compliant. Available for both indoor and outdoor applications.

Moving Walks



A range of lighting systems and balustrade profiles make ThyssenKrupp moving walks the perfect complement for shopping malls, exhibition centers and airports. Its innovative design, coupled with state-of-the-art engineering and technology, gives it exemplary qualities for adapting to the prevailing architecture. Available for both indoor and outdoor applications.

ThyssenKrupp Elevator outdoor application escalators include as a minimum :

Galvanized truss structure, protective chain covers, automatic lubrication, handrails with nylon sliders, stainless steel handrail guides, oil/water separator in lower pit floor and stainless steel fasteners for all exposed surfaces.

Velino Commercial Duty Escalator

Restrained and inviting.

Conspicuously discreet: The Velino Commercial Duty escalator features a design oriented, slim line balustrade. The remarkable lightness of the Velino is due to its 40-inch high balustrade and innovative, almost invisible, handrail guide which leaves the impression that the handrail rides directly on the glass.

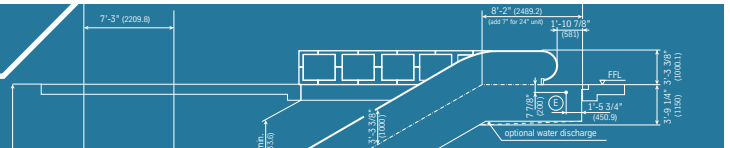
The Velino escalator's cultured reserve and clean lines never place it in competition with the surrounding architecture. Rather, it leaves the architect with the opportunity to establish carefully placed accents in both new and existing environments.

Remarkable. Dependable.
That is what you get from the
ThyssenKrupp Elevator label.



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Velino Commercial Duty Escalator



Enduring and elegant.

A machine that moves thousands of people every day must be properly equipped to do so. The Velino Commercial Duty escalator is a workhorse, available with a reinforced aluminum under-handrail profile that can take any passenger volume in stride.



ThyssenKrupp's Velino escalator proves that stability and elegance are not mutually exclusive. The balustrade's 3/8" (10mm) thick tempered safety glass panels and optional under-handrail lighting provide the Velino escalator with striking aesthetics while performing under the most demanding of conditions.

We have, however, given the Velino escalator more than just an attractive look. It is the most technologically advanced escalator currently available. Dual CPU controllers and optional VVVF drive technology keep the Velino products at the front of the class.

The Velino escalator is also available with a hi-deck, stainless steel balustrade design suitable for building locations where glass balustrades may not be desirable; ie where walls or other building structures are directly adjacent to the escalators.

Tugela Heavy Duty Escalator

Convincing over short and long distances.

With its discreet 40-inch high glass balustrade, ThyssenKrupp's Tugela escalator fits perfectly into every environment. As much as it flatters the eye of the observer, it pampers the user with incomparable ride comfort. This escalator is typically designed for higher-rise applications [$>33'-0"$ (10058 mm)] and locations where heavy crush loads are the norm, such as convention centers, stadiums and airports. Increased motor and chain sizing, combined with modified handrail drive and tension carriage design, separate the Tugela from the Velino product line.

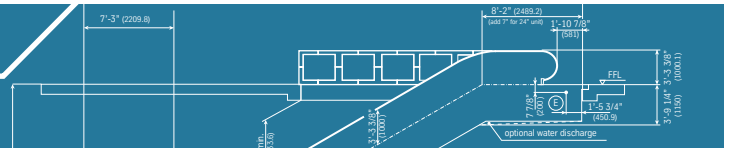
Naturally, the reinforced balustrade is made of tempered safety, making it resistant to bumps and knocks from bags and cases. Moreover, a world of customized options is available, including diverse glass colors and optional under handrail lighting.

No matter what ideas you have in mind for your heavy-duty escalator, we assure you that these can be realized with the Tugela escalator.



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Tugela Heavy Duty Escalator



Always on track for success.

ThyssenKrupp's Tugela escalator has performance and efficiency that are evident from a distance. But to regard it as a pure power packet would do it an injustice: its stainless steel, high-deck balustrade design will complement every enclosed environment.



Constructed for demanding operational requirements in large transport facilities or underground railway stations, the Tugela escalator will handle all of your needs.

From tropical climates to the most frigid regions, ThyssenKrupp's escalators have you covered. Warm-weather climates do not affect Tugela's perfection in performance. And for cold-temperature areas, we offer an optional integrated heating package to melt ice and snow to assure passenger safety. This feature is available on *all* ThyssenKrupp Escalator models.

Our escalators are made individually to suit the specific building design parameters.

Victoria Transit Duty Escalator

The one that sets the masses in motion.

There are moments in the life of an escalator when it would be ill advised to stop; for example, when large numbers of people are taking it by storm. Wherever such moments arise, ThyssenKrupp's Victoria transit duty escalator is the ideal solution.

The Victoria transit duty escalator is the strongest, most powerful ThyssenKrupp model. Its purpose-developed chain with external 4" rollers accommodates rises up to 164'-0" (50 m). With its specially reinforced drive system, it is capable of maximum performance at full-load capacity around-the-clock.

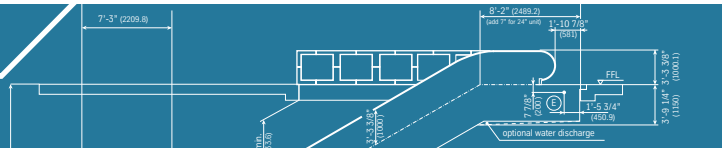
Minimum failure rates, maximum safety standards and optimum servicing simplicity allow for problem-free operation. No wonder the Victoria is constantly putting in an appearance at the most frequented places in the world: railway stations, airports, subway stations, and wherever else there's plenty of life - day in, day out.

Available with glass or high deck balustrades, ThyssenKrupp's Victoria product is fully APTA compliant.



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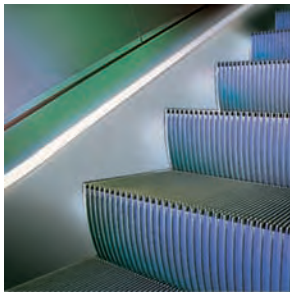
Escalator Options A Touch of Class



Skirt variants - optionally available in stainless steel:



Anti-friction coated skirts
without lighting.



Anti-friction coated skirts
with skirt-band lighting.

Outer cladding variants:

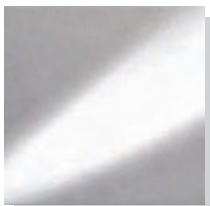
Stainless steel



Aluminum black ribbed

Brushed stainless steel

Floor plates:



Mirror

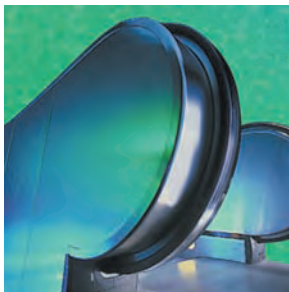


Aluminum plain ribbed

Aluminum

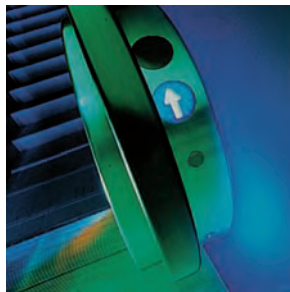
Balustrade decking profiles:

Extremely durable:



The robust high deck, metal balustrade can take almost anything.

Flowing traffic:



The optional signal clearly shows the direction for a smooth traffic flow.

Glass



Stainless steel
structure-etched

Powder coating



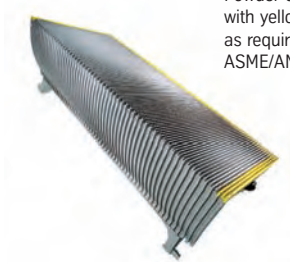
Aluminum checker plate

Skirt brushes:



Factory-installed skirt brushes keep passengers at a safe distance.

Step variants:



Powder coated silver
with yellow demarcation
as required by
ASME/ANSI/CSA codes.



Powder coated black grooves with yellow demarcation as required by ASME/ANSI/CSA codes.

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Orinoco Moving Walks

Reliable and resilient.

Airports increasingly play a major role in modern urban life. They are transport hubs for an endless flow of people on a round-the-clock basis. It is therefore no surprise that moving walks made by ThyssenKrupp are frequently found in these sensitive locations.

ThyssenKrupp's Orinoco moving walk, with its continuous 40-inch high 3/8-inch thick tempered safety glass balustrade, takes knocks and bumps from suitcases, bags and luggage carts in stride.

The qualities of this moving walkway, however, are not limited to its exterior attributes. Quality at ThyssenKrupp Elevator has always been the sum total of all factors. Hidden away on the inside is new conveyor technology that delivers the highest reliability which is essential to meet present day requirements.

A workhorse like this, however, need not look like one. Therefore, a multitude of design options allows the moving walk to harmonize perfectly with any type of architecture.



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[illegible]

Skirt decking profiles:



Anodized silver



Anodized light gold

Brushed stainless steel

Powder coated

Powder coated black grooves with yellow demarcation as required by ASME/ANSI/CSA codes.

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Planning for Perfection Overview

1. Travel speeds and transport capacities

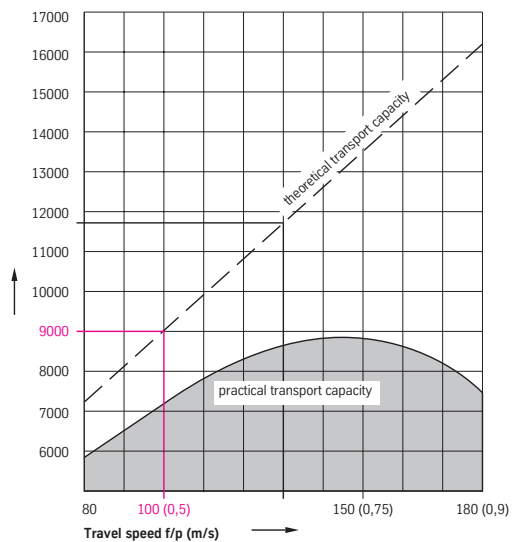
Escalators and moving walks can continuously move passengers. Consequently, their transport capacity is much greater than that of elevators.

Travel speed of escalators is limited by code to 100 f/m (0.5 m/s). For moving walks with 0-8 degree inclination, the speed can be increased up to 180 f/m (0.9 m/s).

The chart illustrates the discrepancy between theory and practice: The theoretical transport capacity is useful during the selection procedure. In practice, only approximately 80% of this figure is achieved.

For example, passengers tend to be hesitant at higher rises and higher speeds when stepping onto the step or pallet band. Even with larger step or pallet widths, the possibility to pass is not always utilized. Even so, higher speeds and wider steps or pallets, ensure travel comfort and a considerable reduction of travel time.

Persons/hour
at 40" (1000 mm) nominal step width.



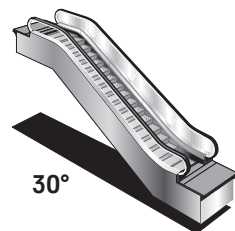
2. Travel heights and inclinations.

Escalators

With a rise of only 6'-0" (1829), an escalator can considerably improve access to the building for the visitor. Furthermore, ThyssenKrupp Elevator has designed escalators to reach a rise of 164'-0" (50 m). Code limits the inclination angle to 30° in the US and Canada.

Moving Walks

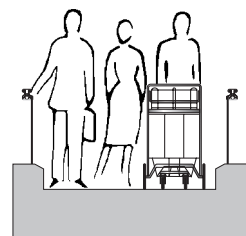
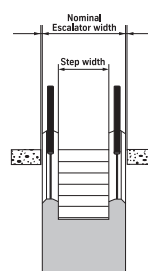
Inclined moving walks typically used in shopping center and retail applications are permitted a maximum angle of 12°. For extended travel distances, e.g. trade fairs and airports, horizontal moving walks which enable the use of wider pallets are the most efficient option.



3. Step and pallet widths.

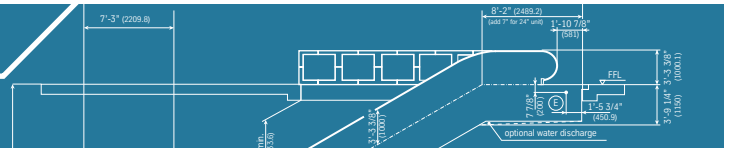
An optimum choice needs to be made here: Neither excessively wide nor narrow steps or pallets represent a balanced ratio between the space required and the transport capacity, between travel comfort and cost.

Based on the cross-sections, you can see the required space of your escalators and moving walks. A clearance of 1 1/4" (30mm) for installation must be added to the dimensions on either side of the escalator or moving walk. The standard escalator step width for the North American market is 40" (1000 mm).



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Planning for Perfection Dimensions and Data



Escalators:

Code Reference for North America: Latest ANSI A17.1/CSA-B44.
EN115 available for other jurisdictions.

Inclination and rise.

	VELINO	TUGELA	VICTORIA
Angle of inclination	30°	30°	30°
Rise	Up to 33'-0" (10.05 m)	Up to 65'-7" (20 m)	Up to 164'-0" (50 m)

Theoretical transport capacities and dimensions for all escalators.

Nominal Step Width	Truss Width	Pit Width	Persons per hour 100 f/m (0.5 m/s)
24" (600 mm)	3' - 8 1/4" (1124 mm)	3' - 10" (1168 mm)	4500
32" (800 mm)	4' - 4 3/8" (1330 mm)	4' - 6 3/4" (1391 mm)	6750
40" (1000 mm)	5' - 1/4" (1530 mm)	5' - 2 5/8" (1591 mm)	9000

Moving Walks:

Inclination and rise.

ORINOCO FS 982/983	
Angle of inclination	0-6°, 10°, 12° (Max.)
Length	Up to 656'-2" (200 m)
Rise (12°)	Up to 29'-7" (9 m) ¹

Theoretical transport capacities and dimensions for all moving walks.

Nominal Pallet Width	Truss Width	Pit Width	Persons per hour 100 f/m (0.5 m/s)	Persons per hour 125 f/m (0.65 m/s)
32" (800 mm)	4' - 4 3/8" (1330 mm)	4' - 6 3/4" (1391 mm)	6750	8775
40" (1000 mm)	5' - 1/4" (1530 mm)	5' - 2 5/8" (1591 mm)	9000 or 900 C/h ²	11700
48" (1200 mm)	5' - 8 1/4" (1734 mm)	5' - 10 5/8" (1794 mm)	11250 or 900 C/h ² + 3000	14625
56" (1400 mm)	6' - 4 1/4" (1937 mm)	6' - 6 5/8" (1997 mm)	13500 or 900 C/h ² + 4500	17550
64" (1600 mm)	7' - 1/4" (2140 mm)	7' - 2 5/8" (2200 mm)	15750 or 900 C/h ² + 6750	20475

1. Shopping carts per hour (includes. 1 "operator": cart length 40" (1 m) and width 24" (0.6 m)

2. Greater transport lengths or rises on request

Note: A maximum inclination of 12° is permitted for moving walks. If the pallet width exceeds 40" (1000 mm), a maximum inclination of 6° is permitted by code.

Note: For moving walks with 0° inclination, a maximum pallet width of 64" (1600 mm) is permitted.

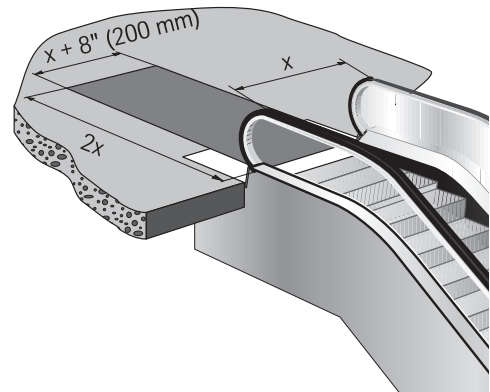
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Planning for Perfection Safety Manual

1. Safety zone.

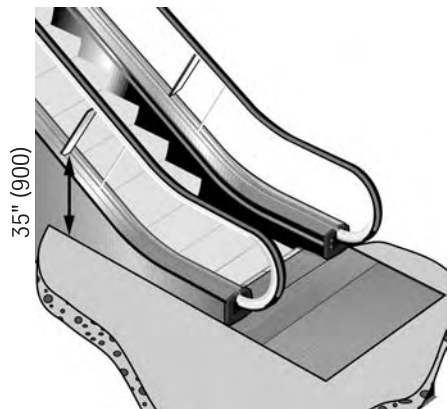
The entry and exit zone shall be kept clear of all obstacles. The width of the zone shall be not less than the width between the centerlines of the handrail plus 8" (200 mm). The length of the zone, measured from the end of the newel, shall be no less than twice the distance between the centerlines of the handrail. Space shall be provided to accommodate all traffic in the safety zone.

Note: These dimensions are absolute minimums.



2. Additional deck barricade.

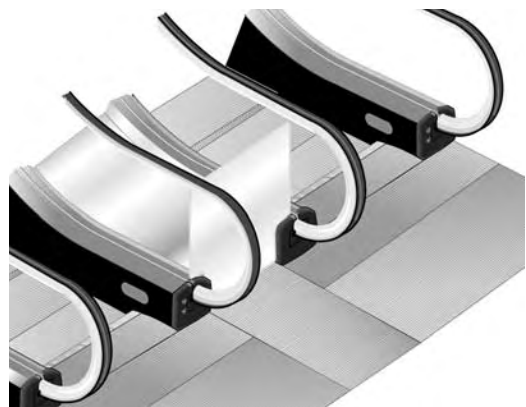
The use of a railing or an additional deck barricade located at a height of 35" (900 mm) prevents people from getting onto the escalator or moving walk from the outside of the balustrades, when outer decking exceeds 5" (127 mm), "Supplied by others".



3. Infill panels.

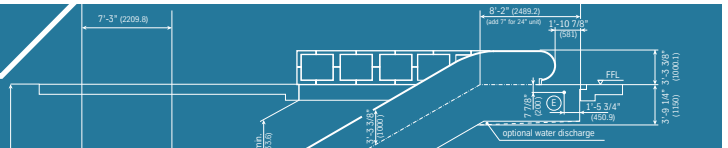
With parallel escalators or moving walks, the maximum distance between the balustrades can be 4" (100 mm). With a larger distance, an infill panel is required.

Note: According to the diagram, an infill panel must be installed, "Supplied by others".



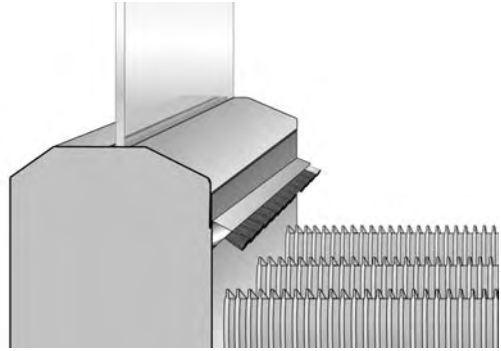
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Planning for Perfection Safety Manual



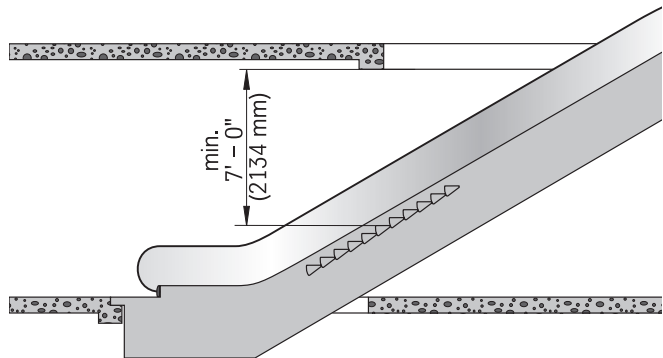
4. Skirt brushes.

Skirt brushes are intended to prevent passenger foot entrapment within the step/skirt running clearance. Factory-installed skirt brushes are featured on all ThyssenKrupp Elevator's escalators and moving walks.



5. Clear height above steps.

The clearance above the step or pallet band must be at least 7' - 0" (2134 mm) at every location as required by code.

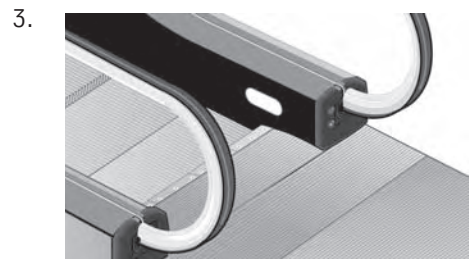
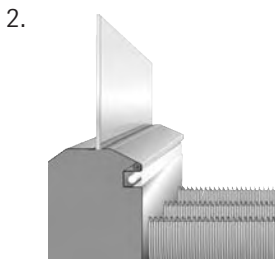
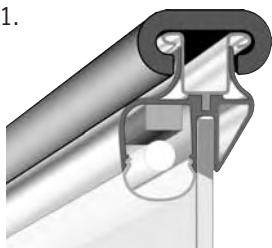


6. Lighting.

In order for passengers to step safely onto escalators, the step or pallet band must be adequately lit. The ambient building lighting must be at least 50 Lux along all parts of the step band. ThyssenKrupp additionally offers various additional lighting options.

For example:

1. Above the balustrade (under handrail)
2. Integrated in the skirt band (skirt lighting)
3. At the comb-plates (combplate lighting)



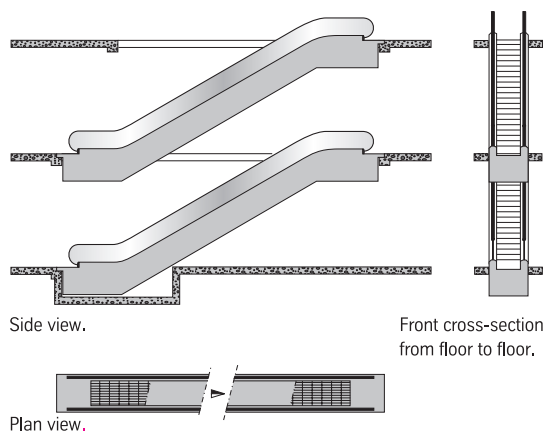
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Planning for Perfection Installation Possibilities

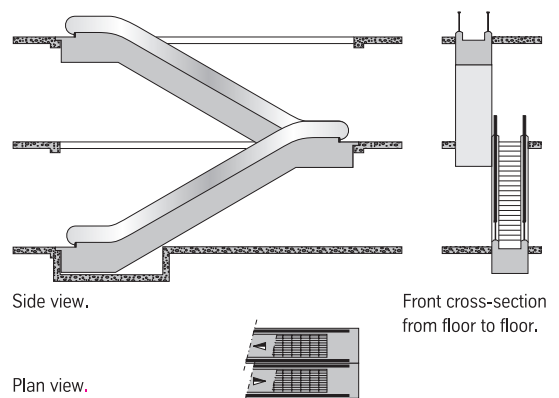
Examples showing arrangements.

There are various possibilities for positioning escalators in a building. Shown are several examples of the most frequently used arrangements. Depending on the requirement, you can decide whether passengers are to be conveyed quickly from floor to floor or whether they may be led through promotional areas.

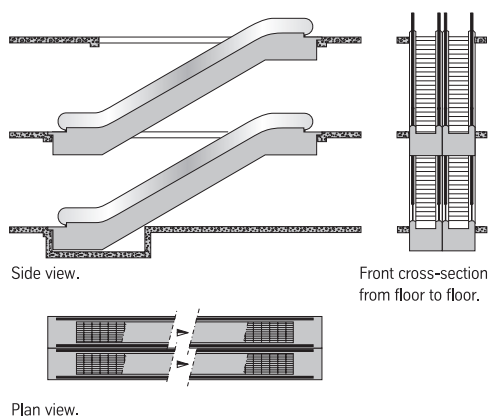
ThyssenKrupp escalators are designed so that they can be operated in both directions. That is why at the planning stage, you do not need to decide the direction of travel.



Escalator in one direction of travel (route interrupted): With this arrangement, the passengers are guided past promotional areas. To go from one floor to the next, they are forced to walk back along the side of the escalator.



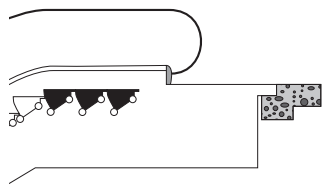
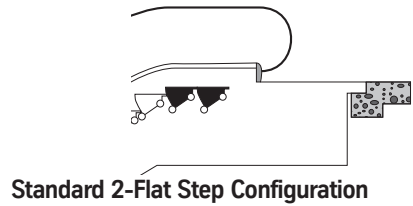
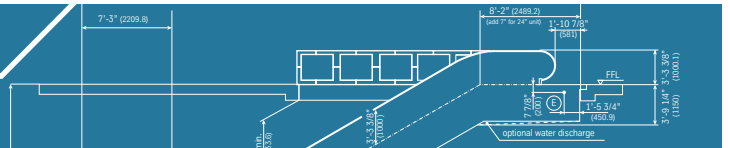
Escalators in one direction of travel (continuous): Quickly and easily, the passengers move from floor to floor through short changeover paths.



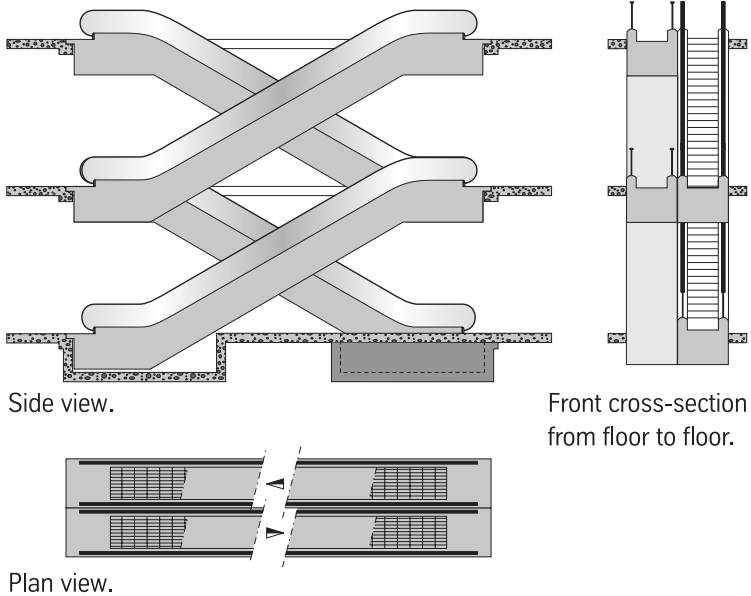
Escalators for both directions of travel: This arrangement is characterized by increased travel comfort for the customers, since escalators are available for the upward and downward direction. The promotional areas on both sides of the escalators are given greater attention.

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Planning for Perfection Installation Possibilities

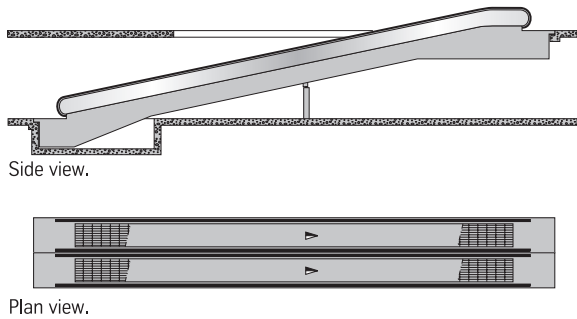


Optional 3-Flat Step Configuration Used typically for rises greater than 25' - 0" (7620 mm).

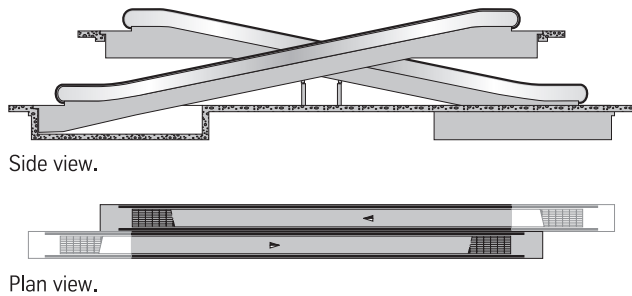


Criss-cross arrangement: The passengers can get to and from the upper floors quickly and easily through short changeover paths.

Moving Walks:



Inclined moving walks in parallel.



Criss-cross arrangement: Moving walks with top and bottom transition curve in criss-cross arrangement.



Horizontal moving walk.



Ramped horizontal moving walks: Where no continuous pit is possible. The inclination of the ramp can be up to 12° [maximum 6° when pallet width exceeds 40" (1000 mm)].

Additional notes:

- ❖ Upper well ventilation is not required for escalators and moving walks.
- ❖ A lower pit-floor cut-out is required to house the oil-water separator for outdoor applications.

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Planning for Perfection Preparations by Others

Perfect planning also includes optimum installation planning. That is why on the following pages we have listed everything that needs to be planned and carried out on site, to ensure easy installation of your escalators and moving walks.

1. Installation timing.

Whenever possible, schedule escalator delivery to take place prior to the installation of subsequent floor slabs, ceilings, roofs and any other overhead obstructions.

2. Access openings, transport route load capacity.

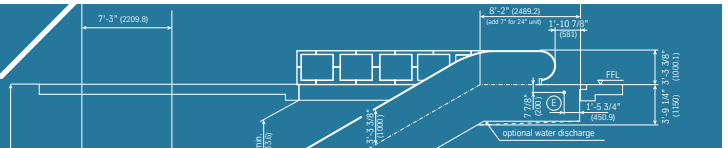
Normally, escalators / moving walks are moved in by crane through a suitable overhead opening. Another option is to bring the escalator / moving walk in through a suitable opening at the ground floor. It is important that the route to the assembly location within the building is free of obstacles and level, and the ceiling can support the hoist load. Otherwise, appropriate shoring must be provided.

An escalator [e.g. with a travel height of 17'-6" (5.3 m)], at an angle of 30°, weighs 17,747 lb (8050 kg). Therefore please check that the floor of the building will bear the transport weight of your escalator. Otherwise, additional floor under-pinning support will be required during the installation period.

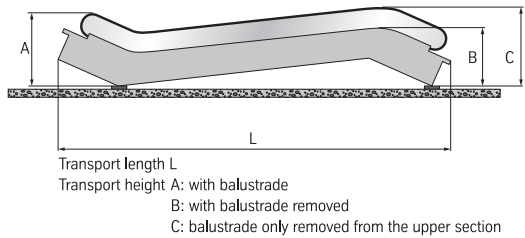


Minimum building access opening of 11'-6" (3.5 m) x 11'-6" (3.5 m).

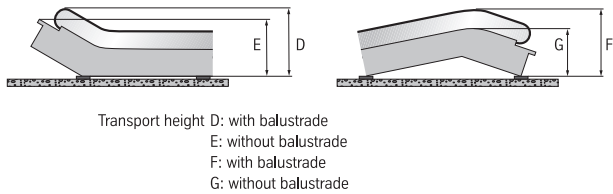
Planning for Perfection Preparations by Others



Completely assembled escalator. Dimensions To Be Confirmed.



Split escalator. Dimensions To Be Confirmed.



3. Special delivery.

In order to deliver your system into the building and to assemble it ready for use in a timely manner, take note of the following during the planning stage:

- ❖ In most cases it is not possible to bring the complete escalator / moving walk into the building. In this case we dismantle the balustrades before delivering the escalators / moving walks.
- ❖ Some escalators / moving walks are so long that they have to be installed in sections. In this case, we manufacture a split escalator / moving walk at the factory and join the truss sections together on site.



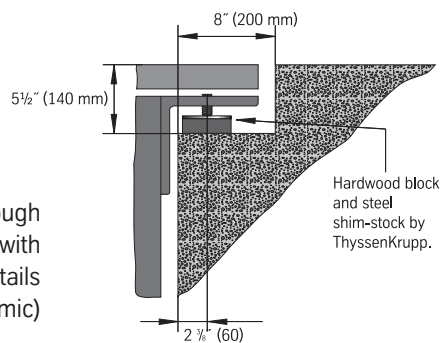
4. Overhead openings.

We will notify you of the location and size of the required ceiling/roof openings. Please ensure the required opening dimensions are made available.

5. Top and bottom supports. (Seismic zones vary)

When you design the support recesses please take into account the support loads. They are shown on the installation drawing, i.e. at those locations where the supports of your escalator (or your moving walk) will be placed, the supports must be able to bear the weight of the escalator including 105lbs/ft² traffic load. When preparing the supporting structures, the dimensions and reactions indicated on our installation plans must be precisely adhered to.

Side view through
the support with
details
(Non-Seismic)



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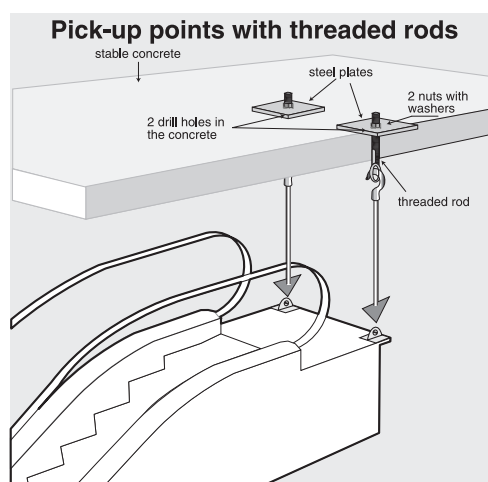
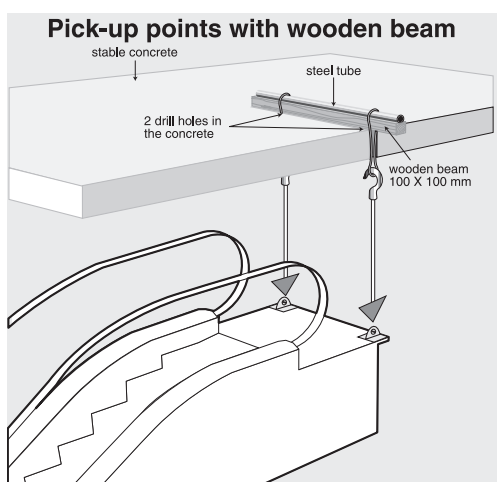
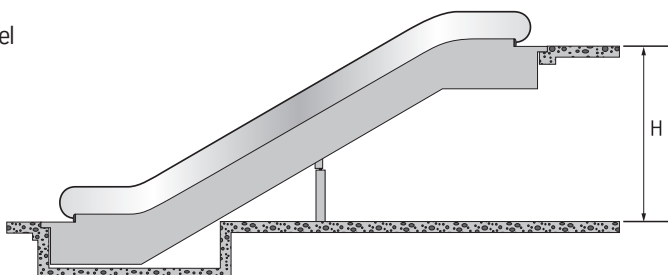
Planning for Perfection Preparations by Others

6. Intermediate supports.

Intermediate supports are needed on escalators with a considerable travel height and on long moving walks. We will inform you if an intermediate support is required and will assist with determination of its location.

Typically, an intermediate support is required:

- 2 flat step design: $H > 26'-6"$ (8077 mm)
- 3 flat step design: $H > 24'-10"$ (7569 mm)



7. Pick-up points by others.

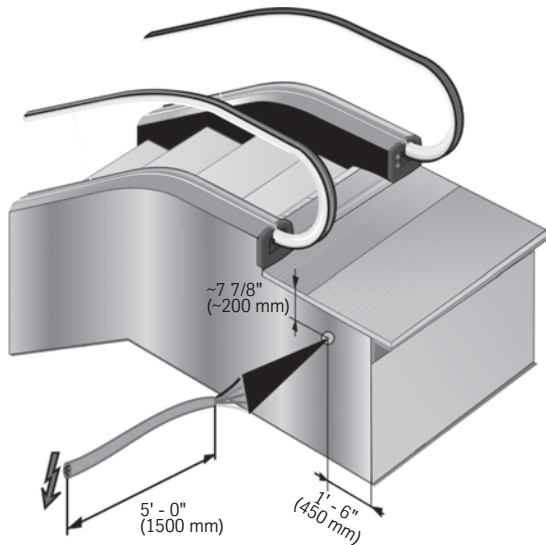
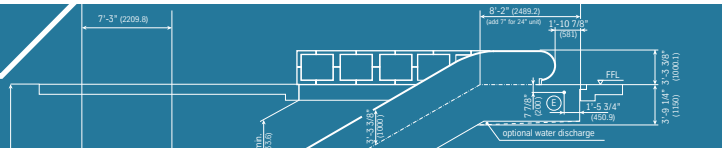
You will be responsible for fitting pick-up points for hoisting and supporting the escalator during assembly. These should be located exactly above the center of the supporting points. For systems with several supporting structures please plan for additional pick-up points above the intermediate supports. All pick-up points must be capable of taking a load strain of 11,240 lb (50 KN).

8. Truss cladding.

The exterior cladding of the truss (unless otherwise specified) is supplied by others. Weight of cladding not to exceed 10 lb/ft² (48.82 kgf/m²).

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Planning for Perfection Preparations by Others

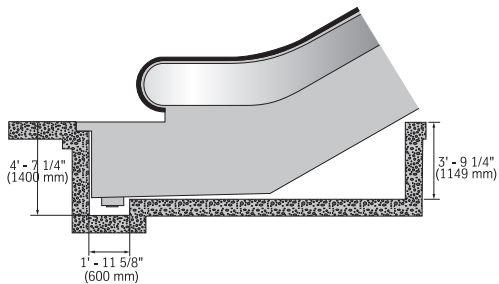


9. Electrical connection.

Our diagram shows where escalators and moving walks are connected to the power supply. Power supply is always located at the upper well. Please note that electrical cables are inserted at a distance of 1'-6" (450 mm) on the side of the support and that the length of the cable on the inside of the escalator must be about 5'-0" (1500 mm). With complex controls, such as those usually required for escalators and moving walks in transit installations, the escalator control equipment may be installed in a separate room. The power supply cable must be installed in this separate control room. In case of additional soffit lighting, a separate power supply must be provided in time. The power connection must be provided by an authorized electrician assigned by the owner's representative.

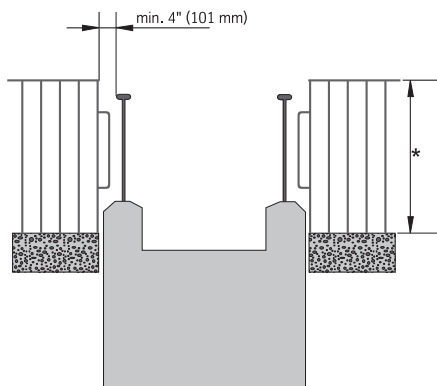
10. Sprinkler piping.

Sprinkler piping, if required, is to be located in a bulkhead below the underside of the truss.



11. Oil separator.

A type-proofed oil separator is essential for escalators and moving walks which are designed for outdoor exposure. ThyssenKrupp supplies an oil/water separator in the lower well for all outdoor-exposure products. At the construction site, a recess and drain must be provided for the oil separator in the pit.



12. Railing by others.

In the threshold areas of the escalators, a railing must be installed by others. The distance to the escalator handrail must be at least 4" (101 mm).

- * Ornamental protective handrail supplied by others, height determined by local code. Typically: 42" (1067mm)

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Work by others Escalators and Moving Walks

Escalators

A. Provision of proper building dimensions and suitable floor openings, properly framed with suitable reactions and finished in accordance with escalator shop drawings. Variations not to exceed 1" at any point.

B. Supporting structure for the escalators and enclosure walls, external railing, guards, closures, shutters and smoke barriers as required.

C. Waterproof lower well space and provide lower pit drainage (as required).

D. Fire-rated exterior cladding of truss and finish from the edges of escalator deck covers, including ends, sides and bottom of truss in accordance with applicable and standard weight restrictions. (max. 10 lbs. per square foot)

E. Access panels or doors to interior of escalator if required by unusual layout conditions.

F. Provision of flexible in-fill and finished flooring adjacent to floor plates and escalator after installation.

G. Cutting of floors, walls, ceilings or partitions together with any repairs made necessary by such cutting.

H. Painting and finish work required beyond that included in this section.

I. Electrical service to upper well including 3 phase main power supply and fused disconnects to each controller. Provide single phase 120 VAC electrical service and fused disconnect for light and convenience outlet in the upper well and all other electrical devices that are not a part of the escalator proper that may be required by local authorities.

J. Provision of wiring and conduit from the closest wellway of each escalator group or single escalator to the firefighter's control room and/or console as required. Coordinate with escalator contractor for size, number and location of conduit.

K. Other work required for installation of the escalator(s) including, but not limited to, required changes to sprinklers, lighting, electrical, air conditioning and heating systems. Provide barriers for open wellways during construction per OSHA regulations.

L. Protect escalator truss, steps, landing plates, balustrades, handrail, and special metal finishes from damage during construction.

Moving Walks

A. Provision of proper building dimensions and suitable floor openings, properly framed with suitable reactions and finished in accordance with moving walk shop drawings. Variations not to exceed 1" at any point.

B. Supporting structure for the moving walks and enclosure walls, external railing, guards, closures, shutters and smoke barriers as required.

C. Waterproof lower well space and provide lower pit drainage (as required).

D. Fire-rated exterior cladding of truss and finish from the edges of moving walk deck covers, including ends, sides and bottom of truss in accordance with applicable and standard weight restrictions. (max. 10 lbs. per square foot)

E. Access panels or doors to interior of moving walk if required by unusual layout conditions.

F. Provision of flexible in-fill and finished flooring adjacent to floor plates and moving walk after installation.

G. Cutting of floors, walls, ceilings or partitions together with any repairs made necessary by such cutting.

H. Painting and finish work required beyond that included in this section.

I. Electrical service to upper well including 3 phase main power supply and fused disconnects to each controller. Provide single phase 120 VAC electrical service and fused disconnect for light and convenience outlet in the upper well and all other electrical devices that are not a part of the moving walk proper that may be required by local authorities.

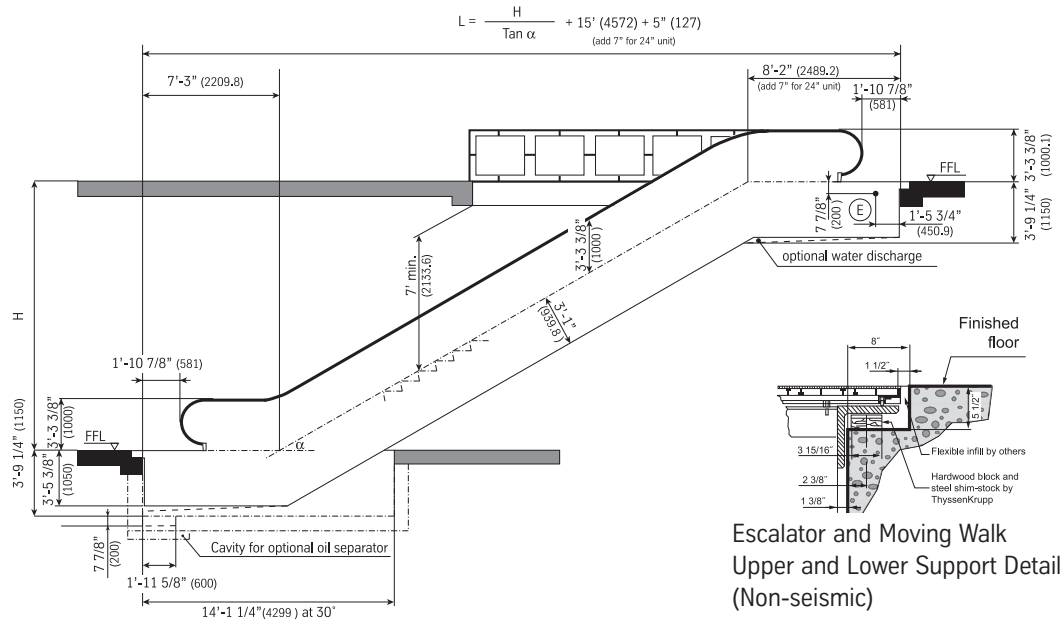
J. Provision of wiring and conduit from the closest wellway of each moving walk group or single moving walk to the firefighter's control room and/or console as required. Coordinate with moving walk contractor for size, number and location of conduit.

K. Other work required for installation of the moving walk(s) including, but not limited to, required changes to sprinklers, lighting, electrical, air conditioning and heating systems. Provide barriers for open wellways during construction per OSHA regulations.

L. Protect moving walk truss, steps, landing plates, balustrades, handrail, and special metal finishes from damage during construction.

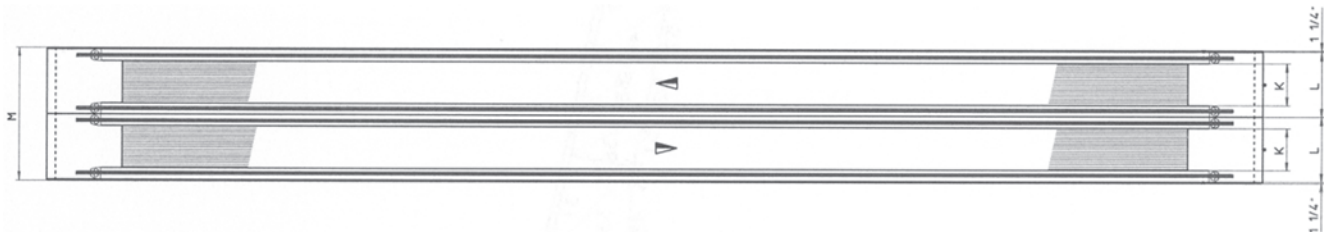
Escalator and Moving Walk Section and Plan Views

Escalator Section View, 30°



Escalator and Moving Walk
Upper and Lower Support Detail
(Non-seismic)

Escalator/Moving Walk Plan View



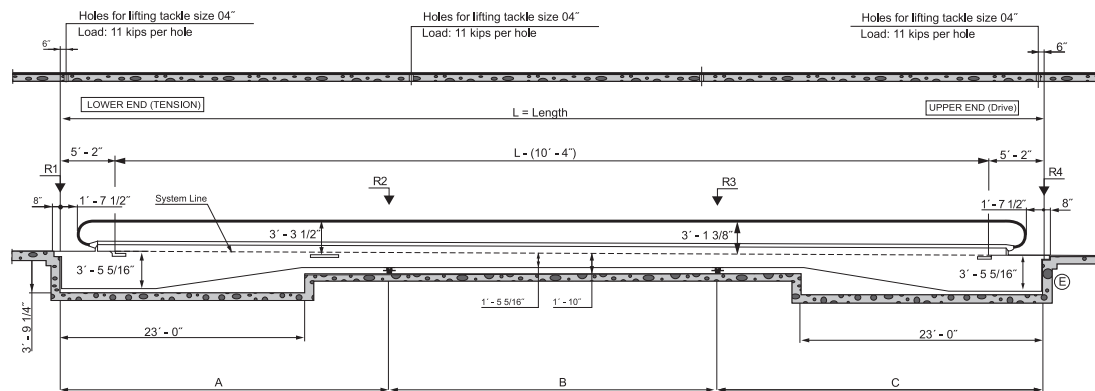
Escalator Dimensions

K	L	M
24"	3' - 8 1/4"	7' - 7"
32"	4' - 4 1/4"	8' - 11"
40"	5' - 0 1/4"	10' - 3"

Moving Walk Dimensions

K	L	M	A	B	C
40"	5' - 0 1/4"	10' - 3"	< 39' - 8"	< 39' - 8"	< 39' - 8"
48"	5' - 8 1/4"	11' - 7"	< 42' - 3"	< 42' - 3"	< 42' - 3"
56"	6' - 4 1/4"	12' - 11"	< 45' - 3"	< 45' - 3"	< 45' - 3"

Moving Walk Section View



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version 04.08
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