

- S900E**
  - Commercial escalator
  - Public escalator
- S900T**
  - Moving walk



**HANGZHOU SWORD ELEVATOR CO., LTD.**

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## SWORD

### The manufacturing base of SWORD in Hangzhou ➡

- ⊙ An investment of 150 million US dollars
- ⊙ An area of 270,000 square meters
- ⊙ An annual output of 100000 units
- ⊙ One of the most advanced elevator testing towers in China, over 120m in height, with the testing ability of 10m/s

### The excellence of quality originates from capability ➡

HANGZHOU SWORD ELEVATOR CO., LTD. was established in 2009 and is located at the National Economic and Technological Development Zone in Hangzhou, China. We are an international comprehensive manufacturer and service provider which integrate the R&D, design, production, sales, installation and after-sales maintenance of elevators and escalators. Our annual production capacity is up to 100,000 units, of which the comprehensive strength ranks top in the industry.

Our products cover small machine room passenger elevator, machine-room-less passenger elevator, high-speed elevator, hospital elevator, freight elevator, panoramic elevator, escalator, moving walk and vehicle elevator, totally nine series, among which our environment-friendly products with high precision and high standard have went through German TÜV certification, European Union CE, Russian CU-TR certification, JKKP Malaysian certification, Algerian ENACT certification and successfully joined in the North American CSA and ASME certification systems. We have provided service and solutions for more than 70 countries and regions worldwide by now. All these have contributed to the unceasing enhancement of our brand image and influence.

# PERFORMANCE

Efficient and reliable, your first safety choice.



HANGZHOU SWORD ELEVATOR CO.,LTD

## S900E

Commercial escalator

## Perfect Quality, Extraordinary Performance

Commercial escalators have been painting the flowing landscape in our modern city. Hangzhou SWORD Elevator Co., Ltd. not only considers the traditional elements of safety, energy conservation, comfortableness and quietness, but also seeks for coordination with buildings and the humanized design. Because of this, many shopping malls, airports and transportation hubs select the S900E commercial escalator products of Hangzhou SWORD Elevator.

### Safe and Reliable

Meet the latest safety standards, with safety switches spreading all over the key parts and real-time monitoring of the running state.

### Easy to Maintain

Use the fault self-diagnosis display device; quickly find the failure cause and the fault part, and reduce the downtime.

### Strong Driving Force

The strong reliable driving motor can bear the overload for a short time.

### Multi-Environmental Adaptability

It's suitable for indoor and outdoor environments, suitable for 50Hz and 60Hz two frequencies, and can be running under different voltages.



**DELICATE**

Delicate parts, perfect art expression.

### Dedicated Motor Driving System ➡

The motors of S900E escalators have been improved on the basis of original advantages. Through continuous testing and adjustment, we have made the driving force stronger, running smoother and braking more timely and sensitive.



### Precise, Energy-saving Control System ➡

Control system adopts a microcomputer system with advanced technology, comprehensive functionalities, and fast reaction speed in order to meet different kinds of customer needs. Controller is located on the cabinet shelf, which can fully monitor the running state and timely eliminate the hidden running troubles, thus reducing the maintenance time.



## Truss

Truss is welded of square tube materials, with sealed welding plate to ensure that water and oil will not leak from it. With hard stability and bearing capacity, it can effectively extend the service life of escalators.



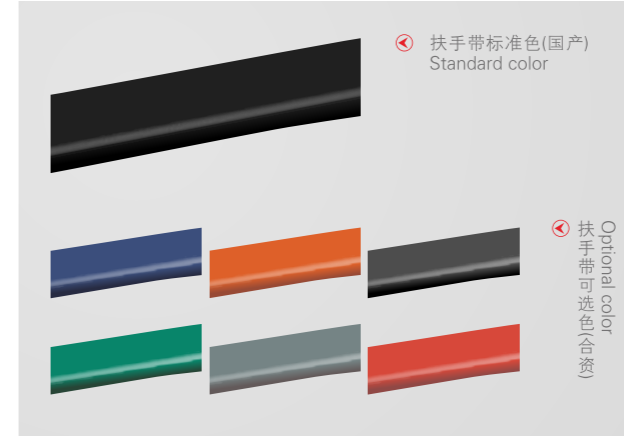
## Aluminum Alloy Step

The surface of the steps is sprayed with the black electrophoretic paint, which is of hard texture, oxidation resistance and easy maintenance. Engrave the surface with antiskid patterns and paint it with a yellow warning on three sides.



## Step System

Adopting galvanized guide rail, high strength and good wear-resisting polyurethane roller and high strength plate chain, we offer products with the ability of corrosion resistance and make the service life longer.



## Handrail

A variety of professional, stylish and durable handrails can be flexibly selected according to different environments.



## Brake

Brake is placed between the motor and the gear box, with reliable and adjustable characteristics, which can guarantee a smooth braking performance and a safe braking distance.



## Automatic Lubrication

Using computerized automatic lubrication system to ensure the moderate amount of oil, without the need of full-time lubrication staff.



# SECURITY

Improved safety system makes you rest assured and comfortable.

Our escalator has adopted comprehensive safety protective measures and has basically eliminated all sorts of accidents.



## Safety Protection (standard) ➤

- Comb protection device
- Handrail entrance protection device
- Step sink protection device
- Loosen / broken step chain protection device
- Motor over-speed protection device
- Motor reversal protection device (non-manipulated)
- Safety switch for fan cover opening
- Contactor protection
- Relay adhesion protection
- Inverter fault protection
- Phase failure / error protection device
- Contracting brake opening detection
- Skirt panel brush protection
- Motor overload & overheat protection
- Water level detecting switch (outdoor type)
- Handrail speed measurement (outdoor type)
- Safety switch for broken drive chain
- Floor plate opening protection

## Safety Protection (optional) ➤

- Broken handrail protection device
- Safety switch for skirt panel protection
- Shoe brake over-worn detection
- Additional brake (h>6m)
- Oil level alarm switch
- Step illumination
- Comb illumination

### Main Drive Chain Tension Protection Device ➡

When the main drive chain is broken or unusually stretches, the safety switch will start automatically and the escalator stops running.



### Fan Cover Opening Safety Protection Device ➡

When the fan cover is opened, the escalator stops.



### Main Drive Speed Testing Protection ➡

According to the testing signals from testing parts, the main board judges whether the moving speed stay normal or not (whether it runs reversing or not). If anomaly is detected, the escalator stops running.



### Step Missing Protection Device ➡

Sensor is set at the step rotation place. When step is lost, escalator stops.



### Step Chain Broken Protection Device ➡

When the step chain is broken or becoming loose, the escalator will stop running.



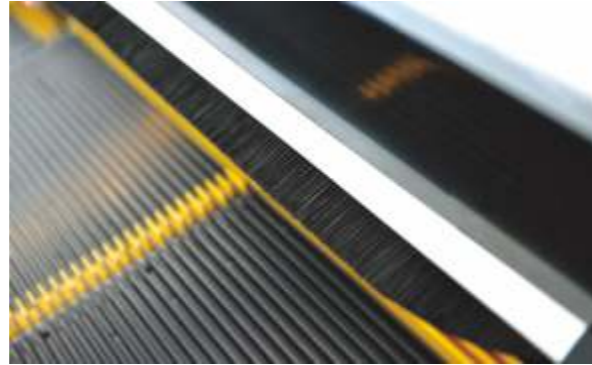
### Brake Opening Testing Device ➡

Escalator will stop and give the alarm if brake is not opened when the escalator is operating; if brake opens and the escalator is not running, the alarm also rings.



### Skirt Panel Brush Protection

It is on both sides of the skirt panel to protect passengers' clothes being pressed between skirt panel and steps, in order to keep passengers safe.



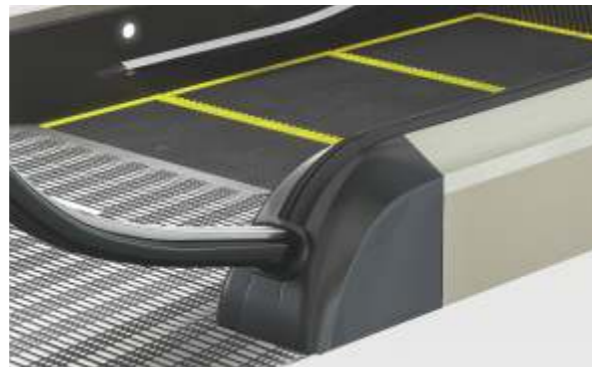
### Handrail

Professionally designed, fashionable and durable self-extinguishing handrail is set flexibly according to different surrounding environments and has antistatic device.



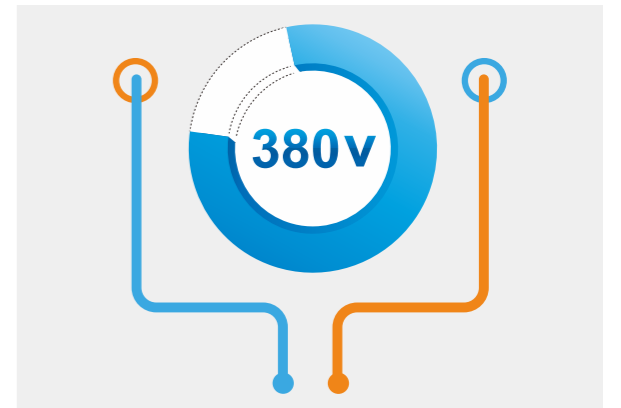
### Handrail Entrance Protection Device

When something is clamped at the handrail entrance, the escalator stops.



### Phase Failure And Error Protection Device

When phase failure and errors happen, the escalator stops.



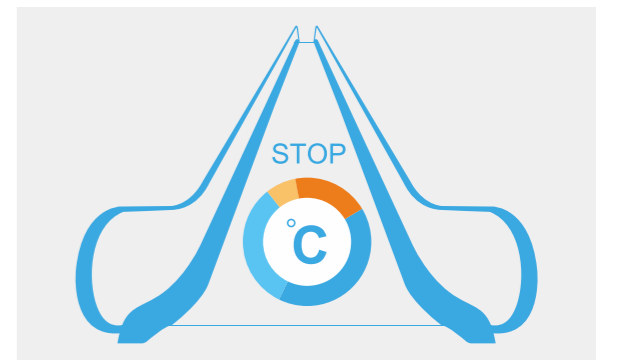
### Comb Safety Protection Device

When something is stuck between comb and landing plate, the escalator stops.



### Motor Overload And Overheat Protection

When the motor's temperature exceeds the set value, the escalator stops.



BASIC FUNCTION



Running Direction Selection	The operation box at the entrance of escalators and moving walks has a key switch, with the "↑ ↓" mark on its panel. Using the dedicated key, you can select the running direction as required.
Startup Warning	No warning during maintenance; warning before the normal startup: the bell rings for 3 seconds, and then Y-type starts; after 3 seconds, △-type operates, and then the ring disappears. Before and after the startup if there are anomalies, you can press the emergency stop button on the operation panel to put an end to the startup.
Automatic Lubrication	Using computer-controlled automatic lubrication system, no need for full-time refuel staff, and can ensure the moderate amount of the oil.
Automatic Fault Display	Maintain a constant monitoring of the whole machine's running condition: when there is a fault, it displays the fault location timely on the nixie tube, which allows the service personnel to find the fault immediately and reduces the downtime.
Inching Inspection	In order to easily maintain and repair, the escalator or moving walk has the function of inching inspection. Insert the inspection plug into any of the inspection socket in the upper or lower machine room, the escalator or moving walk then goes into an inspection condition.
Motor Speed Testing	In order to ensure the safety of passengers, when the running speed of escalator or moving walk is 20% faster than the rated speed, the escalator or moving walk will automatically stop operating, and restart running after professional treatment.
Motor Protection Function	In order to guarantee the safety of the equipment, the escalator and moving walk have the functions of motor overheating protection, phase failure protection, etc.
Variable Frequency Function	Select the dedicated inverter to control the escalator or moving walk's operation. When there is no person, it runs at the low speed of 0.2m/s; When the infrared device at the entrance detects that a person walks into the front plate area of the escalator or moving walk, the escalator or moving walk runs at the normal speed of 0.5m/s and the energy-saving can reach 40%-60%, which decreases the peak current by 50%-80%, and reduces the mechanical wear.
Skirt Panel Brush	Brushes are installed on both sides of the skirt panel, in order to avoid shoes (shoelaces) being scraped by (drawn into) the skirt panel, which improves the safety.

OPTIONAL FUNCTION



Direction Indicator	The escalators and moving walks are equipped with luxurious running direction indicator lamps at the entrance to make them more elegant and nobler.
Skirt Panel Illumination	Installed on both sides of skirt panel, the streamlined high-brightness illumination along the escalator will not only improve the safety, but also enhance the elegant temperament of the building.
Handrail Illumination	Installed inside the handrail bracket, it can attract passengers to hold the handrail more firmly; like the skirt panel illumination, it can also enhance the temperament of the building.
Inclined Inner Cover Plate	It is mainly applied to the transportation hubs of large passenger flow and high load-bearing pressure, which can maximally extend the space and comfortableness of the escalator, while improving the safety of passengers.
Step Illumination	Under the steps at the top and bottom parts, the escalator is equipped with the step warning light, which can make the passengers distinguish the staggered and leveling state of the steps, thus improving the safety of the escalator.



# HUMANIZED

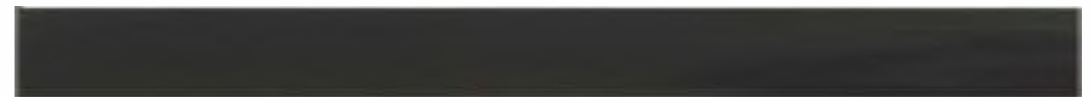
Stylish, beautiful, clear design for your heart.

PREVENT  
ACCIDENTS

IMPROVE  
APPEARANCE

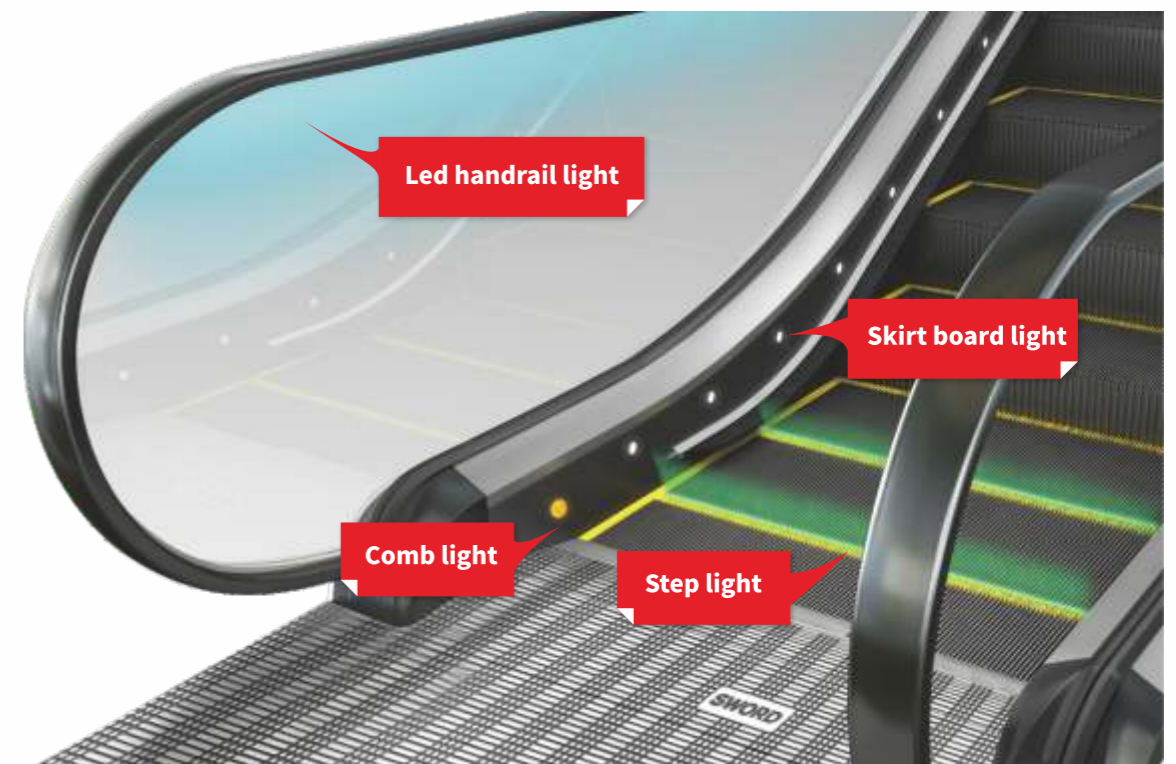
We provide several types of humanized design, which not only prevent accidents, but also improve the appearance of escalators.

## Fashionable Individual Handrail

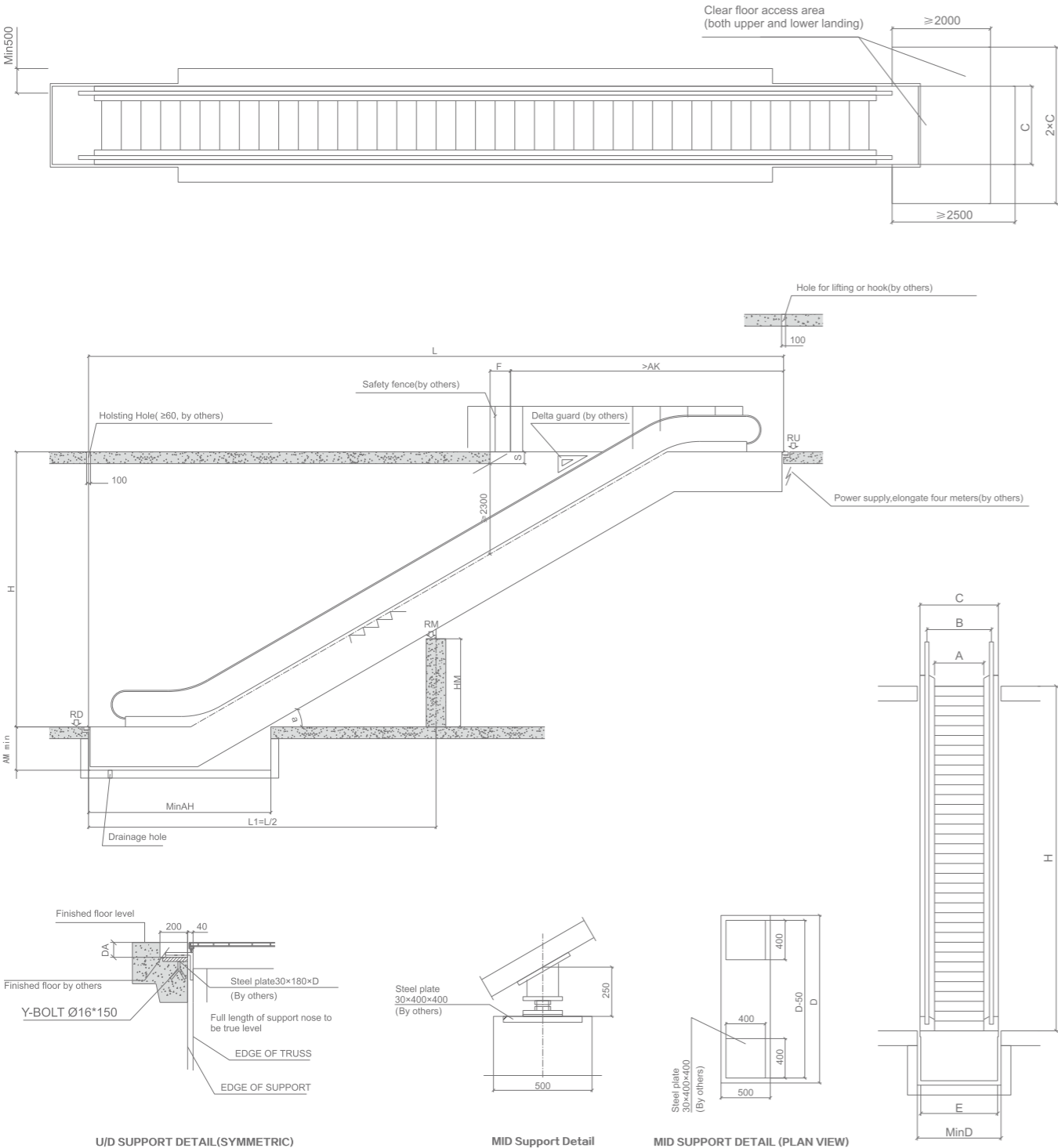


Our anti-broken, solid and durable handrails have the self-extinguishing function and anti-static device which can prevent fire from spreading and remove statics.

## Humanized Lighting Design

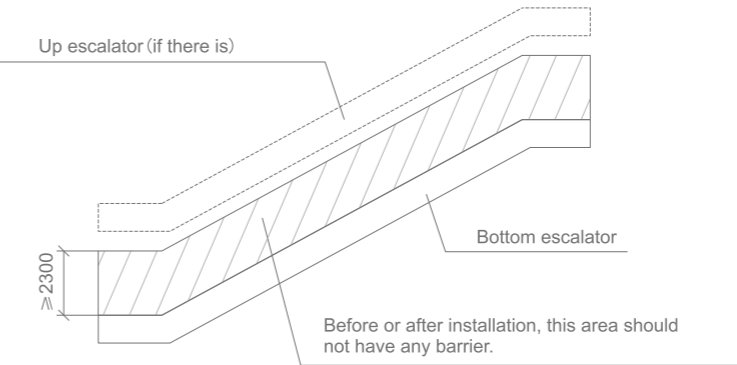


# S900E Commercial Escalator Layout



## Duties of Owners and Builders

- ⦿ This drawing is fit for the products with rise  $3m \leq H \leq 8m$ , the permitted tolerance for rise is  $-15mm \sim +15mm$ ; The permitted tolerance for level length is  $0 \sim +15mm$ .
- ⦿ When the level length  $L > 15.3m$ , the intermediate support base is needed.
- ⦿ Before installation, all holes have to be enclosed with the safety guard which height is not less than 1.2m and guarantee the strength is enough.
- ⦿ After finish installation, the owner should consider to set safety guard rail around the escalator.
- ⦿ The pit should be water-proof, and the location of plash should be set at the corner.
- ⦿ The pit drain hole should be connected with the drainage system, the work should be done by others.
- ⦿ According to the requirement of the technical data, the power supply with safety switch is set at the machine room. The fluctuation of voltage should not more than  $\pm 7\%$ . The zero line and ground line should be separated and the ground resistance is not more than  $4\Omega$ .
- ⦿ Use  $10mm^2$  soft line as the power input cable, done by others.
- ⦿ When the space between handrail center line and other barrier is less than 500mm, a guard plate without sharp edge should be set above outer deck plate, and the height should not less than 300mm.
- ⦿ If there is any special requirement, the contract should be made after approved by the company technical department.



**Note:** If the escalator is up and bottom arrangement, it is required to have 2300mm clear space above the bottom escalator. Refer to the dash area in the left. Any questions, pls contact SWORD technical department.

Angle(a)	Speed (m/s)	Rise H (mm)	Flat steps	Step Width A (mm)	Span L (mm)	Other location size (mm)							Reaction(KN)			AM(mm)	DA(mm)		
						AH	AK	B	C	D	E	F	RU	RD	RM				
35°	0.5	3000≤H≤6000	2	600	1.428H+5405	4060	6450	837	1130	1240	1100	1.428S	3.76L+18	3.76L+12	For Indoor, Outdoor model A	1103	Without Shock absorbing rubber	108	
				800	1.428H+4905		5950	1037	1330	1440	1300		4.41L+15	4.41L+9					
				1000					1237	1530	1640		1500	5.11L+13					5.11L+5
30°	0.5	6000<H≤8000	3	800	1.732H+5565	4640	6950	1037	1330	1440	1300	1.732S	2.02L+13.2	2.02L+6.8	6.33L+4.8	For Outdoor model B with Oil separator	1353	With Shock absorbing rubber	128
				1000						1237	1530		1640	1500					
		3000≤H≤6000	2	600	1.732H+5265	4240	6550	7050	837	1130	1240	1100	3.66L+27	3.66L+22					
				800	1.732H+4765							4.31L+18	4.31L+10						
				1000						1237	1530	1640	1500	4.96L+17	4.96L+10				

NOTE:DO NOT SCALE THIS DRAWING,UNLESS OTHERWISE STATED.

HANGZHOU SWORD ELEVATOR CO., LTD

# S900E

Public escalator

## Peak Performance, Masterpiece of Sword

Considering different environments and traffic flow, Hangzhou SWORD Elevator Co., Ltd. launched the S900E public escalator. By its strong performance and ultrahigh vertical rise, S900E public escalator meets the various transport demands of subways, railway stations, airports etc. On ordinary high-rise occasions, a set of low-rise escalators are used for carrying passengers and the incapacious walking buffering area will cause passengers crowded, which brings potential safety hazard. S900E public escalator, with maximum rise up to 42m, totally solves the problem caused by the dense traffic flow on high-rise occasions, and saves more construction cost.

### High-Strength Truss Made Of Square Tube

Truss made of square tube is used. Under the same deflection condition, the cube pipe can support high-load requirements, horizontal stability and breaking performance. According to the customer's requirement, we can provide a truss deflection of 1/1500 at highest and meet the load intensity demands at various places. The truss of the escalator is calculated and designed precisely, with fully sealed design, which improves the anti-corrosion and solidity of the truss at maximum.

### Double Motors

- Double motors, super power.
- Double brakes, dual safeguard.

### External Roller

- Large diameter external rollers, easier to replace.
- Widened step chain, sturdy and durable.

### Unloaded Guide Rail

- Reduce the contact surface between guide rail and rollers and thus prolong the service life of rollers.
- Absorb shock and improve the comfortability.

### Access Detection

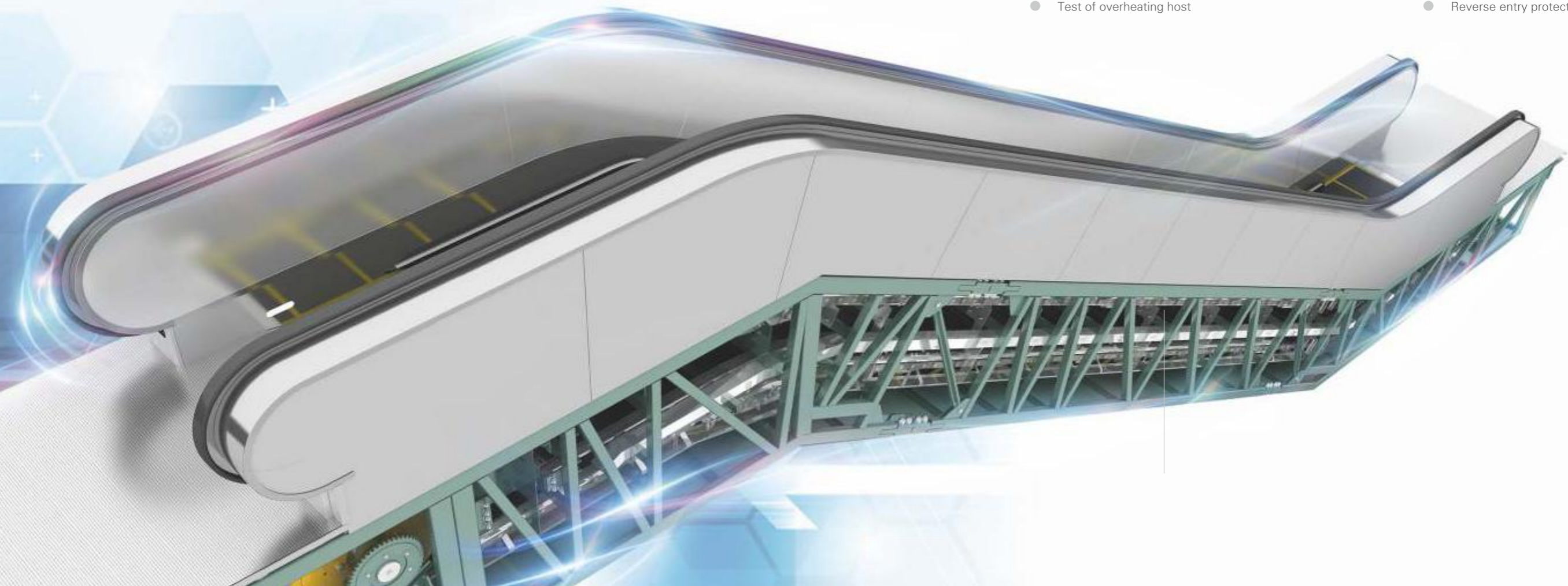
Provide various photo eyes to check if there is any person entering the escalator or not; Provide a second test, and avoid causing wrong startup by anyone crossing the test space.

# SECURITY

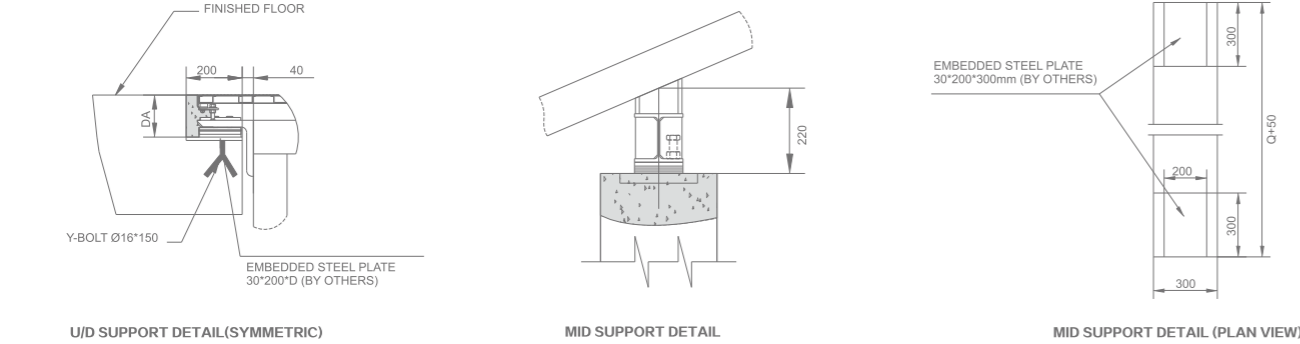
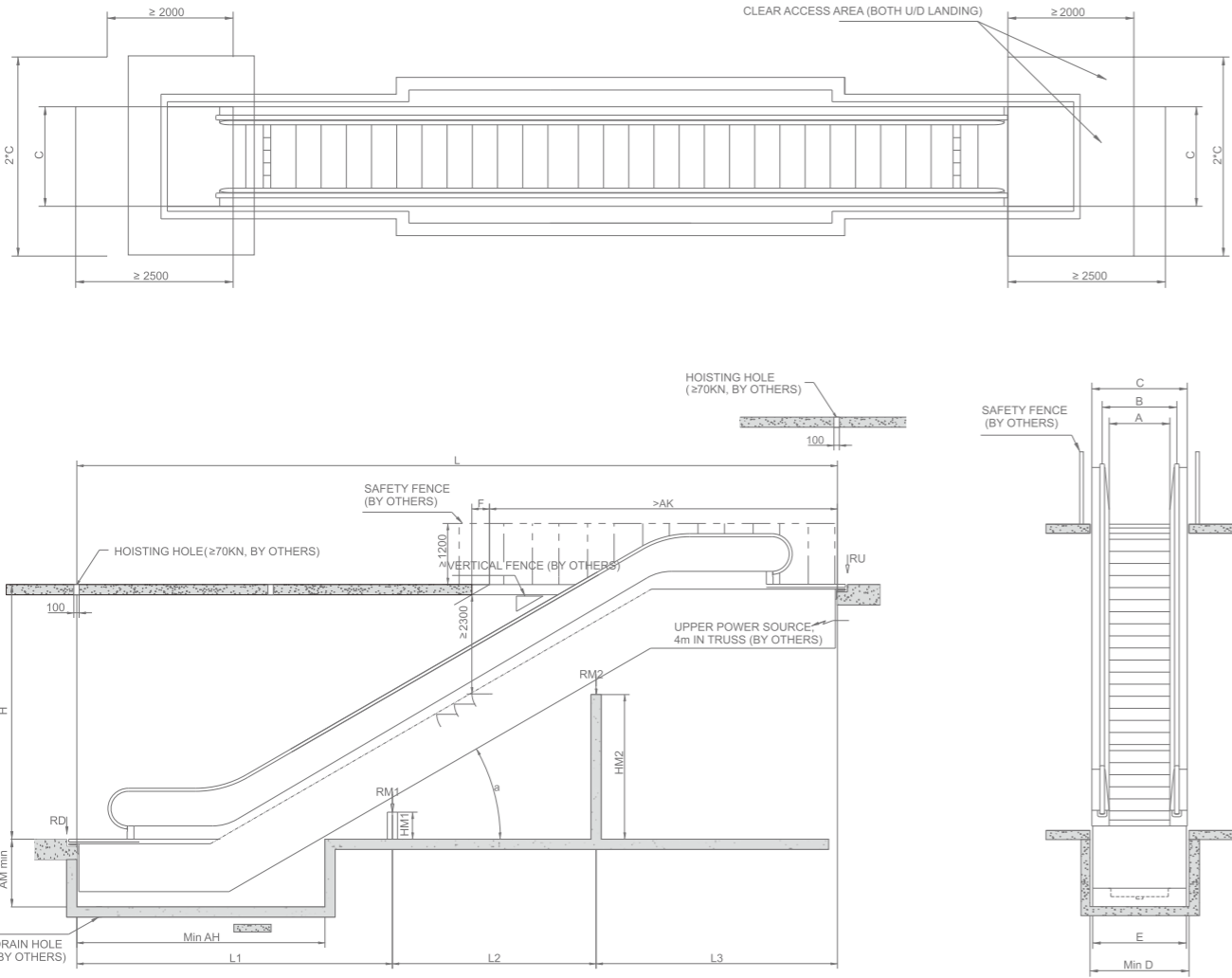
All-around safety protection for public escalators.

45 key safety functions provide all-around safety protection for you (following functions include optional functions) ▶

- Safety switch at access of handrail
- Safety switch of breaking chain of main drive
- Test of opening host brake
- Test of wear and tear of host brake tile
- Opening safety switch of front plate
- Breaking belt protection switch of handrail
- Mechanical over speed test of the host
- Test of wrong phase and broken phase of power source
- Raised safety switch of comb teeth
- Safety switch of skirt plate
- Protection switch of peripheral 24V power source
- Fault test of inverter
- Emergency stop button at access
- Emergency stop button in the upper and lower machine rooms
- Overload test of escalator
- Sticking test of key switch
- Breaking chain protection switch of step chain
- Step loss test
- Test of key signal triggering wrong direction
- Actuation test of contactor during running
- Anti-jumping safety switch of the step
- Velocity test of handrail belt
- Safety switch of additional brake
- Test of safety circuit state
- Sink protection switch of step
- Over speed test of escalator
- Oil level switch
- Water level switch
- Anti-inversion test of escalator
- Test of brake distance after escalator stops
- Test of switching operating state during running
- Fire alarm stop function
- Test of overheating host
- Opening switch of host fan enclosure
- Remote shutdown function
- Fault test of fan in the machine room
- BAS remote monitoring system
- Anti-climbing device
- Anti-static device of the step and handrail belt
- Function of preventing wrong operation of maintenance
- PASSRAE function
- Hair brush of skirt plate
- Step gap lighting
- Step baffle
- Grounding fault protection
- Reverse entry protection

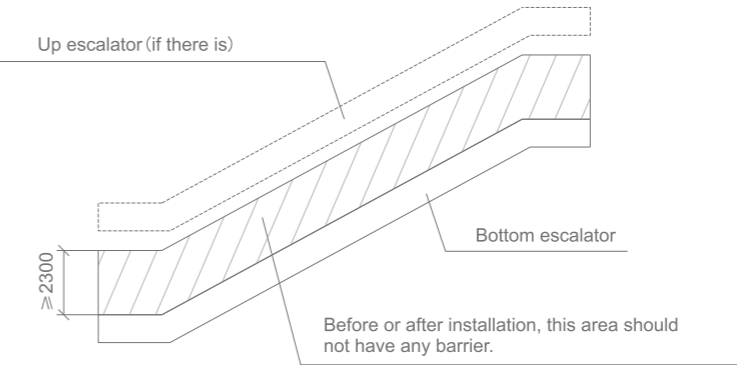


# S900E Ordinary Public Escalator Layout



## Duties of Owners and Builders

- This drawing is fit for the products with rise  $3\text{m} \leq H \leq 8\text{m}$ , the permitted tolerance for rise is  $-15\text{mm} \sim +15\text{mm}$ ; The permitted tolerance for level length is  $0 \sim +15\text{mm}$ .
- When the level length  $L > 15.3\text{m}$ , the intermediate support base is needed.
- Before installation, all holes have to be enclosed with the safety guard which height is not less than 1.2m and guarantee the strength is enough.
- After finish installation, the owner should consider to set safety guard rail around the escalator.
- The pit should be water-proof, and the location of plash should be set at the corner.
- The pit drain hole should be connected with the drainage system, the work should be done by others.
- According to the requirement of the technical data, the power supply with safety switch is set at the machine room. The fluctuation of voltage should not more than  $\pm 7\%$ . The zero line and ground line should be separated and the ground resistance is not more than  $4\Omega$ .
- Use  $10\text{mm}^2$  soft line as the power input cable, done by others.
- When the space between handrail center line and other barrier is less than 500mm, a guard plate without sharp edge should be set above outer deck plate, and the height should not less than 300mm.
- If there is any special requirement, the contract should be made after approved by the company technical department.

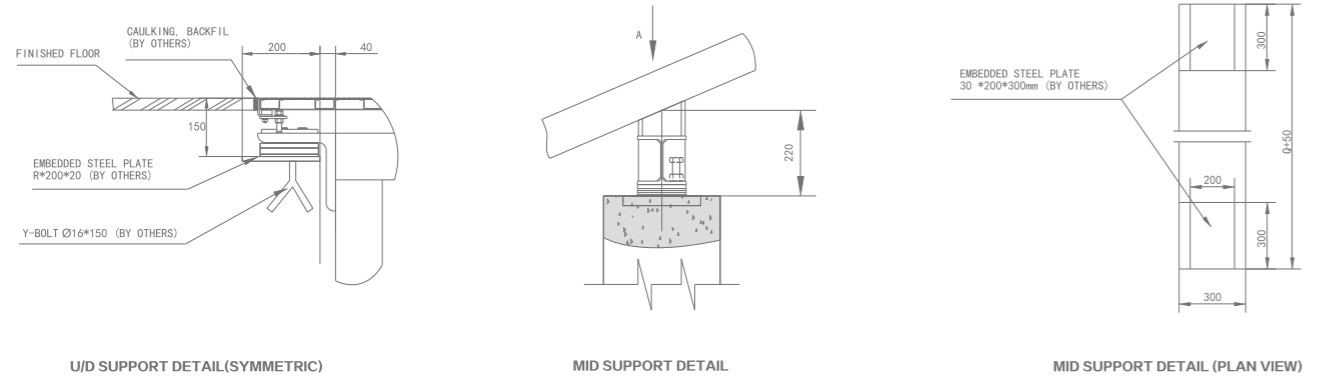
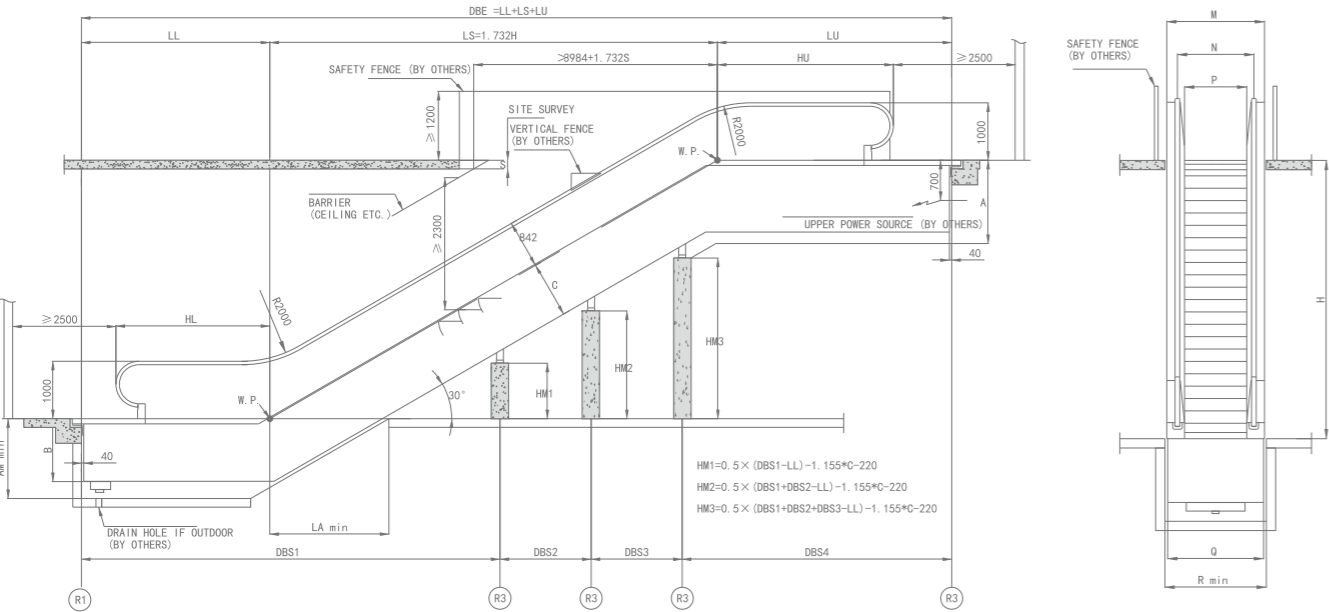
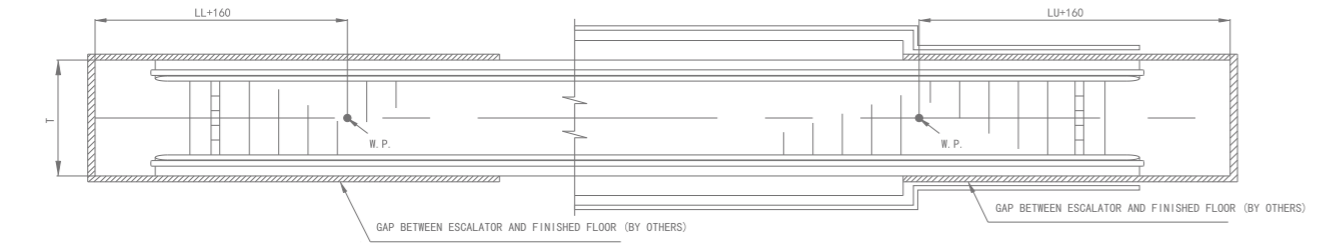


**Note:** If the escalator is up and bottom arrangement, it is required to have 2300mm clear space above the bottom escalator. Refer to the dash area in the left. Any questions, pls contact SWORD technical department.

Angle (a)	Speed (m/s)	Rise H(mm)	Flat Steps	Step Width A(mm)	Span L(mm)	Other location size (mm)							Reaction(KN)				AM (mm)	DA (mm)
						AB	AK	B	C	D	E	F	RU	RD	RM1	RM2		
30°	0.5,0.65	3,000~15,000	3	1000 800	1.732H+6576	4900	7750	1237 1037	1580 1380	1580 1380	1550 1350	1.732S	4*L3+21.5 3.7*L3+21.5	4*L1+1.5 3.7*L1+1.5	5.5*(L1+L2)+10 5.2*(L1+L2)+10	5.5*(L3+L2)+10 5.2*(L3+L2)+10	indoor (without Oil/water separator)	1150
			4	1000 800	1.732H+7376	5300	8150	1237 1037	1580 1380	1580 1380	1550 1350	1.732S	4*L3+21.5 3.7*L3+21.5	4*L1+1.5 3.7*L1+1.5	5.5*(L1+L2)+10 5.2*(L1+L2)+10	5.5*(L3+L2)+10 5.2*(L3+L2)+10		
27.3°	0.5,0.65	3,000~15,000	3	1000 800	1.937H+6461	5050	8200	1237 1037	1580 1380	1580 1380	1550 1350	1.937S	4*L3+21.5 3.7*L3+21.5	4*L1+1.5 3.7*L1+1.5	5.5*(L1+L2)+10 5.2*(L1+L2)+10	5.5*(L3+L2)+10 5.2*(L3+L2)+10	outdoor (with Oil water separator)	1330
			4	1000 800	1.937H+7261	5450	8600	1237 1037	1580 1380	1580 1380	1550 1350	1.937S	4*L3+21.5 3.7*L3+21.5	4*L1+1.5 3.7*L1+1.5	5.5*(L1+L2)+10 5.2*(L1+L2)+10	5.5*(L3+L2)+10 5.2*(L3+L2)+10		
23.2°	0.5,0.65	3,000~15,000	3	1000 800	2.333H+6287	5300	9010	1237 1037	1580 1380	1580 1380	1550 1350	2.333S	4*L3+21.5 3.7*L3+21.5	4*L1+1.5 3.7*L1+1.5	5.5*(L1+L2)+10 5.2*(L1+L2)+10	5.5*(L3+L2)+10 5.2*(L3+L2)+10	outdoor (with Oil water separator)	1330
			4	1000 800	2.333H+7087	5700	9410	1237 1037	1580 1380	1580 1380	1550 1350	2.333S	4*L3+21.5 3.7*L3+21.5	4*L1+1.5 3.7*L1+1.5	5.5*(L1+L2)+10 5.2*(L1+L2)+10	5.5*(L3+L2)+10 5.2*(L3+L2)+10		

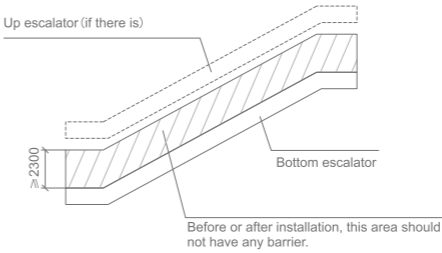
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# S900E Heavy Public Escalator Layout



## Duties of Owners and Builders

- ⦿ This drawing is fit for the products with rise  $3\text{m} \leq H \leq 8\text{m}$ , the permitted tolerance for rise is  $-15\text{mm} \sim +15\text{mm}$ ; The permitted tolerance for level length is  $0 \sim +15\text{mm}$ .
- ⦿ When the level length  $L > 15.3\text{m}$ , the intermediate support base is needed.
- ⦿ Before installation, all holes have to be enclosed with the safety guard which height is not less than 1.2m and guarantee the strength is enough.
- ⦿ After finish installation, the owner should consider to set safety guard rail around the escalator.
- ⦿ The pit should be water-proof, and the location of plash should be set at the corner.
- ⦿ The pit drain hole should be connected with the drainage system, the work should be done by others.
- ⦿ According to the requirement of the technical data, the power supply with safety switch is set at the machine room. The fluctuation of voltage should not more than  $\pm 7\%$ . The zero line and ground line should be separated and the ground resistance is not more than  $4\Omega$ .
- ⦿ Use  $10\text{mm}^2$  soft line as the power input cable, done by others.
- ⦿ When the space between handrail center line and other barrier is less than 500mm, a guard plate without sharp edge should be set above outer deck plate, and the height should not less than 300mm.
- ⦿ If there is any special requirement, the contract should be made after approved by the company technical department.



Overall Dimension (Length): (mm)

	3500 < H ≤ 6000		6000 < H ≤ 10000		10000 < H ≤ 12000		12000 < H ≤ 15000		15000 < H ≤ 22000	
Flat Steps	3	4	3	4	3	4	3	4	3	4
A	1400	1400	1400	1400	1400	1400	1400	1400	1600	1600
B	1300	1300	1300	1150	1150	1150	1150	1150	1150	1150
C	1480	1480	980	980	1180	1180	980	980	980	980
HU	2665	3065	2665	3065	2890	3290	2890	3290	2890	3290
LU	3680	4080	3680	4080	3905	4305	4405	4805	4405	4805
HL	2280	2680	2280	2680	2280	2680	2280	2680	2280	2680
LL	2880	3280	2880	3280	2880	3280	2880	3280	2880	3280
AM	1600	1600	1450	1450	1450	1450	1450	1450	1450	1450
LA	3080	3080	2080	2080	2480	2480	2080	2080	2080	2080
DBS1	---	---	1/2DBE	1/2DBE	1/2DBE	1/2DBE	1/3DBE	1/3DBE	1/4DBE	1/4DBE
DBS2	---	---	1/2DBE	1/2DBE	1/2DBE	1/2DBE	1/3DBE	1/3DBE	1/4DBE	1/4DBE
DBS3	---	---	---	---	---	---	1/3DBE	1/3DBE	1/4DBE	1/4DBE
DBS4	---	---	---	---	---	---	---	---	1/4DBE	1/4DBE

Remarks: LU, LL in above sheet are min. value, and can be prolonged. Max. LU 6000, Max. LL 5000. Otherwise please contact SWORD.

Overall Dimension (Length): (mm)

M (Escalator Width)	N (Handrail Width)	P (Step Width)	Q (Truss Width)	R (Min. Pit Width)
1730	1238	1002	1700	1790

Reaction: (N)

Flat Steps	Rise H	Supports	R1	R2	R3	R4	R5
3	3500 < H ≤ 6000	2	11H+36000	11H+48000	---	---	---
	6000 < H ≤ 10000	3	5.5DBS1+8000	5.5DBS2+14000	5.5DBE+7000	---	---
	10000 < H ≤ 12000	3	6DBS1+10000	6DBS2+20000	6DBE+7000	---	---
	12000 < H ≤ 15000	4	6DBS1+10000	6DBS3+20000	6(DBE1+DBE2)+7000	6(DBE2+DBE3)+7000	---
	15000 < H ≤ 22000	5	6.2DBS1+4000	6.2DBS4+17000	6.2(DBE1+DBE2)-4000	6.2(DBE2+DBE3)-5000	6.2(DBE3+DBE4)+3000
	3500 < H ≤ 6000	2	11H+38000	11H+50000	---	---	---
4	6000 < H ≤ 12000	3	5.5DBS1+10000	5.5DBS2+16000	5.5DBE+7000	---	---
	10000 < H ≤ 12000	3	6DBS1+12000	6DBS2+22000	6DBE+7000	---	---
	12000 < H ≤ 15000	4	6DBS1+12000	6DBS3+22000	6(DBE1+DBE2)+7000	6(DBE2+DBE3)+7000	---
	15000 < H ≤ 22000	5	6.2DBS1+6000	6.2DBS4+19000	6.2(DBE1+DBE2)-4000	6.2(DBE2+DBE3)-5000	6.2(DBE3+DBE4)+3000
	3500 < H ≤ 6000	2	11H+36000	11H+48000	---	---	---
	6000 < H ≤ 10000	3	5.5DBS1+8000	5.5DBS2+14000	5.5DBE+7000	---	---

# TECHNOLOGY

Stylish technology,leading to a new realm of life.



S900T is dedicated to creating a harmonious living space , adhering to "Green,Quality, Safe" brand concept, letting you travel forward safely.

HANGZHOU SWORD ELEVATOR CO., LTD

# S900T

Moving Walk



S900T moving walks are designed with advanced technologies, which provide you with steady, comfortable and safe travelling experience. They are the flowing scenery in our city architectures which is widely used in airports, railway stations and shopping malls, etc.

# SECURITY

360° security system can ensure the travelling safety for passengers.



The 360° safety system can detect safety risks and quickly launch emergency response to ensure the travelling safety for passengers.

## Square Tubular Truss

Square tubular material is the solidest structure to improve the performance of resistance to wind and earthquake.



- ◎The solidest truss solution in the industry.
- ◎Little shake, which improves riding comfort and balance.
- ◎Fully enclosed structure, anticorrosive and rustproof inside.



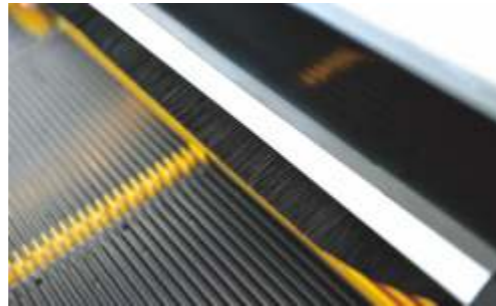
## Handrail

A variety of professionally designed, stylish and durable handrail belts can be selected according to different environments, which have self-extinguishing function and the static eliminating device.



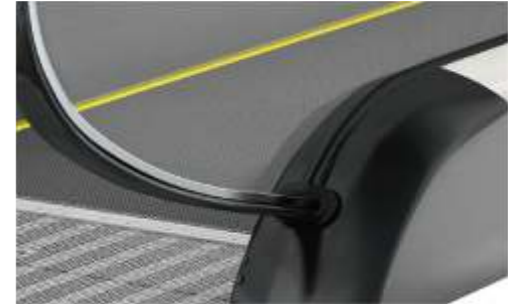
## Skirt Panel Brush Protection

The brushes are located on the both sides of skirt panel to protect passengers' clothes from being pressed between skirt panel and step side which keeps passengers safe.



## Handrail Entrance Protection Device

When something is clamped at the handrail entrance, the moving walk stops.



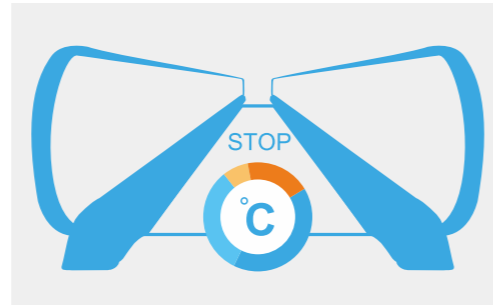
## Comb Safety Protection Device

When something is stuck between comb and landing plate, the moving walk stops.



## Motor Overload And Overheat Protection ➤

When the motor's temperature exceeds the set value, the moving walk stops.



## Main Drive Chain Tension Protection Device ➤

When the main drive chain is broken or unusually stretches, the safety switch will start automatically and the moving walk stops running.



## Fan Cover Opening Safety Protection Device ➤

When the fan cover is opened, the moving walk stops.



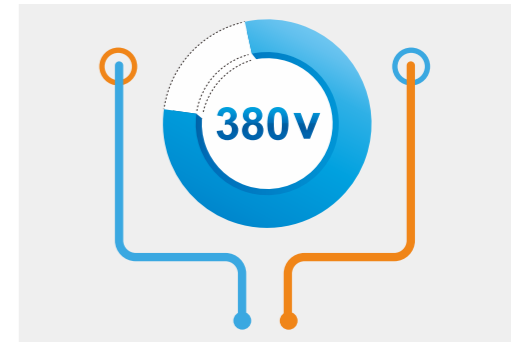
## Main Drive Speed Testing Protection ➤

According to the testing signals from testing parts, the main board judges whether the moving speed stay normal or not (whether it runs reversing or not). If anomaly is detected, the moving walk stops running.



## Phase Failure And Error Protection Device ➤

When phase failure and errors happen, the moving walk stops.



## Step Missing Protection Device ➤

Sensor is set at the step rotation place. When step is lost, the moving walk stops.



## Step Chain Broken Protection Device ➤

When the step chain is broken or becoming loose, the moving walk will stop running.



## Brake Opening Testing Device ➤

Moving walk will stop and give the alarm if brake is not opened when the moving walk is operating; if brake opens and the moving walk is not running, the alarm also rings.



# HUMANIZED

Warm design concept provides sweet service for passengers.



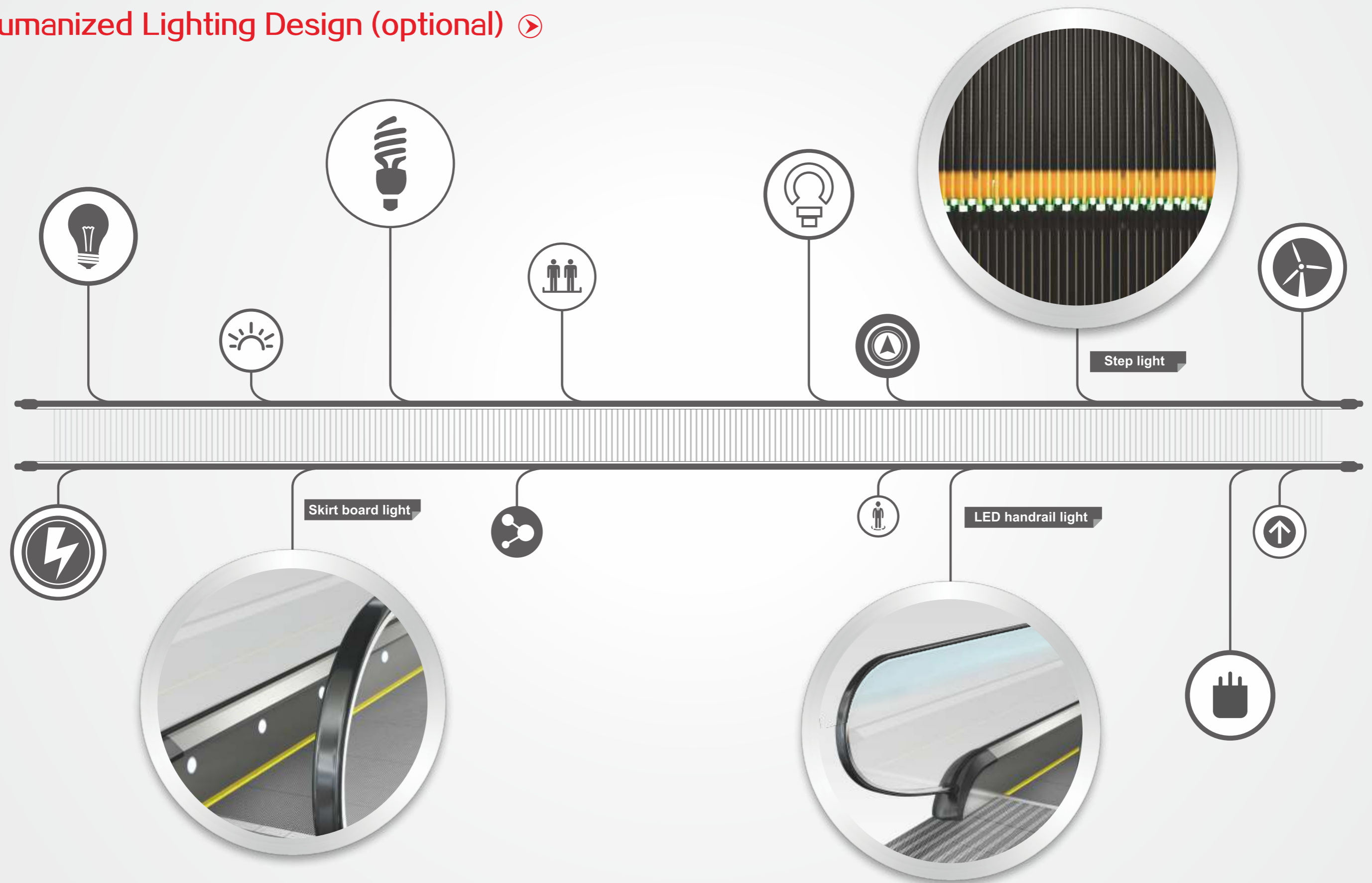
S900T moving walk is set with high intensity step board and optional LED handrail lighting, skirt board lighting, comb lighting, step lighting etc, which give clear remind signals for passengers and make moving walk look brighter and prettier.



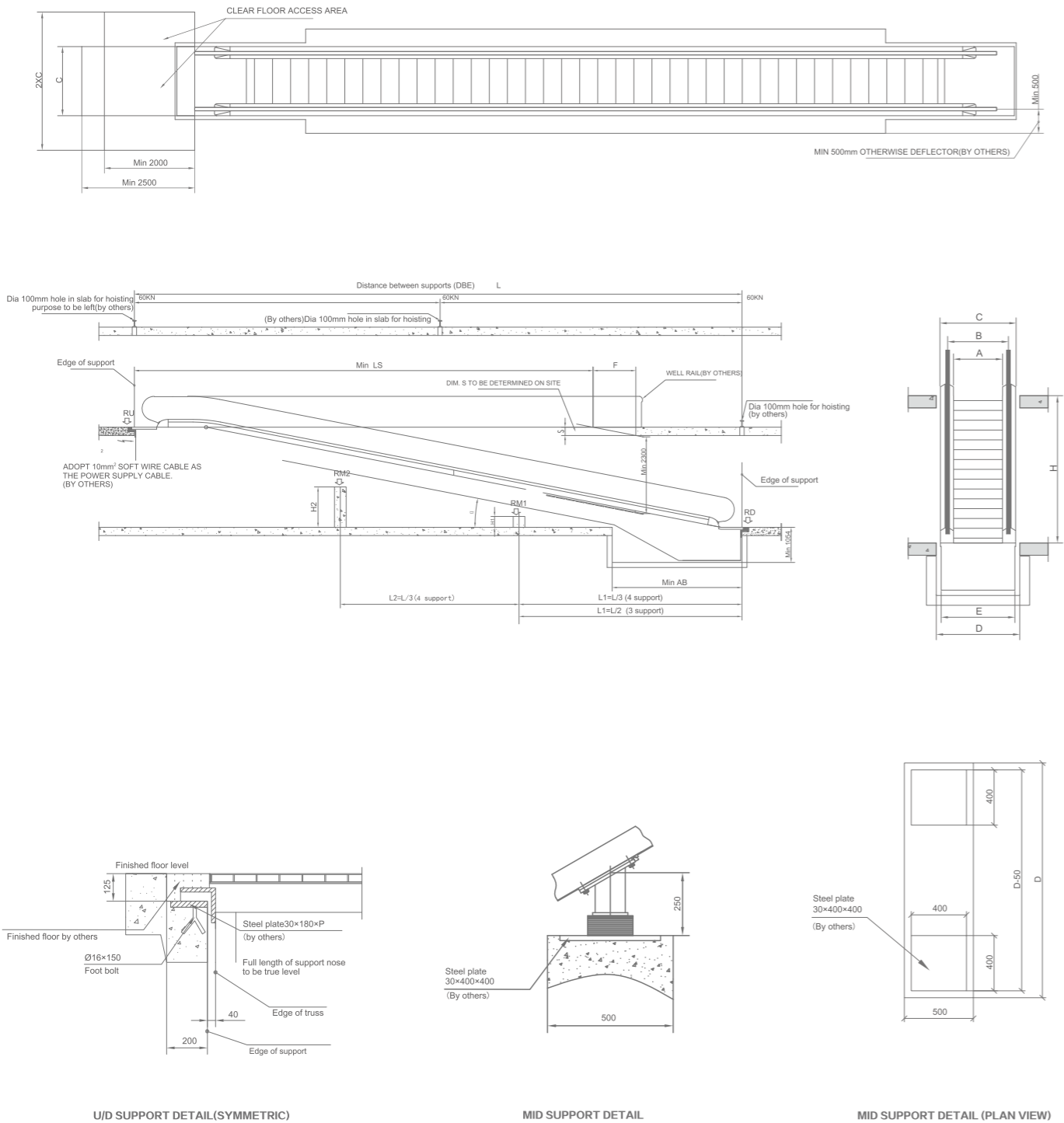
## S900T High Strength Aluminum Alloy Step

- ◎ Antiskid serrated design is adopted on the surface, and cable-stayed stiffener design is adopted on the back, both of which improve the overall strength.
- ◎ The yellow line clearly reminds passengers of the right standing area.
- ◎ The horizontal step width of S900T moving walk is 1400mm, which offers ample space for passengers to travel quickly and is well suited to airports, train stations and other crowded places.

## Humanized Lighting Design (optional)

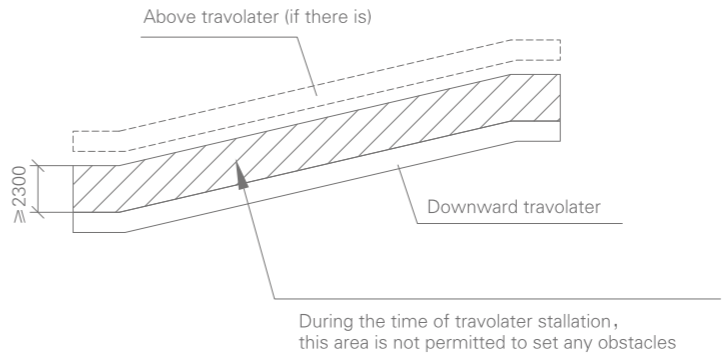


# S900T Moving Walk Layout



## Duties of Owners and Builders

- ⦿ This drawing is fit for the products with rise  $1.5\text{m} \leq H \leq 6\text{m}$ , the permitted tolerance for rise is  $-15\text{mm} \sim +15\text{mm}$ ; The permitted tolerance for level length is  $0 \sim +15\text{mm}$ .
- ⦿ When the level length  $L > 13\text{m}$ , the intermediate support base is needed.
- ⦿ Before installation, all holes have to be enclosed with the safety guard which height is not less than 1.2m and guarantee the strength is enough.
- ⦿ After finish installation, the owner should consider to set safety guard rail around the escalator.
- ⦿ The pit should be water-proof, and the location of plash should be set at the corner.
- ⦿ The pit drain hole should be connected with the drainage system, the work should be done by others.
- ⦿ According to the requirement of the technical data, the power supply with safety switch is set at the machine room. The fluctuation of voltage should not more than  $\pm 7\%$ . The zero line and ground line should be separated and the ground resistance is not more than  $4 \Omega$ .
- ⦿ Use 10mm<sup>2</sup> soft line as the power input cable, done by others.
- ⦿ When the space between handrail center line and other barrier is less than 500mm, a guard plate without sharp edge should be set above outer deck plate, and the height should not less than 300mm.
- ⦿ If there is any special requirement, the contract should be made after approved by the company technical department.



**Note:** If the escalator is up and bottom arrangement, it is required to have 2300mm clear space above the bottom escalator. Refer to the dash area in the left. Any questions, pls contact SWORD technical department.

Angle(a)	Speed (m/s)	Rise H(mm)	Step Width A(mm)	Span L(mm)	Other location size (mm)										Reaction(KN)							
					AB	LS	F	B	C	D	E	P			1000				800			
10°	0.5	$1500 \leq H \leq 6000$	800	5.6713H+2866	5600	14898	5.6713S	1037	1330	1430	1300	1054	STEP WIDTH (mm) No. of supports	2	RU	RD	RM1	RM2	RU	RD	RM1	RM2
11°			1000	5.1446H+2902	5060	13747	5.1446S	1237	1530	1630	1500	1054										
12°			800	4.7046H+2938	4650	12790	4.7046S	1037	1330	1430	1300	1054										
			1000					1237	1530	1630	1500											

NOTE:DO NOT SCALE THIS DRAWING,UNLESS OTHERWISE STATED.  
Please consult contract management technology department about S900T encountered tilt angle is 0.