SHANGHAI
MITSUBISHI
ELEVATOR

**SHANGHAI MITSUBISHI
ELEVATOR CO., LTD.**

www.smec-cn.com
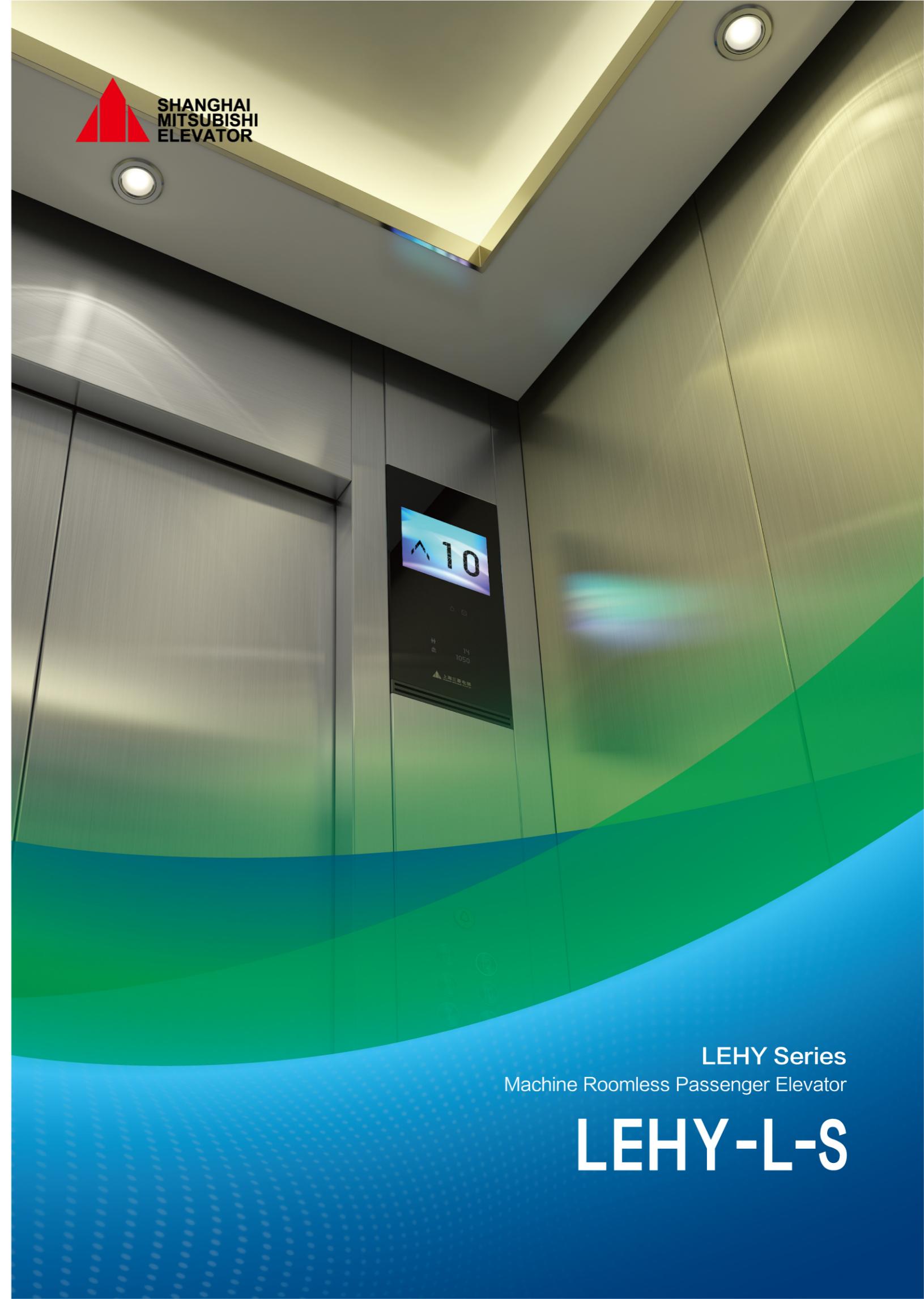
LEHY Series
Machine Roomless Passenger Elevator

LEHY-L-S

Consistent Quality and "Riding" You Home with Heart

Let passengers ride the elevator with peace of mind
More intimate decoration design brings warmth to passengers' homes

Let residents feel at ease to use the elevator
More quiet operation brings peace to residents' homes

Let the property manage the elevator without worry
Lower operating cost leads to higher use value

Tailor-made for Beautiful Home

(m/s)						
1.75						
1.6						
1.0			**LEHY-L-S**			
0.63						
0.4						
	320	450	550	630	825	1050 (kg)

*: Specifications in above ⬛ apply to new lifts in existing buildings and home lifts

十年质保
智享无忧

菱菱管家/用梯
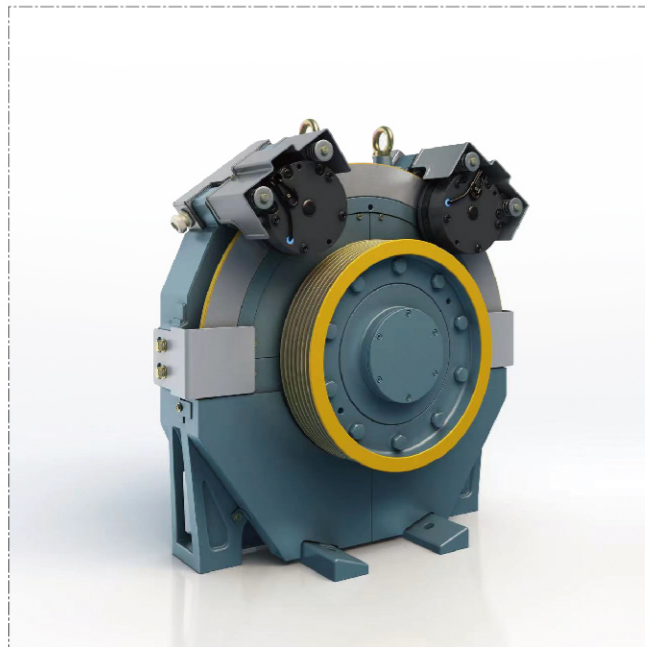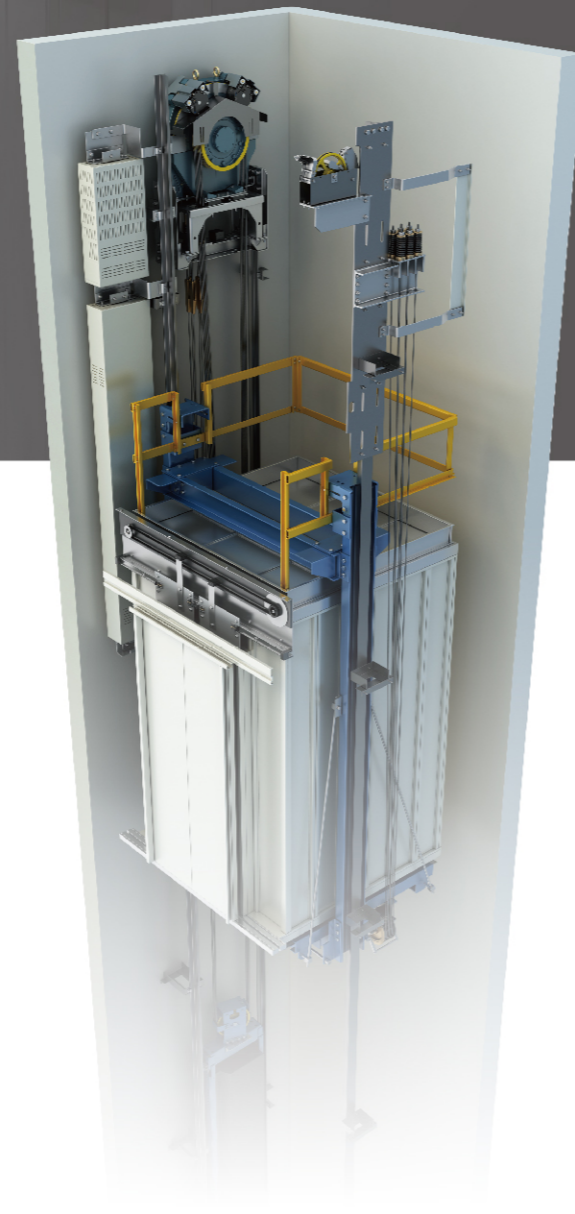
This product can be included in the ten-year warranty service of Shanghai Mitsubishi Elevator Co., Ltd.

The picture is a schematic; if actual dimensions and appearance vary, the actual specifications shall prevail.

Consistent Quality

Consistent Quality Assurance

Inheriting the Classic Traction Machine

· PM permanent magnet synchronous gearless traction machine technology with excellent performance

· A number of original drive control technologies make the elevator safer, more reliable and more comfortable

Improve the Comfort of Homes

· Reduced noise of traction machine: patented joint stator core technology reduces the running noise of traction machine by 10 decibels.

· Optimal design of vibration isolation system: the vibration isolation system of traction machine is optimized, which improves the vibration isolation efficiency and greatly attenuates the vibration transmitted to the building structure.

· Brake−holding silencing technology: current closed−loop control mode is adopted, so that the elevator can start and stop smoothly and comfortably. Compared with the control without silencing, the noise is reduced by 16.2% on average.

· Harmonic suppression optimization: the harmonic components of the traction machine driving current is actively controlled and reduced through harmonic suppression algorithm, so as to further improve the vibration and noise level of the traction machine.

Consistent Manufacturing Benchmark

Self−made Core Components

Traction machine, printed board, door system and safety components are all original products of SMEC.

Fully Manufactured by Itself, with High Reliability

SMEC adheres to the high and strict internal control standards for self−made safety gears, and its quality control and quality are trustworthy.

Safety gears are delivered from the factory in one piece, and the synchronization of gears on both sides is adjusted and confirmed in the factory, so the safety is greatly improved.

The governor adopts centrifugal flyweight structure, clamping lifting and remote control of mechanical cable, with stable performance.

Consistent Design Benchmark

$$\frac{15 \text{ million times}}{365 \text{ days} \times 2000 \text{ times/day}} = 20 \text{ years}$$
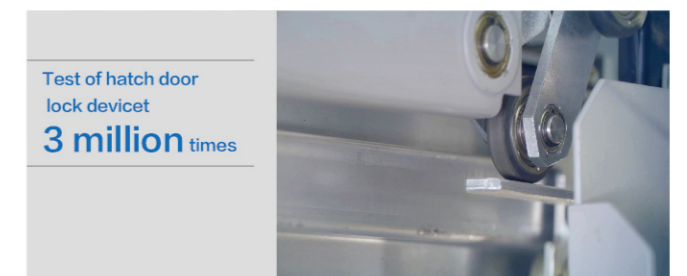
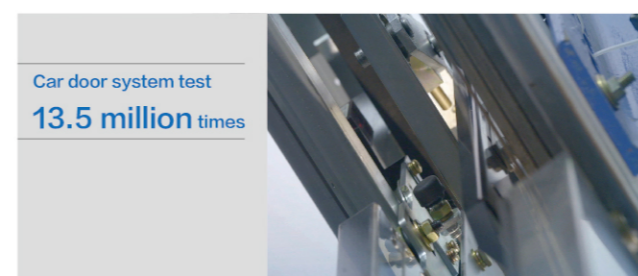*：Data sourced from industry investigation
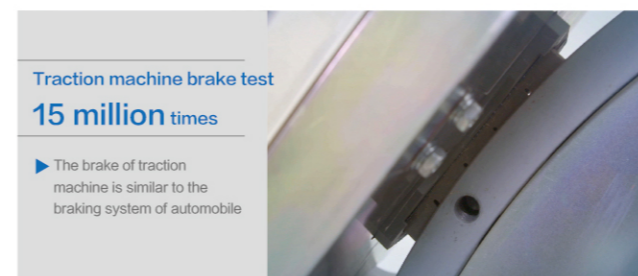
Long Life of Components

Unit: ten thousand times

Item	SMEC indicator	Industry average *
Design action life of brake	1500	About 700
Design life of hatch door system	300	About 230
Car door system test	1350	About 500
Design action life of button	500	About 300

Traction machine brake test
15 million times
▶ The brake of traction machine is similar to the braking system of automobile

Test of hatch door lock devicet
3 million times

Car door system test
13.5 million times

Elevator button test
5 million times

The picture is a schematic; if actual dimensions and appearance vary, the actual specifications shall prevail.

Rest Assured and More Intimate

A More Comfortable Experience

Comfort Improvement in the Car

Certified by TÜVRheinland, Germany, the comfort reaches the highest level of Good.

Night Operation Mode (Serene Silent Package)

Through the variable frequency speed regulation technology independently developed by SMEC, the elevator enters the low-power operation mode, thus reducing the impact of elevator operation on the homes.
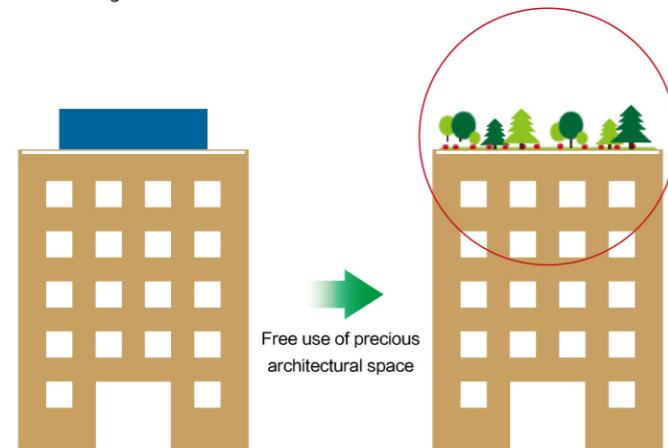
More Energy-saving Technology

Energy Efficiency Improvement

The whole elevator has obtained the Class A certificate of VDI4704 energy efficiency certification, The whole series traction machines reach level 1, the highest level of energy efficiency of China Energy Label.

Energy-saving Function

Energy-saving operation (number control/distribution control), automatic OFF of car fan/lighting, and darkening of hall display.
If it is turned off for 8 hours every day, the above functions can save about 700 kWh per year.

Low Energy Consumption

High Energy Consumption

More Flexible Civil Construction

Seamless linkage with LEHY-MRL-II civil sizes

Civil sizes are consistent with LEHY-MRL-II, leading the industry.

Machine Roomless Structure

The load self-supporting structure can realize the elevator without machine room, thus greatly reducing the civil cost of customers and improving the utilization rate of building space; the elevator control panel is arranged in the hoistway, which reduces the influence of the elevator on the appearance of the building and makes the design and layout of the building freer.

Free use of precious architectural space

More Convenient Installation and Maintenance

Improved installation efficiency

The hoisting efficiency of the traction machine is improved, the installation without frame is more convenient, and the installation difficulty is obviously reduced.

Newly Added Maintenance and Debugging Tools

Annual inspection tools are newly added to improve annual inspection efficiency and facilitate field annual inspection and debugging.

The picture is a schematic; if actual dimensions and appearance vary, the actual specifications shall prevail.

Water Ion Air Conditioners and Fans (optional)

Cleaner

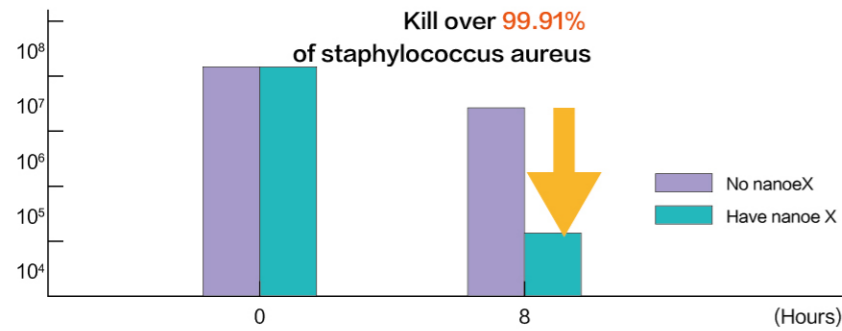· Equipped with Panasonic nanoeTM X water ion generator imported from Japan, which can kill attached bacteria and viruses.

· Equipped with high-sensitivity VOC sensors, which enable the fan to switch to the maximum speed for quick ventilation when smoke or unpleasant smell is detected.
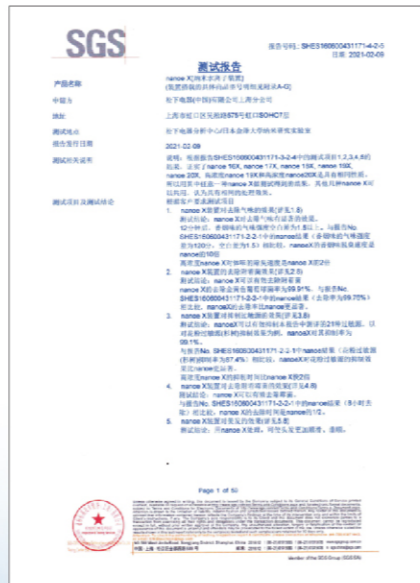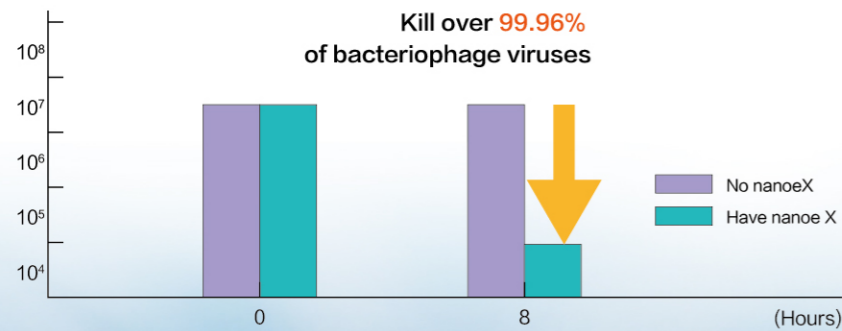
More User-friendly

· Fan speed can be adjusted according to the load: The fewer the number of passengers is, the slower and the quieter the fan is.

· Fan speed can also be adjusted from a mobile app.

Concentration of bacteria
cfu/Gauze

Kill over 99.91%
of staphylococcus aureus

10^8
10^7
10^6
10^5
10^4

0   8   (Hours)

■ No nanoeX
■ Have nanoe X

Number of virus infections
cfu/Gauze

Kill over 99.96%
of bacteriophage viruses

10^8
10^7
10^6
10^5
10^4

0   8   (Hours)

■ No nanoeX
■ Have nanoe X

Introduction to nanoe™ X Technology

· nanoe™X are water-wrapped nano-sized particles, which can kill the attached bacteria and viruses by denaturing their protein.

· The eight-hour nanoe™ X test in a 23.3 m^3 lab has proved that, nanoe™^{X} can kill up to 99.91% of Staphylococcus aureus.

· The eight-hour nanoe™X test in a 23.3 m^3 lab has proved that, nanoe™X can kill up to 99.96% of bacteriophage.

· nanoe, nanoe™X, nanoe label, and nanoeTMX label are trademarks of Panasonic Corporation.

Simple and Warm Car Decoration

A warm car ceiling and a new marble-like finished PVC car platform to enhance the sense of quality.

Improve the decoration of firefighter elevators, and match the decoration of ordinary passenger elevators.

FCustomize for Cases Where Elevator is Additionally Installed

A new 1200×1300 flat car is added for cases where elevator is additionally installed.

Barrier-free and aging-resistant customized decoration (ELEC care package): mirrors, handrails, stainless steel floors and seats in the car.

Easy-to-Recognize Micro-Light Buttons

A11 and A12 buttons give micro-light during standby, making numbers easier to recognize. Users can quickly recognize the floor number on the buttons even in the dark.

Pet Reminder Function (optional)
Let Neighbors Feel the Warmth

When riding the elevator with a pet, a passenger can press the pet button to provide a visual indication for passengers at other floors.In so doing, passengers at other floors can decide to or not to ride the elevator as needed, to effectively avoid unexpected pet disturbance.

The picture is a schematic; if actual dimensions and appearance vary, the actual specifications shall prevail.

Car Decoration

Mirror

ZYZ–01A
half–length mirror (optional)

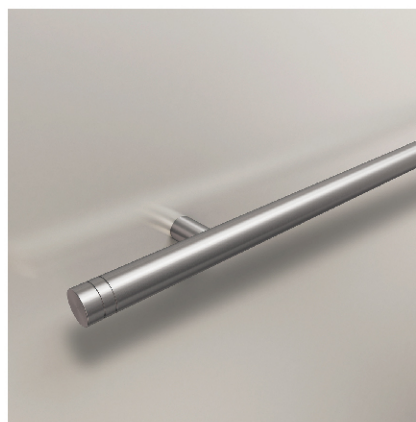**ZYZ–03S**
full–length mirror (optional)

ZYZ–04S
stainless steel mirror (optional)

Handrail Type

ZYH–FH10
Stainless Steel Flat Handrail(Optional)

ZYH–RH05/RH05B
Stainless Steel Round Handrail(Optional)

(Comply with GB50763–2012、GBT 24477–2009 Standard)

ZYH–RH06/RH06B
Stainless Steel Round Handrail(Optional)

More versatile design: brand–new handrail design, simple and versatile appearance and easier to manufacture, ensuring excellent quality of handrails Newly added titanium–plated handrails for choice, so as to match the car environment better.

More comprehensive function: when the handrail and the operation panel are installed on the same side, there is no need to interrupt, and the effect is better. When there is a decorative layer on the car wall, standard handrails can also cope.

Firmer structure: the back reinforcement structure is added to the car wall where the handrail is installed, so that the handrail is more firmly installed, thus effectively preventing the handrail from shaking.

Notes: Titanium coated stainless steel is alternative for handrail ZYH–FH10\ZYH–RH05\ZYH–RH06. Please refer to material table for details of titanium color code.

Floor Material

Artificial Stone Flooring

ZRZ–A01
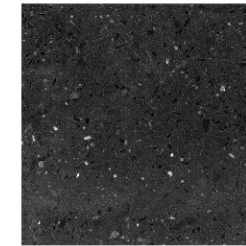
ZRZ–A02
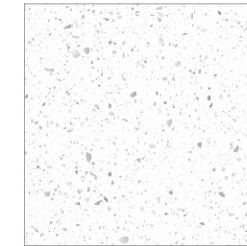
ZRZ–A03
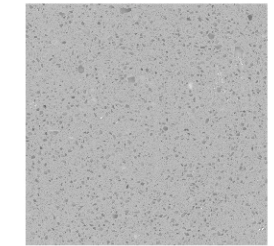
ZRZ–A04

Marble Flooring

ZSC–001
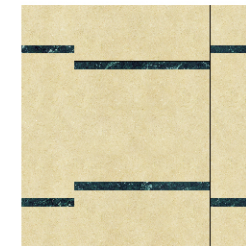
ZSC–002
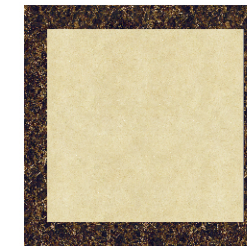
ZSC–011

ZSC–012

ZSC–013

ZSC–014

ZSC–016

ZSC–029

Parquet PVC Flooring

ZPH–032

ZPH–030

ZPH–028

ZPH–033

ZPH–026
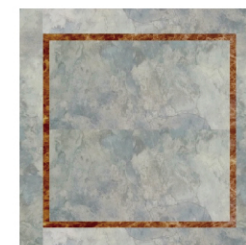
ZPH–029
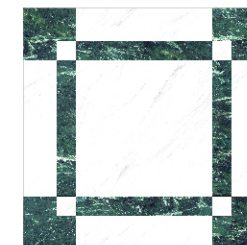
ZPH–034

ZPH–031

Notes: 1.Single color PVC floor or parquet PVC floor is alternative. Please choose color code according to SMEC color sample.
2.Standard marble floor is made of marble composite aluminum honeycomb board.
3.Marbles belong to natural products and may have patterns. Pattern and color may have slight differences.Full paving of marble may have splicing due to the size limitation.

Design of Car Ceiling

ZCL-SS12 (Standard)

Lighting: down light direct lighting
Material: coating steel sheet
Thickness: 100mm
Remark: When air conditioner and emergency exit are selected, there are no ventilation holes on the ceiling surface, and the ventilation holes are placed in the gaps on both sides of the car ceiling.

ZCL-SS10 (Standard)
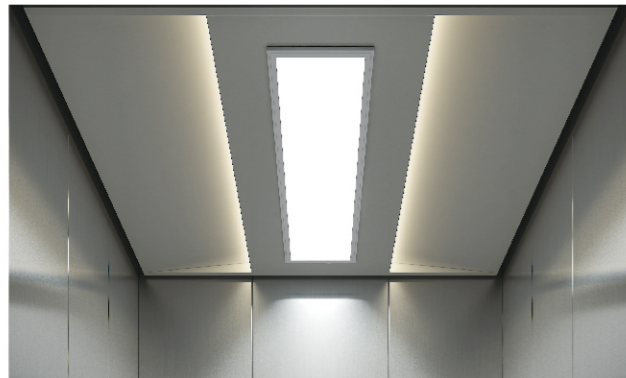
Lighting: central thin light guide panels; ambient lighting at two sides
Material: painted steel
Thickness: 100mm

ZCL-SS08 (Standard)

Lighting: central direct lighting
Material: central milk white printed lighting board, two-side painted steel
Thickness: 200mm

ZCL-SS07S (Optional)
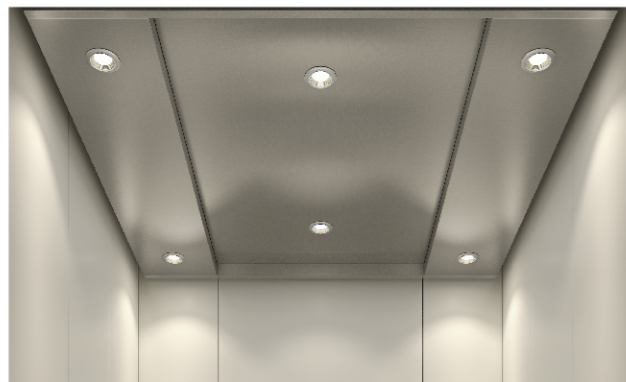
Lighting: down light direct lighting
Material: stainless steel
Thickness: 100mm

ZCL-GS18 (Optional)
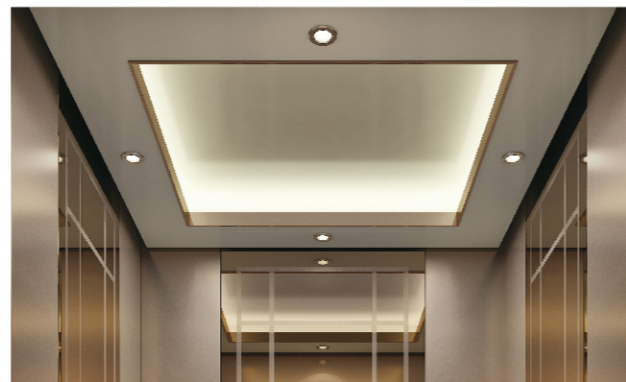
Lighting: central floodlight lighting, ambient down lamp lighting
Material: painted steel for ceilings at four sides;
        mirror-finish titanium stainless steel for frames
Thickness: 200mm

ZCL-GS06 (Optional)

Lighting: central direct lighting; two-side auxiliary lighting
Material: central milk white printed lighting board, ambient metallic
        painted steel sheet, translucent plates on both sides
Thickness: 200mm

ZCL-GS22 (Optional)

Lighting: central direct lighting; two-side down lamp lighting
Material: Central milky white arched lighting panel; two-side mirror stainless steel
Thickness: 200mm

ZCL-CN01 (S200) (Bare Ceiling)

When the ceiling decoration is provided by others, the thickness should be ≥100mm, otherwise the internal structure will be exposed and affect the appearance.

### ZCL-CN08 (S300) (Bare Ceiling)

When the ceiling decoration is provided by others, the thickness should be ≥200mm, otherwise the internal structure will be exposed and affect the appearance.

Note:
1. All car roofs adopt LED lighting.
2. The ventilation outlet of car roof is arranged at the back of the two sides. Safety windows are optional at the car top, but shall comply with GB 7588 and GB/T 7588.1. For details, please contact your local sales agent.
3. ZY015 is the default color number for ZCL-SS10, ZCL-GN07 and ZCL-GS21, and Y033 for ZCL-SS08, ZCL-SS07 and ZCL-GS18. If other colors are required for coated steel sheets, please refer to the color samples provided by SMEC.

Intelligent UV light Sterilization Lamp (Optional)

Effective and Powerful Sterilization
Operating on the surface of control box and handrail for 12min can kill over 99% of Escherichia Coli.[data calculated by 1050 kg car]

Easy Installation and Modification
Screws are installed in holes drilled on the car ceiling and the power control lines on the lighting wiring terminal.

Appearance Design
The protective housing, mounted in side front of the ceiling in not abrupt way, can not only transmit light, but also protect the tube.

Functional Design
Users can switch between 'Normal' mode and 'Boost' mode, control the mode and power switch with a remote control. The indicator give indications of information like mode, fault, replacement of a tube, etc.

Dual Safety Protection
It start only the elevator entering sleep-mode and lighting is off and lighting lamp go out; it will shut down as soon as the infrared sensor detects any person.

Car Decoration

Full-height Operation Panel

Front Wall

Side Wall

High hardness resin display window

Yellow Segment Display

The buttons are exchangeable. The figure shown is A12 button.
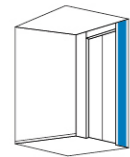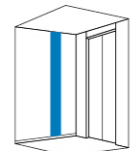
ZCB■-ND11 (Primary)
ZCB■-ND61 (Auxiliary)
Front Wall/Side Wall

High hardness resin display window

Orange Segment Display

The buttons are exchangeable. The figure shown is A12 button.

ZCB■-ND10 (Primary)
ZCB■-ND60 (Auxiliary)
Front Wall/Side Wall

High hardness resin display window

Orange Segment Display

The optional buttons are A04, A05

ZCB■-ND30 (Primary)
ZCB■-ND80 (Auxiliary)
Side Wall
Comply with GB/ T24477 Standard

High hardness resin display window

8.4" Color segmented LCD Black text on a colored background

The buttons are exchangeable. The figure shown is A12 button.

ZCB■-N612 (Primary)
ZCB■-N662 (Auxiliary)
Front Wall/Side Wall

Physically toughened glas

10.4" TFT LCD, black gold interface (Picture player) Resolution: 1280 × 800 (Support for image playback)

10.1 inch touch screen Resolution: 1280 × 800
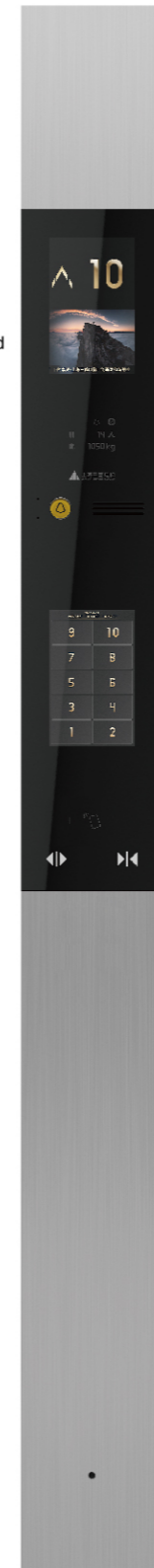
ZCBE10-N71B(Primary)
ZCBE10-N76B (Auxiliary)
Front Wall/Side Wall

Wheel Chair Operation Panel
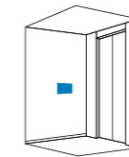
Side Wall

ZCB■-F011 (Primary)
ZCB■-F061 (Auxiliary)
The buttons are exchangeable.
The figure shown is A14 button.

ZCB■-F131 (Primary)
ZCB■-F181 (Auxiliary)
The buttons are exchangeable.
The figure shown is A14 button.
(Comply with GB/ T24477 Standard)

Diversified Button

Basic Buttons

A11(White Light)
Diameter 35mm
Machinery Fine Motion
Flat Words
Standby Micro-light
Stainless Steel Surface

Optional Button Styles

A12(Orange Light)
Diameter 35mm
Machinery Fine Motion
Flat Words
Standby Micro-light
Stainless Steel Surface

A14(White Light)
Diameter 35mm
Machinery Fine Motion
Protruded Words with Braille
Standby Micro-light
Stainless Steel Surface

A15(Orange Light)
Diameter 35mm
Machinery Fine Motion
Protruded Words with Braille
Standby Micro-light
Stainless Steel Surface

A64
Diameter 35mm
Machinery Fine Motion
Standby green light
Light up the green convex text
Stainless Steel Surface

Note:
1、The symbol ■ refers to the button model. Please select it from the "Diversified button" .
2、Hairline-finish, mirror-finish, random pattern and sand pattern stainless steel can be used for the faceplate of the operating panel. Non-standard confirmation is required for titanium plated stainless steel.
4、ZCB■-F131/181 complies with GB/T24477. Technical confirmation is required to determine whether the complete elevator meets the standard.

Hall Design

Hall Door and Jamb

E-102 Narrow Door Jamb

Landing Display Call: ZPIA12-GD10
Landing Door Material: Hairline Stainless Steel
Jamb Material: Hairline Stainless Steel

E-302 Bevel (10°) Wide Door Jamb

Landing Display Call: ZPIA12-GB13
Landing Door Material: Hairline Stainless Steel
Jamb Material: Hairline Stainless Steel

Landing Display

ZPI■-GD10
Wall-mounted
Without Bottom Box
Orange Segment Code

ZPI■-GD20
Wall-mounted
Without Bottom Box
Orange Segment Code
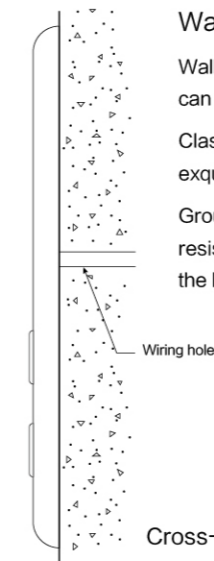
Wall-mounted call

Wall-mounted structure: civil construction only requires reserved round holes, which can also be punched on site, making installation easy and labor-saving.

Classic appearance: featured by Mitsubishi classic design, simple appearance, exquisite workmanship and clear display.

Grounding structure: the anti-static capability is stronger, so that it can effectively resist thousands or even tens of thousands of volts of static electricity generated by the human body.

Wiring hole

Cross-section of bottom-box-less buttons

7-inch Touch Screen Hall Call

ZPIE07-GF10/GF20

High-end Texture
Titanium-plated aluminum alloy middle frame + 7-inch high-resolution highlight screen

Comfortable Control
15° inclination, which is more ergonomic

Empowered by Wisdom
newly added the function of calling designated elevator, and removed the physical HOS lock

Excellent Performance
IPX3 waterproofing is provided as standard, which can better cope with humid environment and weather

Landing Call

ZPI■-CD12
Embedded
With a bottom box
Gold Segment Code

ZPI■-CD22
Embedded
With a bottom box
Gold Segment Code

ZPI■-GB13
4.3" Color segmented LCD
Black text on a colored background

ZPI■-GB23
4.3" Color segmented LCD
Black text on a colored background

ZHB■-H030
Single Elevator

ZHB■-H041
Parallel Connection

Comply with GB/ T24477 Standard

Features

Control and Security Features

●:Standard, ○:Optional

Feature	Description	Code	1C-2BC	2C-SM21	2C-4C-ITS-21	3-8C-ITS-2100
Automatic Landing with Rheostatic Leveling	When the car parks at a station, if the vertical difference between the upper plane of the car sill and that of the landing door sill exceeds predetermined value, the elevator will level automatically.	ARL	○	○	○	○
Anti-stall Timer	When the traction rope slips or motor stall reaches predetermined time, the elevator will stop.	AST	●	●	●	●
Brake Redundancy Protection	When a group of brakes fails, the remaining brakes still can realize effective braking of the elevator.	BTUP	●	●	●	●
Car Slide Safety Protection	When the car slides due to insufficient braking force, short the three-phase winding of PM traction machine in normal power supply state to reduce the speed the car slides.	CSSP	●	●	●	●
Energy Feedback	Feed energy generated during operation back to the grid to save energy.	EFDBK	○	○	○	○
Electrical Safe Loop Protection	Prevent the elevator from operating once the electrical safety devices connected together in series act.	ESC	●	●	●	●
Automatic story height measuring	Automatically measure and record story height	FMR	●	●	●	●
Inspection operation	Inspection operation mode for the use of maintenance personnel	HAND	●	●	●	●
Load Weighing Start	The elevator adjusts startup torque according to the car load so as to allow smooth start.	LWS	●	●	●	●
Over-current Protection	Stop elevator when the current through the rectifier or inverter is detected too high.	OCP	●	●	●	●
Over-speed Protection	Stop elevator when the running speed is detected over allowable value.	OSP	●	●	●	●
Over-Temperature Protection	Stop elevator when over temperature of motor is detected.	OTP	●	●	●	●
Over-voltage Protection	Stop elevator when the voltage across the rectifier or inverter is detected too high.	OVP	●	●	●	●
Power Failure Protection	Stop elevator when open-phase, undervoltage or other faults of power occurs.	PFP	●	●	●	●
Power-on Releveling	If the car stops in the range of door area due to power failure, it will relevel to the leveling position after the power is recovered.	PORL	●	●	●	●
Reversal protection	Stop elevator when it is detected running in reversed direction.	RSP	●	●	●	●
Selector Correcting	The elevator corrects the selector during operation.	SC	●	●	●	●
Safe Landing	If a car has stopped between floors for some reason, the controller checks the cause, and if it is considered safe to move the car, the car will move to the nearest floor and doors will open.	SFL	●	●	●	●
Stop Open	The car doors open automatically after the car stops at a floor.	SO	●	●	●	●
Inverter High-temperature Detect	Stop elevator when inverter high-temperature is detected.	THMF	●	●	●	●
Terminal Forced Decelerate	If the car runs to the terminal but the speed has not been reduced to specified value, the system will force it to decelerate and thus enable it to level normally.	TSD	●	●	●	●
Unintended Car Movement Protection	Elevator safety component to stop unintended car movement away from the landing with the landing door not in the locked position and the car door not in the closed position, as a result of any single failure of the lift machine or drive control system.	UCMP	●	●	●	●
Under Speed Protection	Stop elevator when the running speed is detected under allowable value.	USP	●	●	●	●

Operational and Service Features

●:Standard, ○:Optional, ◇:Non-standard design required, —:Not applicable

Feature	Description	Code	1C-2BC	2C-SM21	2C-4C-ITS-21	3-8C-ITS-2100
Automatic Bypass	When the car load exceeds 80% (adjustable) rated capacity, the elevator does not response hall calls from other floors along its travel.	ABP	○	○	○	○
Attendant Service	Normal operation of the elevator is conducted by an attendant	AS	○	○	○	○
Bypass	Bypass all hall calls when the attedant serves and activates the 'Bypass' button.	BP *1	○	○	○	○
Car Computer Back Up Operation	When an abnormity occurs on the car computer, the car stops at nearest floor and the elevator cannot restart.	CCBK	●	●	●	●
Car Call Cancelling	In automatic operation, when a car has responded to the final car call or landing call in one direction, the system automatically checks and clears remaining car calls from the memory.	CCC	●	●	●	●
Car Fan Shut Off – Automatic	If there are no calls for a specified period, the car ventilation fan will automatically be turned off to conserve energy.	CFO-A	○	○	○	○
Car Fan Shut Off – Manual (button type)	The car ventilation fan is turned off by combination buttons on the operation panel.	CFO-B *2	●	●	●	●
Car Light Shut Off – Automatic	If there are no calls for a specified period, the car light will automatically be turned off to conserve energy.	CLO-A	○	○	○	○
Car Light Shut Off – Manual (button type)	The car light is turned off by combination buttons on the operation panel.	CLO-B *2	●	●	●	●
Continuity of Service	To ensure normal operation of elevators in a whole group, when a certain elevator cannot respond registered landing calls, it will be excluded from landing call service, and service is provided by other elevators.	COS	—	●	●	●
Elevator Dedicated Air Conditioning	Air conditioning for elevator car.	EAC	○	○	○	○
Elevator APP remote control operation	Electrical components of the car and some functional settings originally completed by switches in the bi-parting door, such as (lighting/fan/air conditioner, CLO/CFO/IND/AS/SCS-IC/SCS-BT/NS-CB/SCS-B, etc.) can be set via mobile phone APPs.	EVAC	○	○	○	○
Self-diagnosis	Diagnose abnormities and faults occurred during elevator operation.	EFD	●	●	●	●
Exit Switch	Switch for detecting state of exit	EXIT SW	○	○	○	○
False Call Cancelling – Automatic	If the number of registered calls is not agree with the number of passengers, it will cancel all calls to avoid unnecessary stops.	FCC-A *3	○	○	○	○
False Call Cancelling – Manual (car button type)	If the wrong car button is pressed, it can be canceled by quickly pressing the same button again twice.	FCC-P *4	○	○	○	○
Hall Call Erase – Manual (hall button type)	If the wrong hall calling button is pressed, it can be canceled by quickly pressing the same button again twice.	FHC-P	○	—	○	○
Automatic Hall Call Registration	When one elevator cannot take all passengers, the landing button remains registered state, and the system will assign another elevator to provide service.	FSAT	●	●	●	●
Group Control Backup Service	Maintain service of individual elevators when group control becomes invalid due to failure of the group control controller or failure of communication between the group control and individual stations.	GCBK	—	—	●	●
Hall Computer Back UP Operation	When an abnormity occurs on the hall computer, the car stops at nearest floor and the elevator cannot restart.	HCBK	●	●	●	●
Hospital Emergency – Block Sign	By pressing the Door Open button and the DKO-TB button simultaneously, the elevator will respond only to the car call.	HE-B	◇	◇	◇	◇
Hall Out-of-service Operation	Turn on or shut off the elevator by operating the "RUN/STOP" switch installed on specified floor.	HOS	○	●	●	●
Hall Out-of-Service Switch(Timer)	RUN/STOP operation of an elevator can be controlled by using a timer installed in the specified elevator hall.	HOS-T	○	○	○	○
Intelligent Call System	Achieve intelligent elevator calling through mobile devices or biological recognition technology.	ICS	◇	◇	◇	◇

Operational and Service Features

●:Standard, ○:Optional, ◇:Non-standard design required, —:Not applicable

Feature	Description	Code	1C-2BC	2C-SM21	2C-4C-ITS-21	3-8C-ITS-2100
Call linkage	It realizes remote registration of elevator hall calls through linkage control with a third party building access control system or resident's indoor intercom.	ICS-AHR	◇	◇	◇	◇
Take elevator by scan an IC card	When an IC card is scanned in the car or hall, the elevator automatically registers or releases the access of the relevant floor.	ICS-IC	◇	◇	◇	◇
Take elevator by scan an ID card	When an ID card is scanned in the car or hall, the elevator automatically registers or releases the access of the relevant floor.	ICS-ID	◇	◇	◇	◇
Take elevator by face identification	The car or hall automatically registers or releases the access of the relevant floor upon face identification.	ICS-P	◇	◇	◇	◇
Take elevator by fingerprint identification	The car automatically registers or releases the access permission of the floor upon fingerprint identification.	ICS-F	◇	◇	◇	◇
Take elevator by 2D code identification	The car automatically registers or releases the access permission of the relevant floor upon 2D code identification.	ICS-Q	◇	◇	◇	◇
Access control four-in-one identification	At the entrance of the building, owners are supported to verify their identities through IC cards, fingerprints, QR codes and human faces to release access control, automatically register or permit access to relevant floors.	ICS-G	◇	◇	◇	◇
Indoor building intercom and access release	On the basis of the four-in-one access control identification terminal, visitors are supported to call the owners at home at the entrance of the building, the owners release the access control for visitors, and the system automatically registers or releases the access permission for relevant floors.	ICS-R	◇	◇	◇	◇
Voice call	It calls and registers the elevator by voice recognition in the car or hall.	ICS-S	◇	◇	◇	◇
Elevator identification through mobile phone (with permission control)	The car or hall automatically registers or releases the access permission of the relevant floor upon phone blue tooth identification.	ICS-BT	◇	◇	◇	◇
Take elevator by dynamic QR code identification	The car or hall can automatically register or release the access permission of the relevant floor upon dynamic QR code identification. QR codes are generated by Mitsubishi APP.	ICS-DQR	◇	◇	◇	◇
Take elevator by static 2D code identification	The car automatically registers or releases the access permission of the relevant floor upon 2D code identification. 2D codes are generated by an APP provided by a third party.	ICS-SQR	◇	◇	◇	◇
Elevator identification through mobile phone (without permission control)	It registers the elevator via mobile phone Bluetooth in the car or hall to realize non-contact elevator riding without floor permission control.	ICS-UBT	◇	◇	◇	◇
Independent Service	Using the Independent switch in the operation panel, the car can respond only to car calls without interrupting service.	IND *2	●	●	●	●
Intelligent voice interaction system	It provides intelligent voice interaction, including voice operation and elevator voice announcement, etc.	IVS	◇	◇	◇	◇
Car voice call	It registers floor(s) through voice in the car.	IVS-CR	◇	◇	◇	◇
Hall voice call	It registers hall call(s) through voice at halls.	IVS-HC	◇	◇	◇	◇
Hall voice registration of destination floor	It registers destination floor(s) through voice at halls.	IVS-HR	◇	◇	◇	◇
Non-service to Specific Floor (car button type)	Cancel service to specific floor by operating buttons on the operation panel and the setting switch.	NS	◇	◇	◇	◇
Non-service to Specific Floor (switch type)	Operating this switch can cancel service to specified floors.	NS-CB	◇	◇	◇	◇
Not Start Operation	When landing call or car call is registered but the car cannot start within predetermined time, it will clear the assigned landing call, reserve the car call, light up the Abnormal lamp, and sound the Abnormal bell.	NST *5	●	●	●	●
Non-Service to Specific Floor –Timer Type	Elevator service for a specified floor is temporarily suspended during a specified period.	NS-T	◇	◇	◇	◇
Next Landing	After the car has arrived at the destination floor, if the car doors cannot open fully, it will close the doors and continue to run to the next floor until the doors can open fully and then restore normal operation.	NXL	●	●	●	●
Overload Holding Stop	When the car is overloaded, the doors remain open and a buzzer sounds.	OLH	●	●	●	●
Ride with Pet	When the Pet in Car button is pressed, the hall pet indicator will be lit to remind passengers that a pet is in the car.	PRO	○	○	○	○
Remote Control Stop	Start or stop the car through the remote control switch.	RCS *6	○	○	○	○
Return Operation (Normal Return)	Operating Return switch to immediate call the car back to specified floor and park there.	RET *6	○	○	○	○
Secret Call Service (car button type)	Lock certain floors on the operation panel by setting password. The buttons of these specified floors can only be registered after the password is entered on the operation panel.	SCS-B	○	○	○	○
Secret Call Service (IC card type)	The buttons of certain specified floors can only be registered via IC card.	SCS-IC	○	○	○	○

Note：
*1 Standard when AS is provided.
*2 When there is a hoistway safety door.
*3 When the number of stop is ≥6 and the SCS-IC is not configured to be applied.
*4 SCS-IC is not configured to be applied.
*5 NS changeover switch is installed in the operating panel of the main car by default and the name of NS floors must be specified on the non-standard confirmation form.
*6 The consumer or SmartEye shall provide a dry contact signal to the control cabinet.

Emergency Operation Features

●: 标准功能; ○: 选择功能; ◇: 需非标设计; —: 不适用

Feature	Description	Code	1C-2BC	2C-SM21	2C-4C-ITS-21	3-8C-ITS-2100
Emergency Car Lighting	When normal lighting power supply fails, emergency car lighting is provided.	ECL	●	●	●	●
Earthquake Emergency Return (S-wave)	When S-wave earthquake detector acts, the car immediately parks at the nearest floor with door opened.	EER-S	◇	◇	◇	◇
Power Failure Emergency Landing Device	When normal power supply breaks, this device will supply power to move the car to the nearest floor, level and open the doors, and allow the passengers to leave safely.	ELD *1	○	○	○	○
Alarm Bell	Press this alarm bell in emergency. The bell and interphone will sound.	EMB	●	●	●	●
Fireman's Emergency Operation	When a fire happens, fireman switch actions, a car returns to the predetermined evacuation floor, then door opens canceling all calls from landings or car, the car is available for fireman's use.	FE	○	○	○	○
Fire Emergency Return	When the Fire Emergency Return switch acts, all landing calls and car calls are cancelled, and the car immediately returns to predetermined floor and parks with door open.	FER	○	○	○	○
Operation by Emergency Power Source – Sole Automatic	When normal power supply breaks, the pre-assigned cars will be powered by the emergency power source of the building and automatically travel to the predetermined floors in order. Once all cars have arrived at the predetermined floors, the specified car can operate normally.	OEPS-SA	○	○	○	○
Remote Service System	Monitor elevator operation in real time, send faults or abnormities to the Service Center of the company via wireless network in a timely manner, and process them quickly. Provide customers with value-added services by establishing customized maintenance program.	REMES-II *2	○	○	○	○
Elevator Monitoring System	This system uses computers to monitor the operation and position of the elevator and provides operation instructions when necessary.	SmartEye	○	○	○	○

Note：
*1 Optional when the interval of the adjacent floor is no more than 10m.
*2 A maintenance contract needs to be signed with Shanghai Mitsubishi Elevator Co., Ltd. Currently not available for overseas market.

Information and Display Features

●:Standard, ○:Optional, ◇: Non-standard design required, —:Not applicable

Feature	Description	Code	1C-2BC	2C-SM21	2C-4C-ITS-21	3-8C-ITS-2100
Voice Announce Device	Voice announce device (Chinese) informs the passengers of related elevator information.	AAN-S01 *1	○	○	○	○
Voice Announce Device	Voice announce device (Chinese and English in turn) informs the passengers of related elevator information.	AAN-S02 *1	○	○	○	○
Voice Announce Device	Voice announce device (English) informs the passengers of related elevator information.	AAN-S03* 1	○	○	○	○
Time-segmented voice announcement and arrival chime control function	Realize time-segmented voice announcement and arrival chime control to avoid noise interference to residents at night.	AAN-T *2	○	○	○	○
Articulating Car Button	When an instruction button in the car is pressed, a prompt tone will sound after receiving the response from the system.	ACB	◇	◇	◇	◇
Car Arrival Chime (Car)	The chime prompts the passengers the car has arrived at the destination floor. (The chime is installed on the car roof and floor)	AECC	○	○	○	○
Car Arrival Chime (Hall)	The chime prompts the passengers the car has arrived at the destination floor. (The chime is installed on the hall)	AECH	○	○	○	○
Articulating Car Button	When an instruction button in the car is pressed, a prompt tone will sound after receiving the response from the system.	AHC	◇	◇	◇	◇
Immediate Prediction Function	When a passenger registers a hall call, the optimum car to respond is immediately selected and announced to the passengers via hall lantern illumination and a single tone chime.	AIL	○	○	○	○
Immediate Prediction Broadcast	Once a passenger registers a floor call, the most appropriate elevator will be selected for this call, and inform the passenger via visual/acoustic signal.	ASL	○	○	○	○
Automatic Operation Signal Light (Hall)	The landing indicator displays the elevator is in automatic operation state.	AUTL	○	○	○	○
Signal Interface Device	Outputs basic operation state signal of the elevator via this device	BA *3	○	○	○	○
Bypass Signal Light (Hall)	The landing indicator displays the elevator is in "Bypass operation" state.	BPL *4	○	○	○	○
Direction Arrows in Car	Indicates running direction with arrows in the car.	DAC	●	●	●	●
Direction Arrows on Hall	Indicates running direction with arrows on the hall.	DAH	●	●	●	●
Door-Close Button Response Light	The Door-Close button light illuminates at the same time when this button is pressed.	DCR	●	●	●	●
Extended Door-Open Button Light	When the Extended Door-Open button is pressed, the indicator light illuminates for certain period.	DKOL *5	○	○	○	○
Door-Open Button Response Light	The Door-Open button light illuminates at the same time when this button is pressed.	DOL	●	●	●	●
Elevator Counter/Timer	Record number of runs and running time of the elevator.	ECT	●	●	●	●
Multimedia Display in Car	Can provide audio/video or other information for the passengers (installed in the car).	EMIDS-C	◇	◇	◇	◇
Operation panel multimedia display	It can provide passengers with audio and video information (installed in the operation panel).	EMIDS-COP	◇	◇	◇	◇
Multimedia Display on Hall	Can provide audio/video or other information for the passengers (installed on the hall).	EMIDS-H	◇	◇	◇	◇
Exclusive Service Indication	Display that the elevator is in exclusive service state.	EXCL	○	○	○	○
Fireman's Emergency Operation – Complete	The fireman's emergency operation is activated,the elevator runs to specified return floor, then the elevator outputs an in-place indicating signal.	FE-CP *6	○	○	○	○
Fire Emergency Return – Completed	A CP signal is outputted after the FER running is completed.	FER-CP *7	○	○	○	○
FE Operation Signal Lamp in Car	When the elevator gets into FE operation status, the signal lamp in the car will indicate the status.	FELC *8	◇	◇	◇	◇
Flashing Hall Button Light	When the elevator stops at a landing and starts to open the doors, the Hall Call Button light of the same direction flashes to remind passengers that the car has arrived; when the doors are closed fully, the button light goes off.	FHBL	●	●	●	●
Flashing Hall Lantern	Flashing lantern indicates arrival of car and its running direction.	FHL	○	○	○	○
Inspection operation light	The hall display shows that the elevator is in inspection state.	HANDL	○	○	○	○
Energy-saving function for hall position indicator	The hall position indicator will display information with low brightness when there is no call, and with normal brightness when the call button of the floor is activated, thus saving energy and extending service life.	HIES	○	○	○	○
Interphone	In emergency, persons in car, on car top, or in pit can use this device to communicate with persons in machine room or monitoring room.	ITP *9	●	●	●	●
ITV Cable(analog)	The cable used for video camera(analog) installed in the car for user to monitor the real image in the supervisory room.	ITV-A*10	○	○	○	○
ITV Cable(digital)	The cable used for video camera(digital) installed in the car for user to monitor the real image in the supervisory room.	ITV-D*11	○	○	○	○
ITV Cable(for SMOS)	The cable used for video camera equipped with SMOS system.	ITV-S*11	○	○	○	○
Operation by Emergency Power Source – Completed	A CP signal is outputted after the operation by emergency power source is completed.	OEPS-CP *12	○	○	○	○
Overload Indication in Car	When the elevator is overloaded, the overload indicator lamp illuminates.	OLHL	○	○	○	○
Pet Reminder	The hall position indicator shows that a pet is in the car.	PETL *13	○	○	○	○
Out-of-Service Indication	Indicate the elevator is out of service on the hall.	RESL	○	○	○	○
Second Car Prediction	If a single elevator is not able to service all passengers on a crowded floor, another hall lantern will flicker to indicate the second car that will service that floor	TCP *14	○	○	○	○

Note：
*1 Only one of AAN-S01/S02/S03 can be selected at most.
*2 Optional only when one or more elevators are installed additionally
*3 Output signals are UP, DOWN, integrated fault, landing station code signals. The output signal terminals are in the control cabinet in the machine room. Output modes are dry contact and RS485 series communication.
*4 Standard when ABP or BP is provided.
*5 Standard when DKO-TB is provided.
*6 Standard when FE is provided.
*7 Standard when FER is provided.
*8 Optional when FE is provided.
*9 The customer is responsible for the cables from the machine room to the monitoring room and their installation.
*10 Select ITV-A, ITV-D or ITV-S.
*11 Select ITV-A, ITV-D or ITV-S. Optional when SmartEye is provided.
*12 Optional when OEPS-SA is provided.
*13 Non-standard confirmation
*14 Optional when UPS, DPS or LTS is provided.

Door Operating Features

●:Standard, ○:Optional, —:Not applicable

Feature	Description	Code	1C-2BC	2C-SM21	2C-4C-ITS-21	3-8C-ITS-2100
Light Curtain Protection	Light curtain protection with multiple light beam.	AMS *1	○	○	○	○
Door Close Limit Switch on Start	When the car doors can not close completely, they will reverse and open.	CLTS	●	●	●	●
Double Door Operation	When car doors are in open state, if there is no car call and landing call in forward direction and the landing call in reverse direction of this floor has been registered, the car doors will close and then immediately open again.	DDOP	●	●	●	●
Extended Door-open Button	Press and hold this button can extend door-open time.	DKO-TB	○	○	○	○
Door Load Detect	If the car doors cannot fully open or close due to overload, the doors will act in reverse direction.	DLD	●	●	●	●
Not Door Open Feature	If car doors are blocked while opening, they will close immediately.	DONG	●	●	●	●
Automatic Door-open Time Adjustment	Automatically adjust door-open time according to landing calls or car calls.	DOT	●	●	●	●
Door Close Torque Up Control	When car doors encounter extra resistance while closing, the door system will automatically increase the torque.After the car has stopped at a station and the doors has opened, pressing Close button can make the doors to close immediately.	DTC	●	●	●	●
Expediting of Door Close	By pressing the Door Close button, the Door Closing Operation is immediately activated, and thus the traffic efficiency is improved.	EDC	●	●	●	●
Electronic Door Man	It monitors passengers' access to the car via infrared rays, and minimizes the DKO time.	EDM	◇	◇	◇	◇
Multi-beam Safety Edge	Safety edge with multi-beam. Provide double protection by multi-beam and safety edge. During door closing, when a passenger or object is detected, the doors will open again.	MBS *1	○	○	○	○
Door Nudging Feature – with buzzer	If the door-open time exceeds the predetermined value, it will give alarm sound to alert the passenger and try to close the doors.	NDG	○	○	○	○
Repeated Door-Close	If car doors are blocked while closing, the elevator will repeat the closing action until the debris is removed.	RDC	●	●	●	●
Reopen with Hall Button	During door closing, when hall calling button in the same direction is pressed, the doors will reopen.	ROHB	●	●	●	●

Note：*1 AMS, MBS must choose one. AMS must be used for glass car doors.

Group Control Features

●:Standard, ○:Optional, ◇: Non-standard design required, —:Not applicable

Feature	Description	Code	1C-2BC	2C-SM21	2C-4C-ITS-21	3-8C-ITS-2100
Bank Separation Operation	Separate landing buttons into several groups and provide independent group control, and each group has its own hall calling button.	BSO	—	—	○	○
Congested-Floor Service	When temporary congestion occurs due to meeting or other events, the system will try its best to arrange cars to the congested floor.	CFS	—	—	○	○
Closest Car Priority Service	In respond to a hall call, priority is given to the car closest to the hall button pressed.	CNPS	—	—	●	●
Destination-oriented allocation system	After pressing the destination floor button of the hall control box, the system forecasts the number of the elevator serving that floor. The system allocates elevators according to the destination floor to improve traffic efficiency.	DOAS-S	—	—	—	○
Down Peak Service	During the predetermined off-hour, elevators are continuously sent o the top floor to meet the needs of off-hour peak traffic congestion.	DPS	—	—	○	○
Energy-Saving Operation – Number of Car	With consideration of the traffic data and keeping elevator service at a predetermined level, when the level of elevator service becomes greater than the predetermined level, energy savings are attained through reducing the number of running cars.	ESO-N	—	—	○	○
Special Floor Forced Stop	Cars passing a certain floor are forced to stop at this floor.	FFS	○	○	○	○
Hall congestion monitoring system	The crowded degree of the hall is monitored by the number identification device installed at the hall, and the elevator is allocated in time and reasonably.	HCS	—	—	◇	◇
Intense Up Peak	In response to upward traffic congestion from the main floor which occurs at a specific time, a bank of car cars are divided into two groups to serve high zone and low zone floors.	IUP	—	—	—	○
Lunch Time Service	Car assignment can be adjusted to favor canteen or restaurant floor to accommodate the high demand during lunch time.	LTS	—	—	○	○
Main Floor Parking	When there is no landing call or car call, the car returns to main floor and parks there.	MFP	○	—	—	—
Strategic Overall Assignment	For group control elevators, the cars park dispersedly at the main station and middle floor.	OHS	—	●	●	●
Prevention of Simultaneous Running	This feature prevents simultaneous running within rapid running region of elevators installed in the same well to boost noise in the car.	PRS	—	—	○	○
Peak Traffic Control	To alleviate temporary peak traffic, heavy traffic floors (top floor or main floor) will be given priority service.	PTC	—	—	●	●
Special Car Priority Service	When a hall call is registered, a previously specified car (e.g. observation car, alternative terminal floor car) is assigned as higher priority, provided efficiency of overall group control is not disturbed seriously.	SCPS	—	—	—	○
Car Call Button with Service Floor Indicator	A particular car is given higher priority for service to a specified floor compared to the other floors without priority service.	SFPS	—	—	○	○
Main Floor Changeover Operation	Main floor can be changed by pressing the Changeover switch.	TFS	○	○	○	○
Light Load Car Priority Service	When the traffic is not crowded, allocation priority is given to vacant and lightly loaded cars (car with loads of less than 10%).	UCPS	—	—	○	○
Up Peak Service	During the predetermined work hours when the up traffic from the main floor is specially heavy, elevators are continuously sent to the main floor meet the needs of up peak traffic.	UPS	—	—	○	○
VIP Service		VIP-S	—	—	○	○

Smart Functions

—:Not applicable

Feature	Description	Code	1C-2BC	2C-SM21	2C-4C-ITS-21	3-8C-ITS-2100
Intelligent robot interface	Provide a local data interface for robot riding.	IS-RB	◇	◇	◇	◇
Intelligent robot Cloud interface	Provide a Cloud data interface for robot riding.	IS-RC	◇	◇	◇	◇

Item	Specifications					Notes
Speed(m/s)	0.4	0.63	1.0	1.6	1.75	
Capacity(kg)	320	320	320			Corresponding specification of additionally installed elevator/home elevator: 0.63m/s and 1m/s, 630kg and below; other passenger elevators are applicable for all specifications.
	450	450	450			
	550	550	550			
	630		630	630	630	
			825	825	825	
			1050	1050	1050	
Max Num. Stops	7	11	18	28	28	
Range of standard travel rise (m) *	3.4~30	3.4~30	3.4~55	7.3~80	7.3~80	
Operation Mode	1C~2BC, 2C-SM21, 2~4C-ITS-21					Optional when the group control method is 2C~4C~ ITS-21
Control Mode	VFJ-L					
Roping	2：1					
Traction Machine	PM synchronous traction machine					
Support mode of the traction machine	supported by guiderails					
Machine room	top of hoistway (machine-room-less)					
Door Opening Mode	Center opening					
	Two panel sliding					
Door drive mode	VVVF (PM door operator)					
Door Opening Type	1D1G					
	1D2G/2D2G					
Dynamic Power	380V 50Hz 3 phases, 5 lines					
Lighting Power	220V 50Hz Single-phase					
CWT Position	Side					
CWT Safety Gear	Not provided, Provided					
Min. Landing Height (mm)	2800					Concrete nosing will be provided by the customer; HH=2100, HL=2200
	2600					Steel nosing will be provided by the Seller. HH=2100, HL=2200
Landing Display Range (Standard)	-5~48, 1B, 2B, 3B, 4B, 5B, A, B, B1, B2, B3, B4, B5, B6, C, D, E, G, G1, G2, G3, GF, H, K, L, L1, L2, L3、LB, LG, M, M1, M2, M3, M4, M5, M6, MB, P, P0, P1, P2, P3, P4, P5, PB, PH, PL, PP, R, R1, R2, R3, S, S1, S2, S3, S4, S5, T, UB, UG					1. When wall-mounted hall position indicator (ZPIx-GB10 /ZPIx-GB20) is used, D, K and T floors cannot be displayed. 2. When segment LCD is used, three-digit floor name cannot be displayed (e.g. 12.1, 12.2, 22.1, 22.2, 13F). 3. The display range of hall position indicator of one car can only be included in Table A or Table B; if it is in both Table A and Table B at the same time (some in Table A and some in Table B), technical-confirmation is required.
Landing Display Range (Non-standard: out of the above scope)	-5~48, 1B, 2B, 3B, 4B, 5B, A, B, B1, B2, B3, B4, B5, B6, C, D, E, G, G1, G2, G3, GF, H, K, L, L1, L2, L3, LB, LG, M, M1, M2, M3, M4, M5, M6, MB, P, P0, P1, P2, 15A, 12.1, 12.2, 22.1, 22.2, 2A, 19A, 1A, 13F, 3F, F1, F2, 22A, RC, 4A, 15B, 13B, F, D1, D2, 1M, 2M, 3M, 3A, 5A, 12A, 12B, 13A, 23A, 16A, 16B, 17A					

Note：*If it exceeds the specifications listed in the sample, please contact Shanghai Mitsubishi Elevator Co., Ltd., and the details are subject to the contract signed by both parties.

SMEC Layout
Scan the QR code to find more

LEHY-MRL-II civil engineering dimensions:
Scan the QR code to perform the following:
Search elevator > Search hoistway by elevator type
> Machine-room > Select "LEHY-MRL-II" for elevator type