

Skyrise™

OTIS



THE WAY TO GREEN™



Over the past  
100 years,  
Otis has provided  
elevators to  
eight of the ten  
**World's Tallest  
Buildings.**

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S K Y R I S E™

## Rising to meet the **highest of challenges**

Skyrise is Otis' premiere high-speed elevator system, designed and engineered for the world's most prestigious skyscrapers and high-rise residential and commercial buildings.

Our high-rise expertise is rooted in innovation and experience. From concept to completion, let us create customized solutions to meet the unique needs of your project.

Type of Deck	Duty Range	Speed Range	Max. Stops	Rise
Single Deck	900–4500kg	2–10m/s	140	500m
Double-Deck	1150/1150–2250/2250kg	4–10m/s	140	400m
Super Double-Deck	1350/1350–1800/1800kg	4–10m/s	140	300m



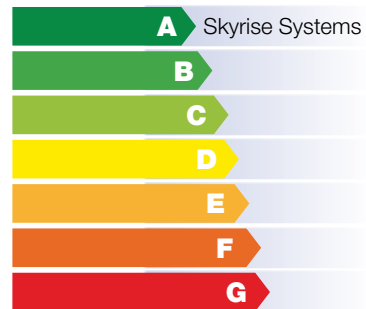
*Shanghai World Financial Center;  
Shanghai, China  
Completed 2008; 492 meters  
30 elevators (16 super double-deck); 34 escalators*

## Pioneering technology to give you greater efficiency

### Total energy savings of up to 50%

Permanent magnet synchronous machines use up to 50% less energy.\* LED lighting with standby mode is up to 80% more energy efficient than conventional fluorescent lamps.

The energy-efficiency of Skyrise systems have been validated based on standards set by Verein Deutscher Ingenieure (VDI). Skyrise systems achieved an overall "A" energy-efficiency class rating.

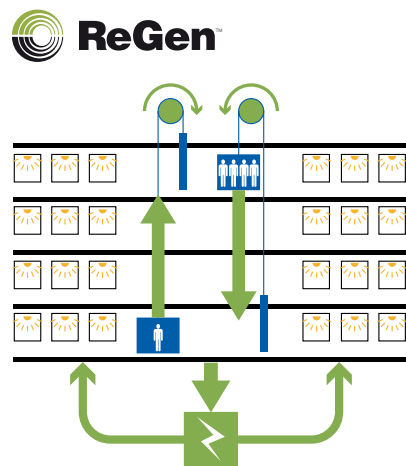


\*Compared to traditional direct current machines

### Capturing energy that's normally lost

ReGen™ drives deliver substantial energy savings while helping to meet or exceed worldwide standards.

ReGen drives capture energy that's usually lost and feed it back into the building's internal electrical grid so it can be reused by other building systems.

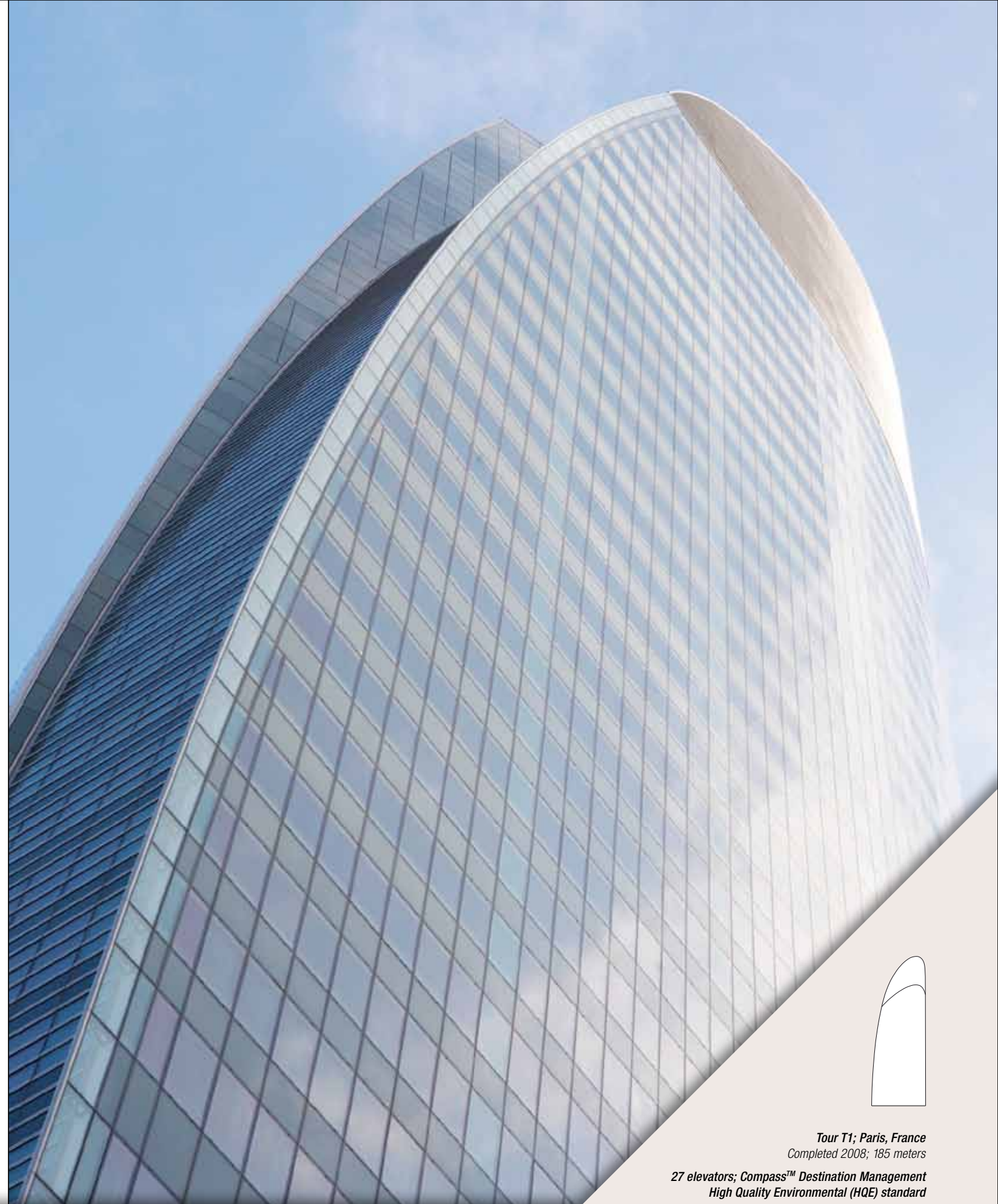


### Smaller machine rooms

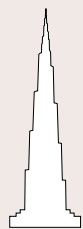
Skyrise systems require a smaller hoistway, freeing up valuable core space inside your building. Permanent magnet synchronous machines are 40% smaller,\* and when paired with Otis' drive technology and control system, which are 50% smaller than traditional high-rise control systems, they enable a smaller machine room.



Permanent magnet synchronous machine



Tour T1; Paris, France  
Completed 2008; 185 meters  
27 elevators; Compass™ Destination Management  
High Quality Environmental (HQE) standard



**Burj Khalifa; Dubai, United Arab Emirates**  
Completed 2010; 828 meters

57 elevators (2 double-deck); 8 escalators;  
Compass™ Destination Management

World's Tallest Building  
World's Fastest Double-Deck Elevators (10m/s)

## S P E E D   A N D   C O M F O R T

# Taking passenger experience to a higher level

### Compass™ Destination Management for a faster and more direct route

When combined with Otis' Compass Destination Management system, Skyrise transports passengers to their destinations up to 55 percent faster. Passengers simply enter their destination floor to receive an elevator assignment for the fastest, most direct and least crowded route to their destination.



### Reduced noise and vibration for a smooth ride

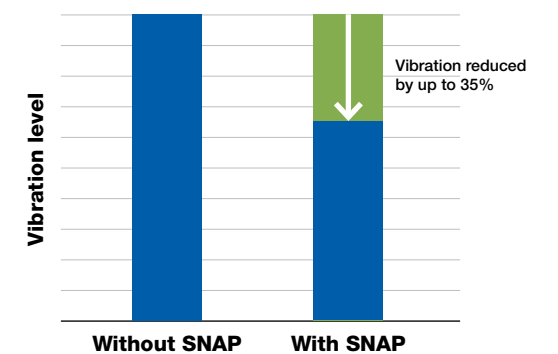
Thanks to aerodynamic car and cab design and ULTRA roller guides, passengers can enjoy a comfortable ride with minimal noise and vibration.



### Increased passenger comfort

Skyrise features Otis' most innovative technology, such as advanced SNAP motion control. Using this technology, Otis is able to manage the finest degree of motion control to reduce vibration and ensure smoother starts and stops at the beginning and end of each elevator ride.

**Car vibration**  
SNAP motion control increases passenger comfort by reducing car vibration by up to 35% at the start and end of each elevator run.



## Raising the bar in safety standards

### **World-class testing facilities**

Otis' products are globally engineered and rigorously tested at state of the art engineering and test facilities located in the United States, Japan, Germany, Korea and China.

We operate one of the world's tallest elevator test towers in Shibayama, Japan. This test tower stands 505 feet (154 meters) above ground and 89 feet (27 meters) below ground.

The Bristol Research Center in Bristol, Conn., United States, is home to the Otis Quality Assurance Center and North America's tallest elevator test tower—383 feet (117 meters) high.

### **Constant monitoring for constant peace of mind**

A controller monitors the elevator system's safety circuits, performance and operational setting hundreds of times per second. This electronic fault monitoring results in accurate fault detection and precise diagnostic information that our mechanics can use to quickly pinpoint and resolve an issue.

### **The right maintenance at the right time**

The right maintenance at the right time extends the life of the elevator. Otis offers a variety of maintenance programs and building support systems to fit customers' needs and equipment types. We have standardized work practices around the world and can tailor a maintenance program specifically to the environment.



*Lotte World Tower; Seoul, South Korea  
Will be completed in 2015; 555 meters*

*30 elevators (2 double-deck); 16 escalators  
Will be the World's Second Tallest Building when completed*



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## PROJECT MANAGEMENT AND INSTALLATION

### Reaching new heights with great service

#### Dedicated teams for the most demanding challenges

Successful high-rise projects require a specialized project team to anticipate the difficulties and complexities that will arise during construction. Our project teams will partner with you through each challenge and develop innovative solutions to meet the unique needs of your project.

Otis has leveraged its extensive high-rise experience to develop a world-class training program: Otis' Major Project Management University. We train and develop talented project managers around the world who bring a wealth of knowledge and experience to each project and are committed to your success.

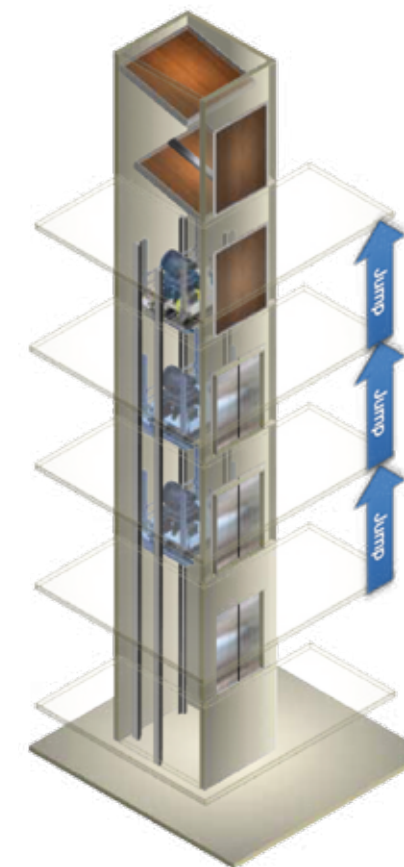
#### Refined processes for a more efficient installation

To ensure the best results for your building, Otis employees use the safest, most efficient installation techniques, such as scaffold-less installation, traditional jump lifts and self-climbing jump lifts.

In fact, Otis developed the self-climbing jump lift, an efficient installation technique, which optimizes safety, delivery time and logistics.

#### Benefits of the Self-climbing Jump Lift

- Can be installed early in the construction process, after the first few floors are complete
- Uses a hydraulic push-and-pull system so cranes are not required
- Reduces interruption to other building contractors
- Accelerates job site logistics with each floor jump, requiring only four hours to complete
- Safer than conventional methods such as cranes or construction hoists



Self-climbing Jump Lift

Otis' experienced project teams proudly develop customized solutions to meet the unique challenges of each high-rise project.

M O V I N G F O R W A R D . . .

## Join Otis on our journey to **The Way to Green**

The Way to Green is about our commitment to continually moving our company and our customers forward.

Skyrise and its energy-efficient features can help your building achieve Leadership in Energy and Environmental Design (LEED) and Building Research Establishment Environmental Assessment Method (BREEAM) certification.

We recognize that The Way to Green is an ongoing effort. But with the commitment of our people and our resources around the world, we know we can move our company, our suppliers and our customers closer to a shared goal of using greener products, services and solutions.

# OTIS



*Otis invites you to join us on this continuous journey on The Way to Green.*



THE WAY TO GREEN™



W H O E L S E B U T O T I S . . .



**Otis**

A United Technologies Company

**Otis Elevator Company** is the world's largest manufacturer and maintainer of people-moving products including elevators, escalators and moving walkways.

With headquarters in Farmington, Connecticut, Otis employs 60,000 people globally, offers products and services in more than 200 countries and territories and maintains over 1.8 million elevators and escalators worldwide.

United Technologies Corp., based in Hartford, Connecticut, is a diversified company providing high technology products and services to the building and aerospace industries.