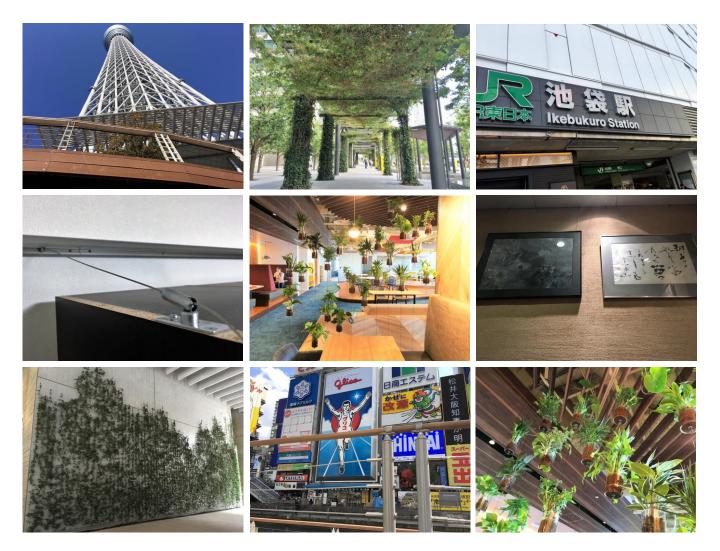
# GENERAL CATALOG



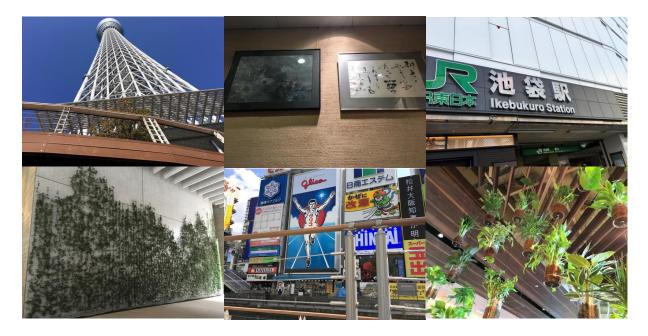
# ULTIMA

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### **About Us**



### Creating products useful to the world by pursuing originality

By introducing one-of-a-kind products created with original ideas and technologies to the market, we differentiate our products from others and increase our competitiveness.

We believe that this attitude is the raison d'etre of Ultima.

### **Company Profile**

Name	ULTIMA Co., Ltd.
Name of president	Takayuki Aoshika
Head Office	2F、Yutaka building、3-4-8、Narihira、Sumida-ku、Tokyo、130-0002、JAPAN
Business Line	Manufacturing and sales of cable fixtures, picture rail, balustrade, greening wire rope for green wall and anti-bird wire
Capital	14 million yen
Date of establishment	1986

# Our Story

### 1980 $\sim$

1986	Company established. The generic name for wire adjustment fittings is changed to "U-Grip".	
1988	Released "Picture hanger Safety Hook Series "	
1989	Jointly applied for patent for equipment system using U-grip with Kajima Corporation.	

### 1990 $\sim$

1990	Negros Electric Works, Ltd. launches "U-Grip" of the above product system as "Line Lock".				
1550	regios electric works, etd. idurenes of onp of the above product system as ence book.				
1992	"U-Grip" was adopted by Shimano Corporation (a bicycle parts manufacturer) for shift lever testing.				
	Released furniture Fall Prevention "Earthquake Resistant Rail System" .				
1995	"Earthquake Resistant Rail System" is adopted in the catalogs of Lion Office Equipment Co. and other office equipment				
	manufacturers.				

### $2000 \sim$

2000	Released "WIRE TENDO", wire system for handrail			
2003	Released "Ultima Turnbuckle", a dedicated anti-sway bracket			
	Our products are listed in the catalog with Sugita Ace Co., Ltd.			
2004	Released "Spiral Wire Rope" for green wall			
	Received "The 1st Monozukuri Enterprise Award 2005" from Sumida-ku, Tokyo.			
2005	Released "Ultima Anti-bird Wire System"			
2006	Renewal of "Earthquake Resistant Rail System" as "Interior Anchor".			
	Released "Ultima anti-throwing wire system"			
2007	Jointly developed and jointly applied for a patent with JR East Consultants Co., Ltd.			
2008	Renewal release of "Ultima (U-grip) anti-bird wire system"			
2009	Awarded as one of the "300 Vigorous Manufacturing SMEs (Ministry of Economy, Trade and Industry)" in 2009.			

 $2010 \sim$ 

2011	Released "Ultima Greening Rail System"
2012	Jointly developed with GREEVAL Corporation (patent pending), "Leaflax" was presented at the 3rd Eco-Office & Eco-Factory EXPO.
2014	Selected for the "Leading Urban Environment Formation Promotion Project Plan for FY 2013" (Ministry of Land, Infrastructure, Transport and Tourism) "Project name: Technological development of vine-plant binding materials for wall greening"
2015	Released "Ultima Grune Fenster (Greening)"
2016	Renewal of "Ultima Greening Rail System" as "Ultima Wall Greening System" Released "Ultima anti-bird wire system", UBWM series for 0.8mm dia. Released "Ultima Grune Fenster (Display)"
2017	Released "Ultima anti-bird wire system", UBS-P series of posts for round pipes Released "Ultima Grune Fenster (Home)" Released "Ultima Grune Fenster (Partation)" Awarded Indoor Greening Contest 2017 "Japan Hanging Basket Association President's Award".
2019	System integration of "Ultima Green Line" into "Ultima Wall Greening System" Released "Ultima anti-bird wire system", black bird wire set UBW-B, UBWM-B series and black post UBS-T0 B "ULTIMA Wall Greening System", new lineup of "Spiral Wire Rope Set" for wall greening

### $2020 \sim$

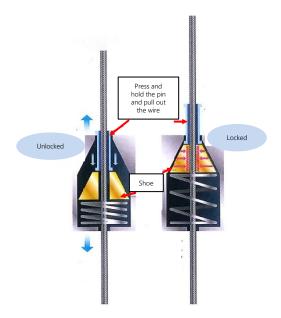
2020	"Ultima anti-throwing wire system" installed at a JR station free passageway and at the south exit bridge of a JR station.
2020	"Spiral Wire Rope Set", approx. 9,000 wires used in a large commercial facility [Ariake Garden].
2021	Released "Ultima anti-bird wire system", screw-mounting post "UBS-T0 D" for double rows of posts.
	Released "Ultima Anti-Sway Wire System"
2022	"ULTIMA Online Shop" opened

### Shoe type grip

ULTIMA grip: Shoe type grip

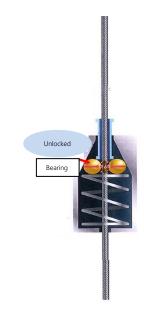
The original strength of the wire is maintained.

The shoe-type grip is a proprietary technology of Ultima.



Shoe type grips (surface fixation) distribute the load by clamping the

wire between two surfaces, thereby reducing the load on the wire.



Other grip: Bearing type grip

Bearing type grips (point fixation) have less braking force because the force is concentrated at a single point, and the wire is easily damaged. The wire is easily damaged.

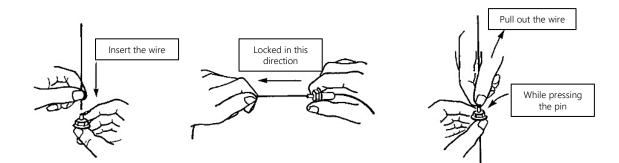
Safety	0	<ul><li>High strength and high safety ratio</li><li>Utilized in industrial products</li></ul>		Often utilized in display and interior design
Strength	0	Surface contact <u>Strong grip, especially resistant to vibration *1</u>	×	<ul><li>Point contact</li><li>Grip strength is low. Weak against shock and vibration *2</li></ul>
Release	×	<ul> <li>Grip force is strong.</li> <li>Difficult to release by hand (finger) *3</li> </ul>	0	<ul><li>Grip force is low</li><li>Easy to release by hand (finger)</li></ul>
Burden on wire	0	<ul> <li>Surface fixation</li> <li>Less burden due to distributed load</li> <li>Less damage and indentation such as strand breakage and waviness</li> </ul>	×	<ul> <li>Point fixation</li> <li>Load is concentrated, so there is a heavy burden.</li> <li>Damage and indentation such as strand breakage and waviness are inevitable.</li> <li>Wire maintenance is necessary</li> </ul>
Production	0	<ul> <li>Original design, not an off-the-shelf product</li> <li>Other companies cannot easily manufacture (difficult to manufacture equivalent products)</li> </ul>	×	<ul><li>Uses off-the-shelf bearings</li><li>Easy to manufacture</li></ul>

\*1 : 90% to 100% of JIS standard wire breaking load of 170kg based on SUS304 $\phi$ 1.5mm (7\*7) wire test values.

\*2: 50-70% of 170kg of JIS standard wire breaking load based on SUS304q1.5mm (7\*7) wire test value.

\*3 : Hybrid mechanism (pat.p) is also available to solve the disadvantage of difficulty in releasing the gripping force.

### **Basic grip operation**



### Features

Grips used for "length adjustment" and "position fixation" of wires are broadly classified into two types in terms of mechanism: surface fixation and point fixation.

The surface fixation is called a shoe-type grip and was developed by our company and is used in the mechanisms of our products.

On the other hand, point fixation is a bearing type grip that incorporates a ready-made bearing, which has already been commercialized by several companies.

Both types of fixation have their advantages and disadvantages (see figure below), and the wire grip market has been divided between surface fixation and point fixation, depending on the application and features.

Since the establishment of the wire grips used in our products, we have been offering grips that meet the needs of the industry.

The gripping force and impact resistance of each grip have been highly evaluated, and they continue to be used in a wide range of fields, such as wire inspection fixtures in industrial equipment, the construction equipment industry, and furniture fall prevention fittings.

### **Products**

Anti-Sway and Wire Hanging Fixtures



Ultima Anti-sway Wire System
<a href="https://www.system.com">timesustem.com</a>
</a>
\* including ULTIMA Turnbuckle



Wire adjustment hanging bracket ULTIMA Line Grip

### Furniture tip-over prevention and picture hanger



Wire -type fall prevention system Interior Anchor



Picture hanger Safety Hook Series

Anti-bird



ULTIMA Anti-bird Wire System

### Balustrade







ULTIMA Anti-throwing Wire System

### Outdoor Greening



ULTIMA Green Wall Wire Rope

### □ Indoor Greening



# [ULTIMA Anti-Sway Wire System]



- More than 1 million units have been shipped as anti-sway wire for lighting, air conditioning, and other equipment.
- Because of the ease of attaching and detaching wires and adjusting wire positions, they are used in a variety of fields as industrial machinery parts and construction parts.
- They have earned a reputation for their unparalleled ease of use, especially for their strong fixation, high strength, and easy-tointegrate shape.

Wire	φ1.5、φ3.0
Allowable load value	Within 55 kg to 170 kg * Allowable load values vary depending on the wire diameter * Allowable load values are based on a safety factor of approximately 1/3 of the maximum static load value.
Main applications	Fixing of equipment, slide stopper, etc.
Main customers	Electrical equipment and materials companies, lighting equipment companies, and many others





Grip (wire anchor)

# 【ULTIMA Turnbuckle】 \*1



<u>\*1 Ultima Turnbuckle has been integrated into the Ultima Anti-Sway Wire System.</u>

- The turnbuckle and connecting wire grip are integrated into a single unit, giving a slim, clean look to the space.
- The one-touch locking function allows the wire grip to be attached and detached with a pin operation, greatly reducing installation work.

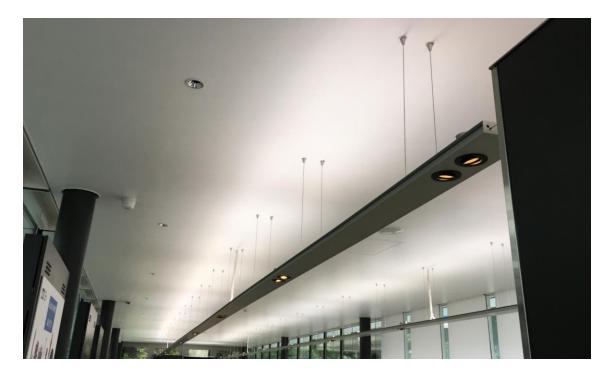
Wire	φ3.0
Allowable load value	Within 65 kg to 100 kg * Allowable load values are based on a safety factor of approximately 1/3 of the maximum static load value.
Main applications	Stop swinging signs at public facilities, etc.
Main customers	Train stations, public facilities, commercial facilities, pergolas, and many others





Vibration stopper in station

### Wire adjustment hanging bracket **[ULTIMA Line Grip]**



- It is designed not only to handle heavy objects, but also to absorb real-life usage conditions such as "shock" and "shaking" within a greater safety factor.
- Because of the ease of attaching and detaching wires and adjusting wire positions, they are used in a variety of fields as industrial machinery parts and construction parts.
- They have earned a reputation for their unparalleled ease of use, especially for their strong fixation, high strength, and easy-to-integrate shape.

Wire	φ1.2, φ1.5
Allowable load value	Within 600 g to 150 kg * Allowable load values vary depending on the wire diameter * Allowable load values are based on a safety factor of approximately 1/3 of the maximum static load value.
Main applications	Hanging lighting, fixing equipment, store staging, inspection fixtures, etc.
Main customers	Banks, hotels, airports, stations, hospitals, universities, electrical equipment and materials companies, lighting equipment companies, and many others

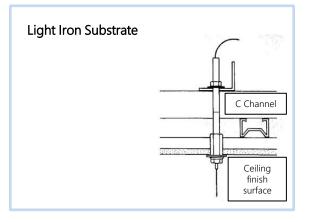


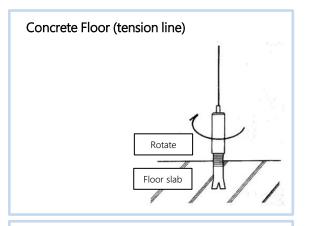


Hanging decoration

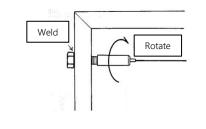
Hanging lighting

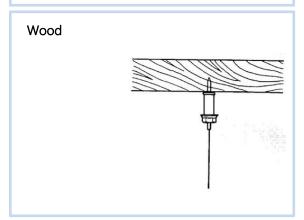
### Main applications

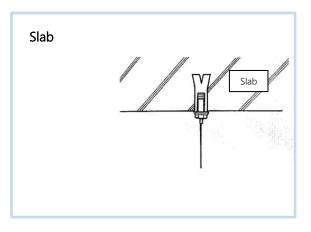


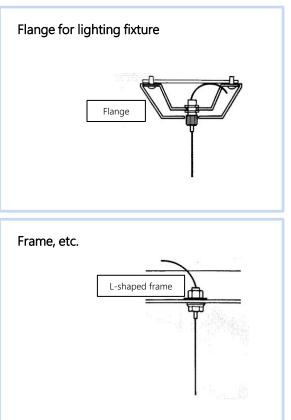


Horizontal tension (tension line)









In addition to the examples above, other commercially available products such as eye nuts, hexagon socket set screws, T nuts, etc. can be used.

Grips can be used within the allowable load, but if the strength of the fixing method is low, the strength is defined by that strength. Please note the following

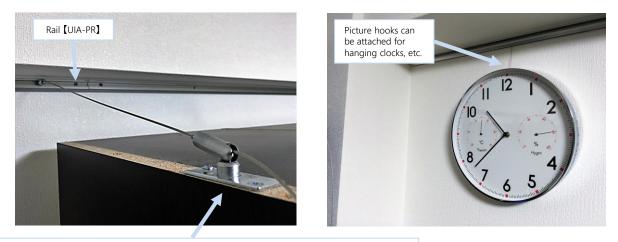
### Wire type fall prevention system [Interior Anchor]



- The industry's first combined type of [furniture fall prevention] and [picture rail]
- This is an unprecedented furniture fall prevention rail system for homes and offices that places the highest priority on interior design that blends in with any space, and is thoroughly focused on performance, design, and functionality.
- It can be used as a picture rail even if it is not used as a furniture fall prevention system.
- The picture rail is attached to the wall where the furniture is to be fixed, and the furniture is fixed with wires, so there is no need to worry about the position of the furniture and the wall base.
- The length of the wire can be adjusted to accommodate the depth of the furniture, and the furniture can be moved to the left or right on the rail.

Wire	Φ1.5
Rail color	Silver or bronze
Allowable load value	50 kg max * The value of the rail on the wall side. * Allowable load values are based on a safety factor of approximately 1/3 of the maximum static load value.
Main applications	Auxiliary support material to prevent general household furniture, office fixtures, office automation equipment, etc. from falling, dropping, or running out of control.
Main customers	Companies, universities, banks, public facilities, general households, and many others

### **Features**



Please select stoppers and fittings according to the furniture, fixtures, and OA equipment to be fixed.

- Attachments on the rail slide freely to the left and right for easy movement adjustment.
- Depth adjustment of furniture can be easily made by adjusting the length of the wire.
- No positioning is required during installation, and layout changes can be easily made.
- Can be fixed to all types of walls, including concrete and wood construction.
- The entire wall is designed to support large shakes, thus maintaining a high level of strength.
- Furniture can be totally secured with anti-tip rails and furniture stoppers attached to the wall.
- The rail can also be used as a picture rail for hanging paintings, clocks, etc.
- The compact design with no waste blends in with the living room without any sense of incongruity.
- Depth adjustment of furniture is easy with the wire length adjustment function (with adjustment grips). Furniture can be moved freely and easily by simply sliding the fixing bracket on the rail to the left or right.
- The one-touch locking and adjusting function allows for easy mounting and dismounting, and can be freely adapted to changes in furniture layout.
- The rail is available in two colors, silver and bronze. You can choose the color that best matches the atmosphere of your living room. The "Bronze" rail is available in two colors: Silver and Bronze.
- Compared to L-shaped brackets, where screws are limited to certain positions, rails secured with multiple screws can be used to fix furniture in any position.

### Picture hanger [Safety Hook Series]



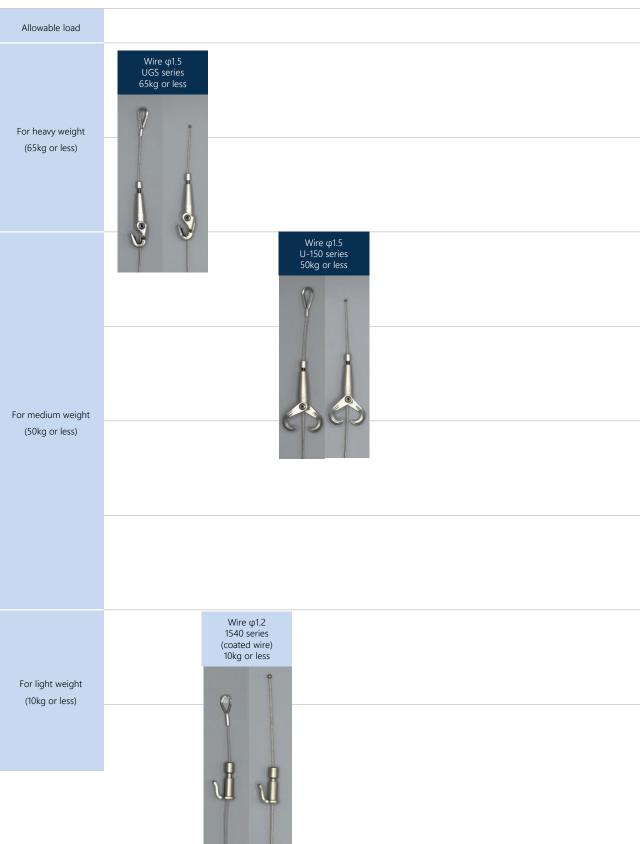
- With its compact mechanism and high strength, it is applied in fields where safety is required, such as picture hangers.
- Simple one-touch position adjustment for hanging paintings, frames, and panels.
- One-touch locking and adjusting function.
- Locked by simply inserting the wire and unlocked by operating the pin, taking advantage of its impact-resistant structure.
- Easy to operate for smooth level movement.

Wire	φ1.2, φ1.5
Allowable load value	Within 5 kg to 65 kg * Allowable load values vary depending on the wire diameter * Allowable load values are based on a safety factor of approximately 1/3 of the maximum static load value.
Main applications	Special fittings for hanging art works such as paintings, frames, panels, etc.
Main customers	Art galleries, museums, libraries, art galleries, public facilities, DIY, and many others





### **Product List**



# [ULTIMA Anti-Bird Wire System]



- Easy wire rope installation
  - ✓ Hook the spring hook in the rod、 insert the wire rope through the pin into the gripper、 and hook the spring hook with the gripper in the other rod.
  - ✓ Press and hold the pin and pull out the wire rope.
- Rod are common at the ends and in the middle sections.
- · Coated wire rope prevents dirt and dust.
- Rod can be used in two stages.
- Simple design.
- Easy installation by simply tightening screws for ULTIMA stainless-steel clamp rod and ULTIMA stainless-steel pipe rod.

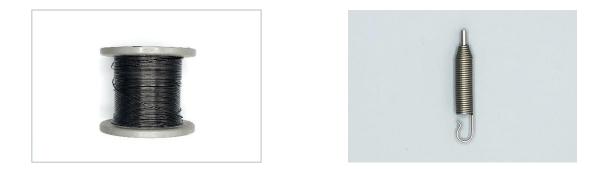
### The gripper is a rust-resistant material but may rust in some locations and environments. However, rust does not affect wire locks.

Wire	φ0.80、φ1.2
Main applications	Prevent birds from entering and bottoming out by installing on rooftops, balcony railings, fences, eaves, beams, etc. of buildings such as residences, bus stops, commercial facilities, schools, and station buildings
Main customers	Station building, companies, schools, public facilities, general households, and many others

### **Installation Effects**



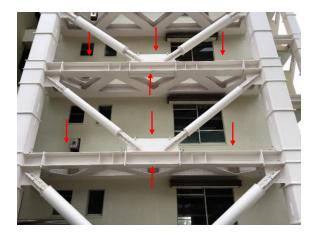
### **ULTIMA Anti-Bird Wire**



### Anti-bird wire roll + spring grip features

- □ Installed in the right combination for the site, so there is little possibility of material shortages.
- □ No variation in wire rope tension no matter who installs the wire rope
- Easiest wire rope installation in the world

# Case Study









Station (ULTIMA stainless-steel clamp rod)



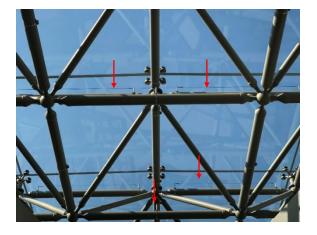


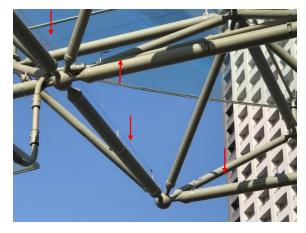
Housing





Station





Station





Station

# Balustrade [Wire Tend (N)]



- A wire system for handrail with a beautiful form that beautifully separates space and integrates with the landscape
- Unique technology for greater strength and ease of installation
- Safe design with no deflection after installation
- Quick installation and shortened construction period
- Installation time is drastically reduced because the wire is manufactured according to the size of the space between the posts.
- No need for on-site length adjustment or processing
- Threading type, but can be installed by one person.

Wire	Threaded type: φ6			
Strength test	Roughly 80% of JIS standard value (wire breaking load = 25.2KN) * Close to the original strength of the wire.			
Main applications	For fall prevention handrails (terraces, slopes, stairs, etc.) For safety fences and railings (around parks, green areas, various facilities, etc.) For protective fences (along seashores, etc.) For fall prevention fences (openings in facilities, etc.)			
Main customers Commercial facilities, parks, stations, seaside parks, hospitals, museums, universities, high schools, vocational sch private residences, condominiums, and many others				

# Case Study



Tokyo Sky Tree



Yokohama Minato Mirai



Yokohama Portside



Yokohama Red Brick Warehouse

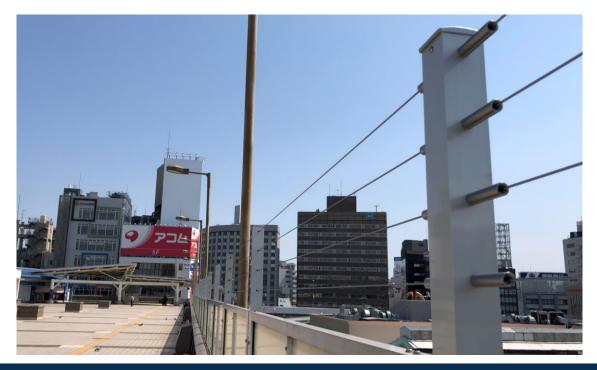


Station



Osaka Dotonbori

# [ULTIMA Anti-throwing Wire System]

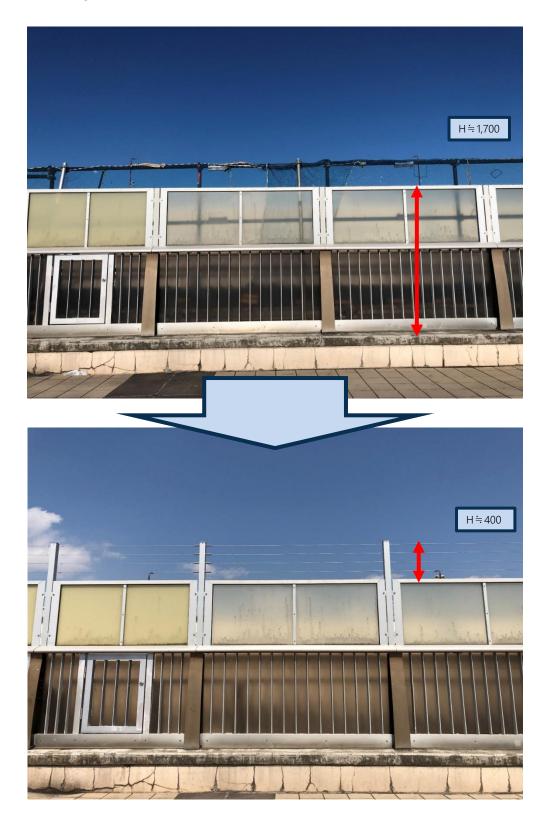


Compared to conventional wire mesh and fence construction: ····

- Does not obstruct airflow or visibility
- □ Blends in with the landscape and is in harmony with the aesthetics of the surrounding area.
- Gives a sense of openness and reduces the feeling of enclosure
- □ Significantly reduces the cost of materials and labor.
- Can be manufactured freely according to the installation span. Can be designed for any mounting pitch.
- Grips on both ends allow wire tension adjustment for easy and secure installation.

Mai	n applications	Prevention of projectiles from overpasses crossing free passageways and motorways inside and outside stations Prevention of projection through openings in buildings such as connecting corridors, atriums, and stairwells in commercial facilities Preventing children from falling from balconies of houses, etc.
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# Case Study



The existing railings were raised and wires were attached to the posts. The wire does not spoil the landscape and functions as an anti-dropping device.

## [ULTIMA Green Wall Wire Rope]



### Specialized greening wire rope produced for green wall

# Spiral wire rope features Plants entwine in spirals of coated resin coating Helps plants to propagate naturally Prevents plants from drooping due to wind. Reduces heat burn of plants due to sunlight Easy installation by attaching the spring hooks of the wire rope ends directly to each support material. Reduction of construction manpower and time Excellent building appearance due to the symmetry of the spring shape at both ends.

### Spiral Wire Rope Roll + Spring grip



Spiral Wire Rope Roll



Spring with grip for Spiral wire rope

### Spiral wire rope roll + spring grip features

□ Installed in the right combination for the site, so there is little possibility of material shortages.

□ No variation in wire rope tension no matter who installs the wire rope

Easiest wire rope installation in the world

\* Spiral Wire Rope Roll and spring grip are sold as a set, and the spring grip is not sold separately.

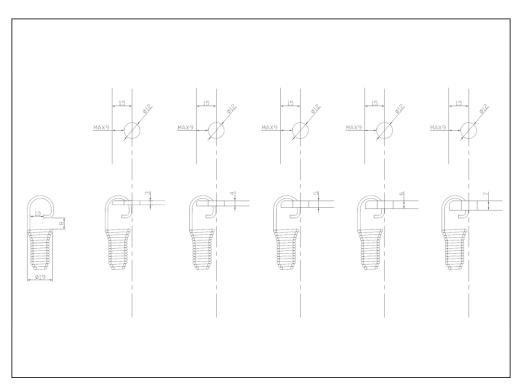
We cannot be held responsible for any problems that may occur if the spring grips are used for purposes other than spiral wire rope or green wall wire.

\* Example: If the dimension between angles is 3,000mm, the wire cut dimension is 3,200mm

\* Spiral wire rope roll : maximum length per wire should be 8,000mm.

For wire lengths longer than 5,000mm, we recommend installing L Angle (middle) or spacer eyebolt (middle) of the wire to prevent it from swaying.

### Important : L Angle drilling dimensions and drilling positions



### **Product Specification**





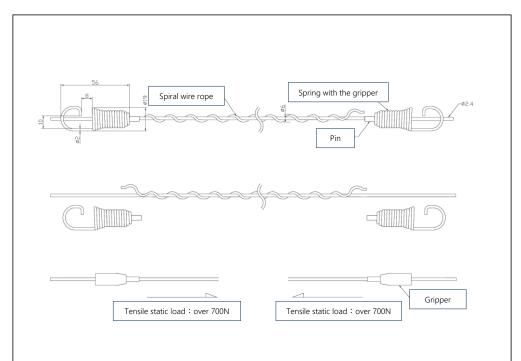
	Spiral Wire Rope Roll (SWR-100)	Spring with grip for Spiral wire rope
Material	stainless 304 (7×7, 12 Nylon resin coating)	Metal : stainless、Grip : brass
Wire length	100m roll	-
Weight	25g/m	35g/set
Note	Wire rope size:φ6 (core wire:φ2.4) 50 spring grip / 100m roll	spring hook with gripper 50 spring grip / 100m roll

\* Example: If the dimension between angles is 3,000mm, the wire cut dimension is 3,200mm

\* Spiral wire rope roll : maximum length per wire should be 8,000mm.

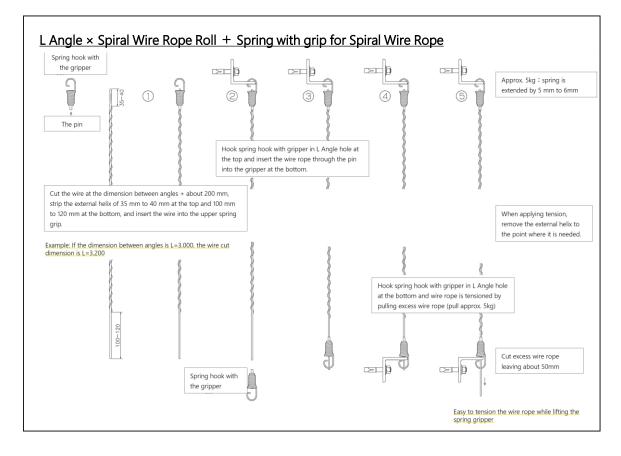
For wire lengths longer than 5,000mm, we recommend installing L Angle (middle) or spacer eyebolt (middle) of the wire to prevent it from swaying.

### Drawing

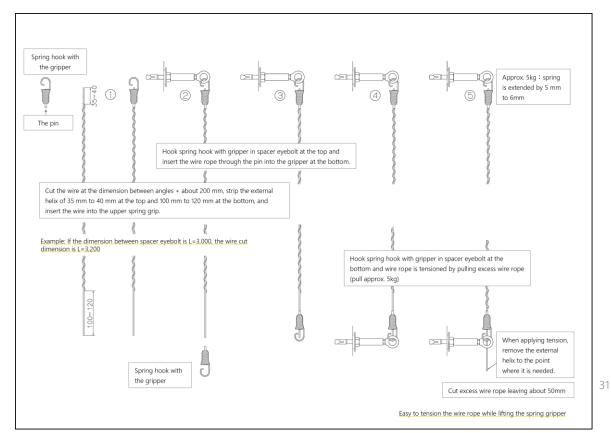


### Work Instruction





### Spacer eyebolt × Spiral Wire Rope Roll + Spring with grip for Spiral Wire Rope



### DIY kit (spiral wire rope set + spacer eyebolt)



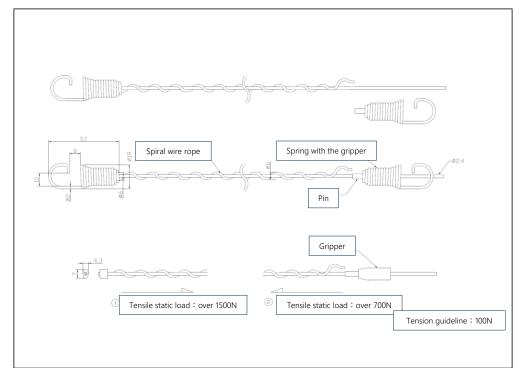
Spiral wire rope set



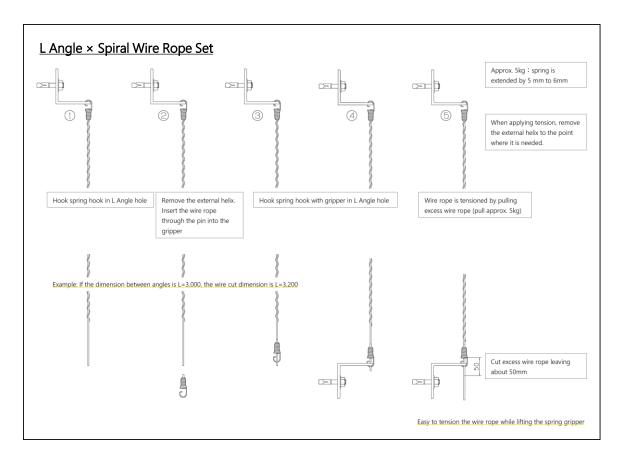
Spacer with eyebolt

	SWS-10	SWS-30	SWS-50	SWS-70	SWS-90	Spacer with eyebolt
Wire length	L=1,000	L=3,000	L=5,000	L=7,000	L=9,000	-
Material	Wire rope : SUS 304 (7×7、12 Nylon resin coating)、Metal : SUS、Grip : brass				Material : SUC204, brace, Finishing touches : nickel plating	
Weight	Both end fittings: 35g/set、Wire: 25g/m				Material : SUS304, brass, Finishing touches : nickel plating	
Included	Spring hook and spring hook with gripper				Eyebolt : M6, Inch method : pillar part L=50mm, Anchor	
Note	Wire rope size:φ6 (core wire:φ2.4)				used : M10 (female thread effective dimension 15mm), two spacer with eyebolt are required per wire (both ends)	
DIY kit_1	1	-	-	-	-	2
DIY kit_2	-	1	-	-	-	2
DIY kit_3	-	-	1	-	-	2
DIY kit_4	-	-	-	1	-	3
DIY kit_5	-	_	-	-	1	3

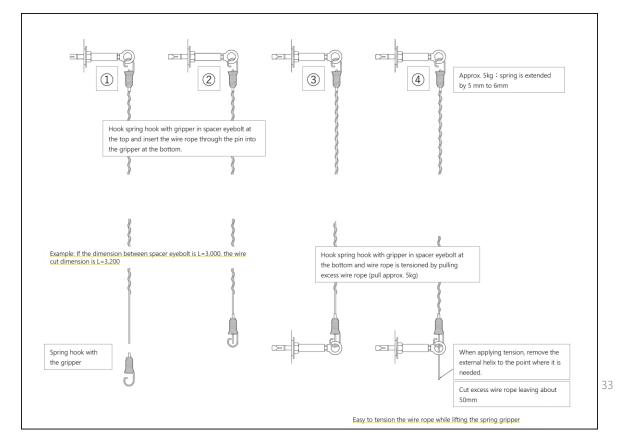
\* For wire lengths longer than 5,000mm, we recommend installing eyebolts in the middle of the wire to prevent it from swaying.



### Work Instruction : DIY kit



### Spacer eyebolt × Spiral Wire Rope Set

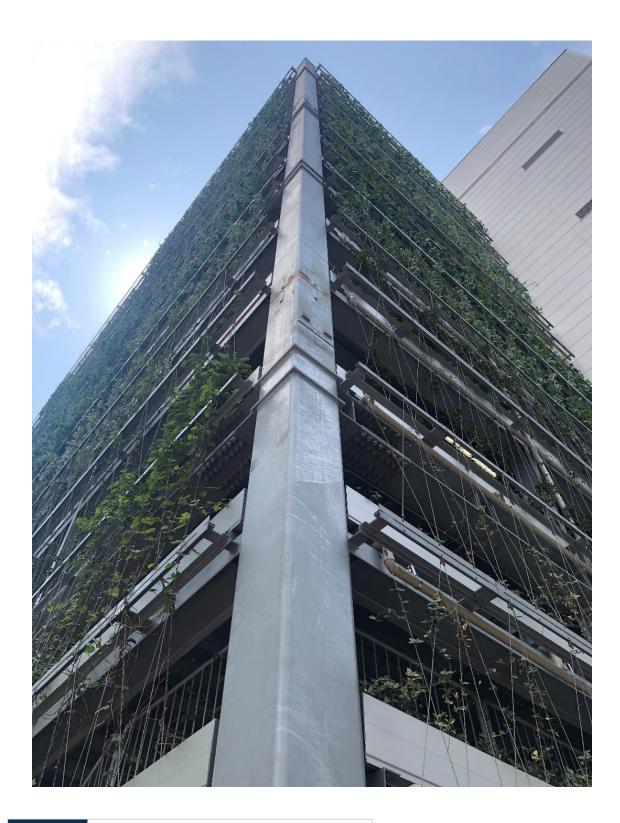


# Case Study



 Location
 Ariake Garden (Tokyo, shopping mall)

 Specification
 Spiral Wire Rope Set (about 9,000 used) × L Angle



Location	Ariake Garden (Tokyo、shopping mall)
Specification	Spiral Wire Rope Set (about 9,000 used) $\times$ L Angle

# [ULTIMA Grune Fenster (Green)]



- Can be used for greening and display anywhere in the indoor space as long as the top and bottom ends can be screwed in place.
- Low-cost proposal is possible due to the small number of components used.
- The wire is removable, so it can be easily replaced when plants die or are replaced.
- By using "Spiral Wire Rope Set," a wire specially designed for greening, plants can be easily entangled with the wire and enjoy growth.
- The wire can be freely adjusted in position, so it is possible to increase or decrease the number of plants.





# [ULTIMA Grune Fenster (Display)]



- Can be used for greening and display anywhere in the indoor space as long as the top and bottom ends can be screwed in place.
- Low-cost proposal is possible due to the small number of components used.
- The wire is removable, so exhibits can be easily replaced.
- Wires can be freely repositioned to increase or decrease the number of exhibits.





