

SUNON®

Natural,  
Comfort Experience

**SUNON®**

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BLDC  
**HVLS Fan**

\*All products are RoHS compliant.



# Powerful HVLS Fan

## Powerful HVLS Fan

SUNON's Powerful HVLS Fan series of commercial ceiling fans are different from the typical large-scale industrial ceiling fans which are rough and noisy. Taking a totally different approach, SUNON's ceiling fan introduces the design inspiration of the oriental Zen style, which injects the aesthetics of Zen style in pursuit of inner tranquility, bringing peace and calm into the core spirit of the product design; therefore, the making of the Powerful HVLS Fan ceiling fan series has a simple and elegant appearance. The fan can generate a huge air volume from the inside out with a light operation, where the wind power is even, stable and quiet. The large amount of airflow from the slow-moving fans that gives a comfortable visual impact, can ensure sufficient natural air convection in a large space, so that every user can feel the pleasantly cool yet gentle and comfortable wind.

The in-depth connotation, tranquility, peace, and the simple thinking of Zen style are fully injected into the product design. Without redundant decoration, the ceiling fan product with the aesthetics of humanity full of oriental elegance is constructed. Meanwhile, the product is also characterized by subtle and steady calmness, subverting the general impression of rough industrial products, thus bringing in an unparalleled brand-new experience to users.



## Modern HVLS Fan

With the Earth's axis tilted at 23.5°, it created the beautiful sceneries of the 4 seasons. With the 31° curvilinear design of the SUNON Modern HVLS FAN blade, it created not only a massive airflow, but also an ultra silent operation. The 6 speed rotation ensured you a silent natural breeze, the unique blades gently running through the air revitalizing your space with a rustic breeze.



## Modern HVLS Fan





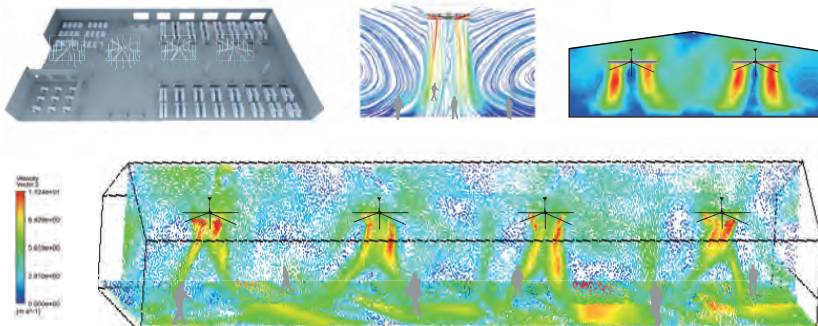
# 100% Made in Taiwan HVLS Fan

SUNON was established in 1980, focusing on the development of energy-saving motor technology, providing the best cooling and ventilation solutions for important international brands in industries such as information and communications, automotive, medical care, and other industrial applications, earning SUNON high reputation in the industry.

In recent years, due to the worsened global warming, the world has been paying more attention to issues of energy-saving, carbon reduction, and environmental sustainable development. At SUNON, relying on decades of rich experience in energy-saving motor technology, we launched the HVLS high-quality ceiling fan series in 2017. Such products are 100% independently developed, designed, and manufactured. The HVLS full range products adopt the energy-saving design of BLDC gearless direct drive for high efficiency in the motor and optimize the flow field with the aerodynamics design. Therefore, the ceiling fan can still generate huge air volume even at an extremely slow speed and can reduce the noise to the lowest level, providing the best solutions for energy-saving, cooling, moisture-proof, and ventilation in various fields, thus offering the industry a better choice of ceiling fans.

## Onsite Assessment and Professional Planning

SUNON can provide onsite assessment of your building and also use computational fluid dynamics software to get optimal ventilation solution with proper fan quantity and fan size before deciding procurement.



Automated production to boost productivity and yield.  
Data management with our QR Code system in each process step to ensure quality and traceability for every single product.



# MIT

- >> **Made in Taiwan**  
100% independent R&D, design, and manufacturing
- >> **Safety First**  
Five safety structure design
- >> **Intelligent Detection**  
Eight electrical safety mechanisms
- >> **Environmental Sustainability**  
Non-toxic raw materials & recyclable packaging materials
- >> **professional Assessment**  
CAE / CFD planning and precise assessment

## 6 Process Steps for Quality Assurance

- Motor stator assembly check
- Motor rotor assembly check
- Motor shaft assembly check
- Motor drive compatibility check
- Blade balancing check
- Code record





## 100% independent R&D

Design, and manufacturing



DC Motor



High Volum



Large Coverage



Lightweight



Low speed



## Intelligent detection

Eight electrical safety mechanisms



Over Current Protection



Over Voltage Protection



Over Heating Protection



Over Load Protection



Short Circuit Protection



Surge Protection



Locked Rotor Protection



Windwill Effect Protection

## Safety First Five safety structure design



01

### Weldness Yoke

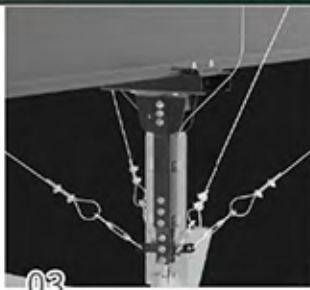
Adopting unibody yoke to prevent potential risks from cracking or rusting if yoke production process is not proper.



02

### Redundant Conjunction

Adopting three sets of screws for each conjunctions makes HVLS Fan more stable with the effects of low vibration and crosswind resistance.



03

### Double Suspensions

Main safety cable wrapping around the I-beam and four-directed guy wire to strengthen stability and construction safety of the ceiling fan.



04

### Interlocking Retainer Structure

The airfoil are locked with an interlocking retainer structure, which can reduce the risk of airfoil falling off.



05

### Airfoil kit fatigue validation over million times

Sunon Powerful HVLS Fan utilizes reinforced airfoil. The equipped airfoil struts passed millions of bending fatigue testing back and forth to avoid the risk of airfoil struts breaking or fan airfoil falling due to long term operation.



# Energy saving and carbon reduction Environmental sustainability

## Protect the environment

SUNON has been focusing on ESG issues for years, actively developing energy-saving technologies and products in its core business, and is committed to providing comprehensive cooling solutions and services for industries related to environmental sustainability. To ensure environmental friendliness, SUNON's full range of HVLS ceiling fan series products adopted the BLDC energy-saving motors and non-toxic materials, so that all our customers can not only save electricity but also reduce environmental pollution. SUNON's ceiling fan products are made of raw materials that comply with EU RoHS non-toxic environmental protection standards to reduce environmental pollution caused during production. In terms of packaging, the cheap Styrofoam packaging with cushioning properties has been fully replaced by recyclable paper materials for lightweight products, while heavier commercial ceiling fans are protected with paper materials along with recyclable foam materials. From design to production and shipment, SUNON strives to do its best for the sustainable environment of the world's land and ocean.



DC Motor



Non-toxic

## Green image of SUNON product design

SUNON's commercial energy-saving ventilation products use the "Green Belt" combined with the SUNON logo to form a "G" to form the image of Green, conveying.



## Environmental sustainability Starts from the Right Product Selection

SUNON puts thinking about how to put environmental sustainability into practice in our production from selecting fan materials to packaging design. Modern HVLS Fan series' materials comply with the latest RoHS standard, using non-toxic and eco-friendly raw materials to shield our planet from further harmful waste pollution. Regarding package, instead of using low-cost styrofoam materials, we choose wrapping paper to pack our product because the material is recyclable and reusable, so that we can do our part to make our earth and ocean environment thrive.



Recycling





## Series 1 Powerful HVLS Fan Leisure Life in Urban Area

The airfoil combines aircraft-grade aluminum with a patented Airfoil design, it reduces the wind resistance and wind noise.

## Modern HVLS Fan The Simplicity of Breeze

SUNON Modern HVLS Fan airfoil, it creates not only a massive airflow, but also an ultra silent operation. The 6 speed rotation ensured you a silent natural breeze.



## Series 3 Powerful HVLS Fan Strong and Gentle Breeze

It reduces body temperature efficiently and heat dissipation evenly. The high-efficiency BLDC direct-drive motor shows remarkable results and does not require regular oil change for long-term use.



## Industrial Wall-Mount Fan Wall HVLS Fan

Easy to install by multiple installation method in order to achieve better ventilation and boost people's comfort .



## Series 10 Powerful HVLS Fan Series Storm but Uniform Airflow

Different from most large industrial ceiling fans on the market that rely on rapid turning speeds to generate unsteady and uneven airflows, Powerful HVLS Fan series 10 large industrial ceiling fans wield outstanding motor control to generate even and gentle winds. In addition, the unique expanded air flow design of the series 10 allows for even better internal and external air circulation in large areas.

## Industrial Portable Fan Portable HVLS Fan

SUNON Portable HVLS Fan is designed to be easily move by a person through the work areas. 2M fan generates powerful airflow to enhance better ventilation and reduce human body temperature.





# Modern HVLS Fan

## Embrace the Slow-paced Life

With the Earth's axis tilted at 23.5°, it created the beautiful sceneries of the 4 seasons. With the 31° curvilinear design of the SUNON Modern HVLS FAN blade, it created not only a massive airflow, but also an ultra silent operation. The 6 speed rotation ensured you a silent natural breeze, the unique blades gently running through the air revitalizing your space with a rustic breeze.



### Stylish and Elegant

Lozenge pattern surface with elegant and large curvilinear airfoil, decorative and pure white design, show more of your taste to shape your lifestyle.



### Massive Airflow

The ultra-high torque motor can generate massive air at low speed by the curvilinear airfoil, creating a relaxing and peaceful atmosphere in your house.



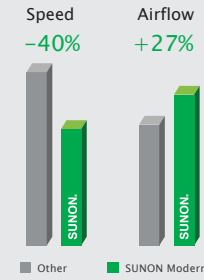
### Ultra Slow Rotation

Slow rotate speed will be visually leisure and less oppressive, let the breeze gently run through your space.



### BLDC Motor

High-efficiency BLDC motor saves up to 50% and more energy than BLDC motor. 6-Speed control adjust optimized temperature.



Diameter	52 inch	60 inch
Motor	BLDC motor	
Power Source	230VAC	
Power Consumption	3.7/38W	4.5/50W
Speed	50/130PRM	50/120PRM
Noise	<35dB(A)	
Weight	6.3Kg	

Color	<input checked="" type="checkbox"/> black	<input type="checkbox"/> white
Material	ABS	
Fan Control	6 Speed (FWD./ REV.)	
Environment	Indoor	
Control	RF Controller BMS(MODBUS) IoT Touch Panel	

\*Environment -This product is not suitable for salt air environments.

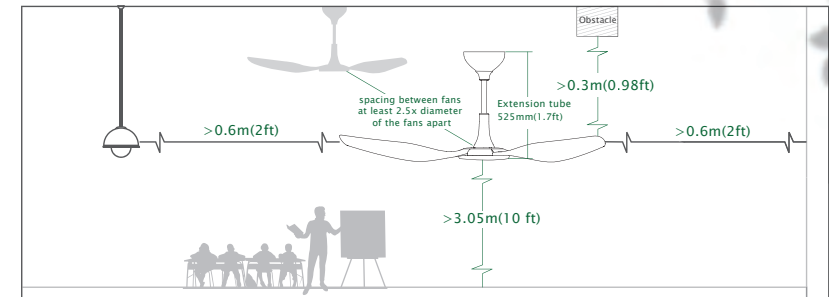
\* The above specifications are test from SUNON Lab and the data will be affected by different environmental conditions.

\*Specifications are subject to change without notice. Final spec. please visit SUNON website at <http://HVLS.sunon.com/en>

### ► Facility Type

exhibition hall, bookstore, cafe, library, museum, office, meeting room, hotel lobby, hospital, fitness center, home

### ► The Placement & Clearance between Fan and Obstructions





# series 1 Powerful HVLS Fan

## Leisure Life in Urban Area

SUNON Powerful HVLS series 1 has a lighter and stylish look. The airfoil combines aircraft-grade aluminum with a patented Airfoil design, it reduces the wind resistance and wind noise.



### BLDC Motor

More than 90% of motor efficiency, gearless direct drive motor, no need for regular lubrication maintenance.



### Energy Saving

The aerodynamic winglet design can generate massive airflow with very low power consumption, and it runs 12-18 hours at 1 KW.



### Silence Design

Patented airfoil design, it reduces the wind noise and provides smooth airflow.



### Ultra Thin And Light

The sleek, ultra-thin motor design and engaging visuals extend the user's experience by 20 kg lightweight look.

### ► Specification

Diameter	5 ft (1.5 m)	6.5 ft (2 m)	8 ft (2.5 m)	10 ft (3 m)
Weight	14 kg	16 kg	18 kg	20 kg
Speed	180 RPM	130 RPM	95 RPM	70 RPM
Power Consumption	54 W	72 W	84 W	84 W
Noise	<35 dB(A)			
Power source	220-240 VAC			
Environment	Indoor			
Control	RF Controller/BMS(MODBUS)/AloT/Touch Panel			

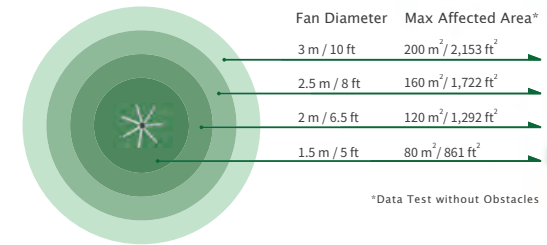
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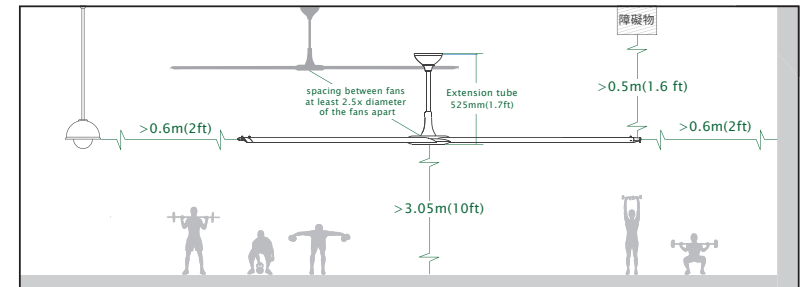
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### ► Air Volume



### ► The Placement & Clearance between Fan and Obstructions



### ► Facility Type

exhibition hall, bookstore, cafe, library, museum, office, meeting room, hotel lobby, hospital, fitness center, home, factory, warehousing



# series 3 Powerful HVLS Fan

## Strong and Gentle Breeze

Powerful HVLS Fan series 3 is suitable for cooling a large space, it reduces body temperature efficiently and heat dissipation evenly. The high-efficiency BLDC direct-drive motor shows remarkable results and does not require regular oil change for long-term use. This is your top choice for long-term investment in commercial space.



### BLDC Motor

More than 90% of motor efficiency, gearless direct drive motor, no need for regular lubrication maintenance.



### Energy Saving

Series 3 achieve carbon neutral by saving 55% power consumption and save more than 43,212 trees. (Based on Fan Size:3M)



### Silence Design

Patented airfoil design, it reduces the wind noise and provides smooth airflow.



### Safety First

Sunon applied unibody yoke to prevent potential risks from cracking or rusting if yoke production process is not proper.

### ► Specification

Diameter	2.5 m (8 ft)	3 m (10 ft)	3.6 m (12 ft)	4.2 m (14 ft)
Weight	27.39 kg	29.77 kg	32.57 kg	35.44 kg
Speed	150 RPM	100 RPM	70 RPM	56 RPM
Power Consumption	335 W	232 W	176 W	171 W
Noise	<40 dB(A)			
Power source	200-240 VAC			
Environment	Indoor			
Control	RF Controller/BMS(MODBUS)/AloT/Touch Panel			

\*Weight - fan unit only, the controller, the mount and the extension tube are not included.

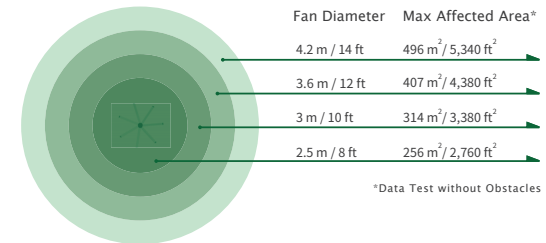
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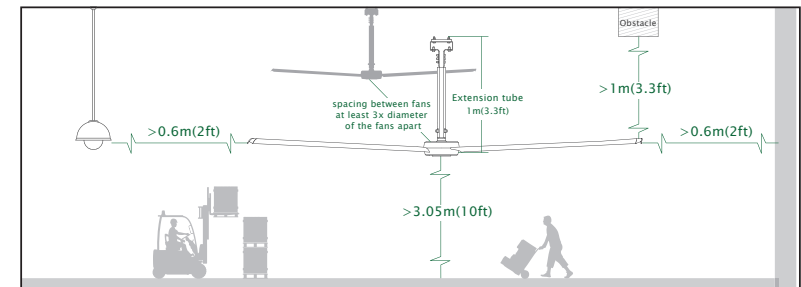
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### ► Air Volume



### ► The Placement & Clearance between Fan and Obstructions



### ► Facility Type

exhibition hall, bookstore, cafe, library, museum, office, meeting room, hotel lobby, hospital, fitness center, home, factory, warehousing



# series 10 Powerful HVLS Fan Storm but Uniform Airflow

Different from most large industrial ceiling fans on the market that rely on rapid turning speeds to generate unsteady and uneven airflows, Powerful HVLS Fan series 10 large industrial ceiling fans wield outstanding motor control to generate even and gentle winds. In addition, the unique expanded air flow design of the series 10 allows for even better internal and external air circulation in large areas.



### BLDC Motor

More than 90% of motor efficiency, gearless direct drive motor, no need for regular lubrication maintenance.



### Energy Saving

Series 10 achieve carbon neutral by saving 32% power consumption and save more than 90,000 trees. (Based on Fan Size: 7.3m)



### Air Smoothly

By implementing aerodynamic diversion designs, the generated airflow is gentle and does not include flow-breaks. Even large spaces can be cooled down through comfortable wind.



### Safety First

Sunon applied unibody yoke to prevent potential risks from cracking or rusting if yoke production process is not proper.

### ► Specification

Diameter	4m (13ft)	5m (16ft)	5.5m (18ft)	6.1m (20ft)	7.3m (24ft)
Weight	90.01 kg	99.36 kg	104.03 kg	110.16 kg	120.86 kg
Speed	115 RPM	90 RPM	65 RPM	60 RPM	50 RPM
Power Consumption	825 W	1100 W	585 W	765W	1050 W
Noise	<50 dB(A)	<50 dB(A)	<50 dB(A)	<46 dB(A)	<46 dB(A)
Power source	220-240 VAC				
Environment	Indoor / Outdoor				
Control	Knob/BMS(MODBUS)/AIoT/Touch Panel				

\*Weight - fan unit only, the controller, the mount and the extension tube are not included.

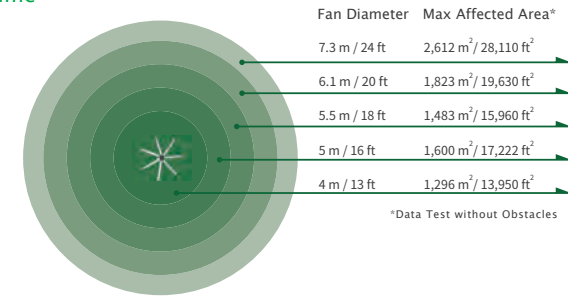
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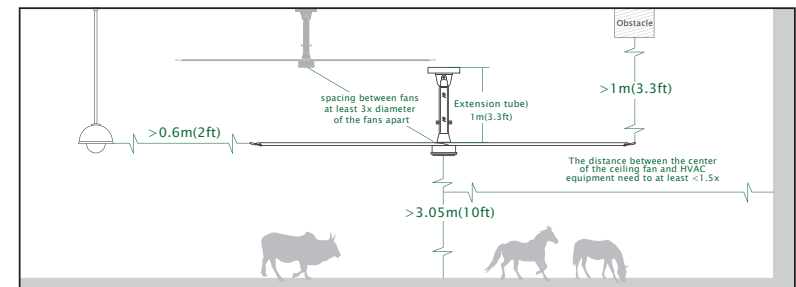


### ► Air Volume



\*Data Test without Obstacles

### ► The Placement & Clearance between Fan and Obstructions



### ► Facility Type

Factory, Dairy Farm, greenhouse, hangar, gymnasium, warehouse, hypermarket, supermarket, exhibition hall.



Easy Install | Light Weight | IP 55



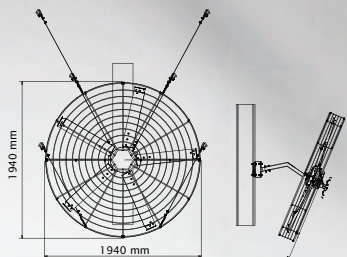
**BLDC Motor**  
BLDC Motor technology  
energy-saving but Powerful



**Universal Voltage**  
100 V~ 240 V



**2 Way Installation**  
Ceiling / Wall-mount



Specification	
Dimension (W x H x D)	1940 x 1940 x 1265 mm
Weight	90 Kg
Power Source	100-240 VAC    220-240 VAC
Speed (Max)	285 RPM    230RPM
Power Consumption (Max)	523 W    280 W
Noise	<50 dB(A)    <43 dB(A)
Rated Current (Max)	5.13 A    2.8 A
IP Rating	IP55
Control	Knob/BMS(MODBUS)/RF Controller/ AloT/Touch Panel
Installation	Ceiling / Wall-mount

\*RF Controller: 230 RPM dedicated

\*Environment -This product is not suitable for salt air environments.

\*Weight: fan unit only, the mount and the extension tube are not included.

\* The above specifications are test from SUNON Lab and the data will be affected by different environmental conditions.

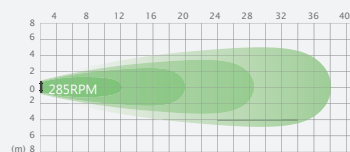
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# WALL HVLS FAN

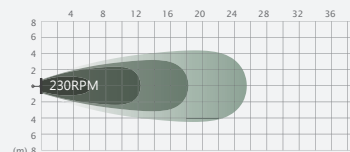
## Industrial Wall-Mount Fan

SUNON pivot fan is designed for crowded floor \ low ceiling of the work area. Easy to install by multiple installation method in order to achieve better ventilation and boost people's comfort .

SUNON is your best choice of ventilation . Sunon BLDC motor to save energy with powerful airflow and quiet sound.



Air reaches 36 meters away  
(1/3 length of football field)



### ► Facility Type

Warehouse,Factory,Dairy farm,Traditional market,Exhibition hall,School



# PORTABLE HVLS FAN

## Industrial Portable Fan

SUNON Portable HVLS Fan is designed to be easily move by a person through the work areas. 2M fan generates powerful airflow to enhance better ventilation and reduce human body temperature. Using SUNON BLDC motor not only save energy, but also generate powerful airflow with quiet sound.



**BLDC Motor**  
BLDC Motor technology energy-saving but powerful



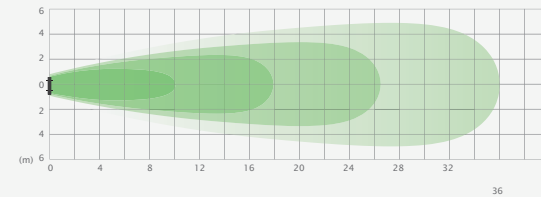
**Universal Voltage**  
100 V~ 240 V



**Strengthen**  
Hexagonal hub and rib design strengthen frame structure to ensure portable fan more stable and safe.



**Safety Comply**  
Cage design comply with IEC 60335-1 for safety requirement



Air reaches 36 meters away  
(1/3 length of football field)

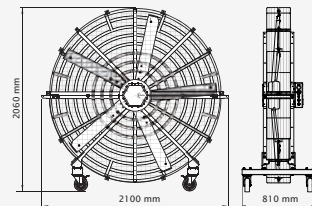
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\*Weight: fan unit only, the mount and the extension tube are not included.

\* The above specifications are test from SUNON Lab and the data will be affected by different environmental conditions.

\* Specifications are subject to change without notice. Final spec. please visit SUNON website at <http://HVLS.sunon.com>

Specification	
Dimension (W x H x D)	2060 x 2100 x 810 mm
Power Sour	100-240 VAC, 1Φ, 50/60Hz
Weight	130 Kg
Speed (Max)	285 RPM
Power Consumption (Max)	523 W
Noise	<50 dB(A)
Rated Current (Max)	5.13 A
IP Rating	IP55
Control	Knob



### ► Facility Type

Warehouse, Factory, Car display, Fitness center, Gymnasium, Exhibition hall

Easy Move | Safe Design | IP 55



# Worldwide installations

**Industrial** : Automated factory,Plastic injection factory,Package factory,Warehouse,Logistic Center

**Agriculture** : Dairy Farm,Equine,Livestock,Barn,Greenhouse

**Commercial** : Hospitality,Shopping mall,Hypermarket,Automobile display center,Furniture store,  
Food Court,Office,Hotel,Cafe shop

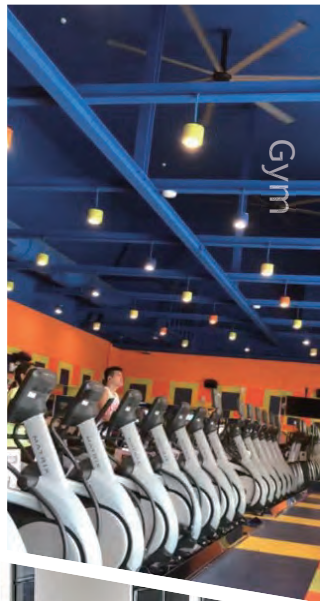
**Public space** : Museum,Library,Traditional Arts Center,BBQ recreation,International Flora Expo

**Transportation** : Maintenance hangar, Airport, Train station, Bus station, Ship repair yard

**Sports** : Gym, Swimming, Indoor sport center







# Success Case

Scan the QR Code for more application fields





# Smart Control with Handy Accessibility

## WIRELESS & WIRED REMOTE OPTIONS

SUNON provides 5 types of operations based on various industry applications and users' requirements.



## S TOUCH\_N5 /N30

### Touch HMI Panel Control

- Two types: 1 for 5 fans and 1 for 30 fans, can be managed at once
- Simple intuitive user interface
- Enable operation, schedule, fan grouping and naming
- Centralized & multizone remote control

## J BOX\_Knob

### Knob Control

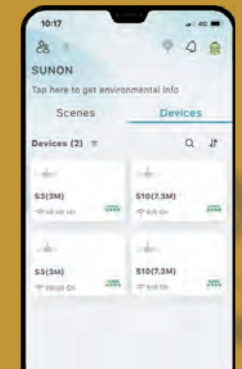
- Potentiometer Design
- Forward/Reverse airflow control
- A built-in drive in the J BOX for easy upgrade and management
- Simple intuitive navigation for basic fan control
- IP Rating: IP55



## S TOUCH\_AIoT

### Smart Phone as the remote

- This Smart APP accommodates multiple smart devices from various brands
- Voice control (Support Google assistant)
- Unlimited quantity for device control
- Can set up fan control group in the app
- Enable operation, schedule, fan grouping and naming



## RF

### Remote Control

- RF with wireless control
- 6-speed control and forward/reverse airflow control
- Fans are connectable within 1 controller
- A max remote length of 8 meters



## J BOX\_BMS (Modbus)

### Building Management System

Support RS485 Modbus RTU  
Centralized control, a max distance between a drive and fans of 300 meters.  
A built-in drive in J BOX for easy upgrade and management.  
IP Rating: IP55