

# HOPERGY PRODUCT CATALOGUE 2022



# DIRECTOR STATEMENT

### YANG HU Founder

OUR PRODUCTS CAN BE EXTENDED INDEFINITELY, MINIMISING WASTAGE, COST AND IMPROVING OVERALL EFFICIENCY.

### **ABOUT US**

Powered by innovative capability since its foundation, Hopergy focuses on researching, manufacturing, distribution and engineering of solar photovoltaic mounting products. Our solar PV solutions address the immediate requirements and needs of residential, corporate, government and utility scale applications worldwide.

Hopergy understands the importance industry places on product quality, reliability, durability and the overall cost-effectiveness of installation. These factors drive the direction of Hopergy's product design and development, together with the company's commitment to manufacturing in accordance with its ISO 9001 accreditation. The end product reflects the company's commitment to satisfying the industry's needs.





### HOPERGY **GROUND MOUNT** SYSYEMS

Hopergy's Ground Mount System is designed for medium to large scale project installation. The most appropriate ground mount for any outdoor site depends on project size, engineering considerations, mounting surface material, soil conditions and ground topography, so Hopergy offers a diverse range of ground mounting systems to ensure a solution is available for every application, location and environment.

Each system is designed for simple installation, durability, cost-effectiveness and flexibility in design and installation.

















# N STURCTURE



### Application Terrain and Environment

- The ground is nearly flat
- The ground has a slope, and the angle of the slope is almost the same

### **N TYPE SOLAR GRUOND SYSTEM**

Pre-assembled, durable ground mount frame designed for standard environmental conditions

TECHNICAL DATA	
Foundation Type	Ground Screws Cement
Engineering Condition	Small number of rows, small installation angle, small load arrangement.
Ideal Layout	Both long and short.



3-4 Rows x Columns

# **SUPPORT**





### **W TYPE SOLAR GRUOND SYSTEM**

Pre-assembled, extra durable ground mount frame designed for harsh environmental conditions

TECHNICAL DATA	
Foundation Type	Ground Screws Cement
Engineering Condition	Large number of rows, large installation angle, large load arrangement.
Ideal Layout	Both long and short.



4-5 Rows x Columns

### Application Terrain and Environment

- The ground is nearly flat
- The ground has a slope, and the angle of the slope is almost the same

# Y STURCTURE



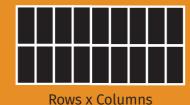
### Application Terrain and Environment

- The ground is nearly flat - In this terrain
- Irregular terrain, uneven slopes in the east, west, south and north directions.

### Y TYPE SOLAR GRUOND SYSTEM

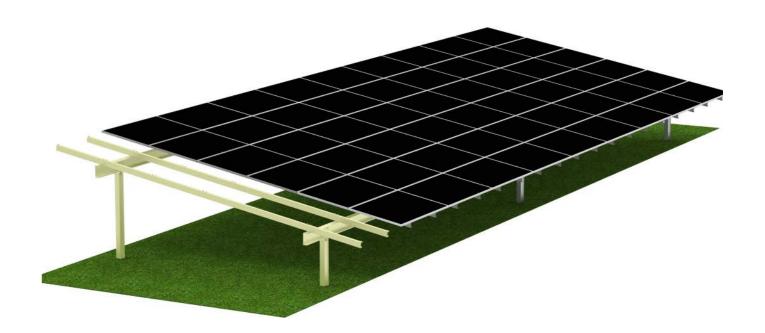
Pre-assembled, constructed from either carbon-steel and aluminum or full carbon-steel.

TECHNICAL DATA			
Foundation Type	Ramming Pile	Cement	Steel Pipe inserted into cement
Engineering Condition	For structural reasons, the span is smaller than the N/W type support under the same conditions; Because it's a single pole, the length of the longitudinal beams limits the number of rows.		
Ideal Layout	Both long and s	short.	



# **SUPPORT**





### **C TYPE SOLAR GRUOND SYSTEM**

Material corrosion resistance; Production process a molding; the cut surface is self-healing

Туре	Ramming Pile	Cement
Engineering Condition	The number of rows and installation angle are flexible, and the structure type can be changed according to the wind and snow load	
Ideal Layout	Both long and sho	ort.



### Application Terrain and Environment

- The ground is nearly flat
- The ground has a slope, and the angle of the slope is almost the same

# **STURCTURE**



### Application Terrain and Environment

 The ground is nearly flat - In this terrain



LANDSCAPE ONLY

### **F TYPE FARM SHED**

TECHNICAL DATA	
Foundation Type	Cement Ground Screw
Engineering Condition	The conventional installation angle is 5 ° to 20°, and other configurations are required
Characteristic	1. The foundation is hot-dip galvanized ground screw, the support is aluminum, beautiful and durable.
	2. Pre-installed components are easy to install on site.
	3. There is a high height, north-south and east-west direction has a large enough span to ensure that agricultural machinery in and out of the site operation unimpeded.
	4. Reasonable panel layout ensures reasonable crop sunshine demand.
	5. East, west, north and south direction have cross rail, stable and reliable.
Ideal Layout	Both long and short

# **SUPPORT**





### P TYPE SOLAR POLE SYSTEM

Pre-assembled, durable ground mount frame designed flexibility installs and utility

# Foundation Type Ramming Pile Cement Steel Pipe inserted into cement Engineering Condition Adjustable installation angle, fixed number of modules. Ideal Layout Only for short arrays, such as 2, 4, 6, 8, 10, 12 -piece modules.









2, 4, 6, 8 panels

### Application Terrain and Environment

- Irregular terrain, uneven slopes in the east, west, south and north directions
- The ground space is limited, and small areas can also be installed such as houses and gardens.



# **FENCE**



### **FENCE**

TECHNICAL DATA	
Foundation Type	Ramming Pile Cement Steel Pipe inserted into cement
Applications	Factories, warehouses, buildings and public utility facilities, such as schools, sports fields and sports stadiums, playgrounds, as well as private premises.
Colors	Polyester coated reen, red, yellow, white, etc.

### **ADVANTAGES**

- 1 THE NECESSITY OF SETTING
  UP THE PROTECTIVE FENCE
- 2 STANDARDIZATION DESIGN FOR PARTS, APPLICABLE TO ALL TYPES OF FIELD FIXATION
- 3 SOLAR POWER FENCING
  WITH CONCRETE ELECTRIC
  FENCE WIRE ECONOMY,
  HIGH QUALITY, SIMPLE
  CONSTRUCTION
- A NATIONAL LAWS AND
  REGULATIONS DEFINITE IT
  MUST BE SET UP PREVENT
  PV POWER STATION SYSTEM
  FROM BEING STOLEN
- TO PREVENT THE
  DESTRUCTION OF CHILDREN
  AND ANIMALS



### HOPERGY **GROUND** SCREW

Ground screw is specially designed for solar ground mounting installation which can support whole solar station systems. This ground screw is good alternative for traditional wooden or concrete base where requires a solid footing. It can wild applied for different hard and stony soil or sand area. Our ground screw system has had with strictly test from wind loads and lateral pull, to horizontal load and lift.

Besides ground screw works as foundation systems for ground mounts, it's also suitable for carport, fence, wood house and flag poles ...







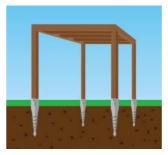






### **APPLICATIONS**









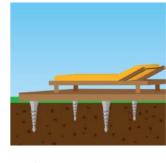
Shed/Greenhouse



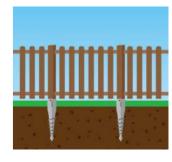
**Playground equipment** 



Umbrellas



Decks



**Fence** 



### HOPERGY **CARPORT** SYSYEMS

Hopery Carport Ground Mounting System is engineered and designed with robust and swiftness in mind enabling it to endure the harshest of all conditions, such as heavy rain, wind and snow. The system structure supports are packed pre-assembled and has been developed to accommodate a wide range of photovoltaic modules. Each and every Carport System will be designed and customized towards your needs and specifications, whether it be for large scale commercial applications or down to a residential double carpark port, we'll have a solution for you.



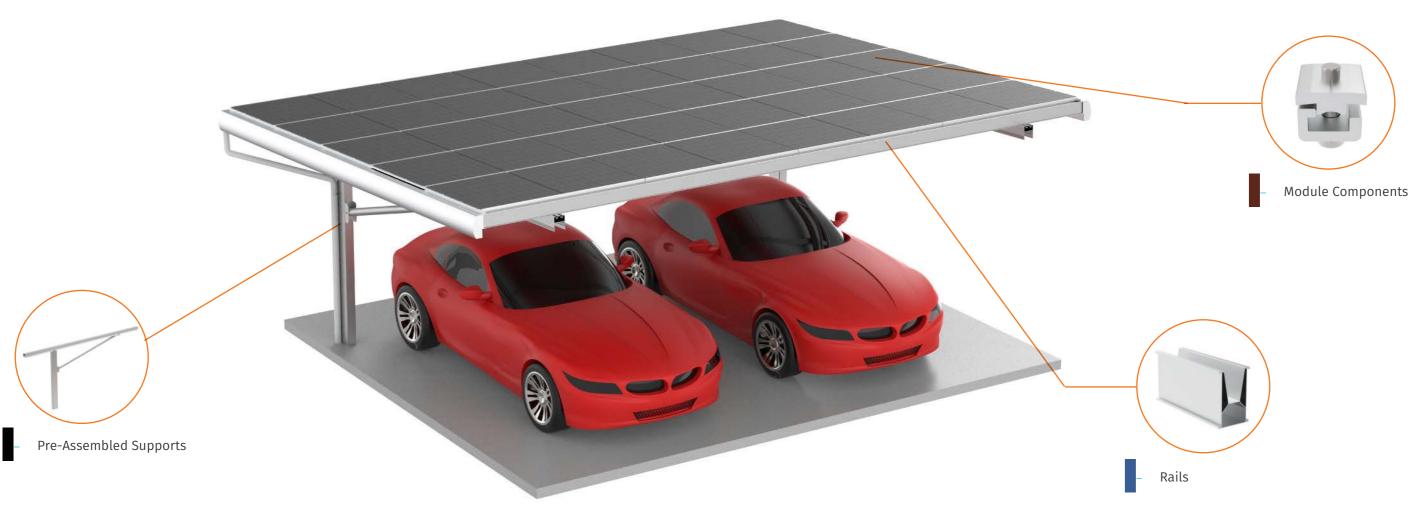














# Y STURCTURE



### IDEAL LAYOUT & APPLICATION



LANDSCAPE/ PORTRAIT



Landscape: 5 rows x columns

Portrait: 3rows x columns

### Y TYPE SOLAR CARPORT

TECHNICAL DATA	
Foundation Type	Fully buried cement
	1. The Y-Type structure is constructed from carbon steel. Compared with the N & W type double-column structure, its independent column provides better utility.
	2. The positioning of the support allows for full clearance of the car doors opening and closing.
Features	3. The Y-type single-column structure carbon steel can be made into different styles, and the carbon steel material can be designed according to different loads and installation conditions. It has high flexibility and can handle larger spans than the N & W type structure.
	4. Use double- layer structure and channel to make water- proof

# **SUPPORT**





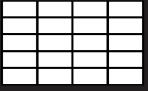
### **W TYPE SOLAR CARPORT**

	Fully buried cement
Foundation Type	Semi-buried cement
	Full exposed cement
	Ground screw
Features	1. Fully constructed from aluminum.
	2. Compared with the N type, the W type is more suitable for installation conditions with medium load, larger installation angle of the carport, and the layout with more rows.
	3. Both waterproof and non-waterproof types can be designed according to requirements.
	4. Depending on soil conditions, you can choose cement foundation or ground screw foundation.

IDEAL LAYOUT & APPLICATION



LANDSCAPE ONLY



5 rows x columns



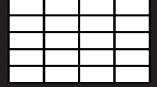
# **C** STURCTURE



### IDEAL LAYOUT & APPLICATION



LANDSCAPE ONLY



5 rows x columns

### **CUSTOM SOLAR CARPORT**

Custom Tailor made carports, designed and constructed for every scenario

### TECHNICAL DATA

### Foundation Type

Fully buried cement

1. Structure constructed from Carbon Steel. Compared with the W type double-column structure, its independent column has a better space for movement. Compared with T type, it can have higher strength.

### **Features**

2. The positioning of the support allows for full clearance of the car doors opening and closing.

3. The structure support can designed according to different loads and installation conditions. It has high flexibility and can handle larger spans than the N & W type structure.







### TIN

Hopergy's Tin (Metal) Roof Mounting Solution is suitable for almost any flat roof. It provides a simple and cost-effective solution for mounting all framed and unframed solar panels currently on the market. Hopergy's wide range of mounting brackets provide for fast and secure fixing to sheet metal, purlins or rafters and for different roofing types at angles from 10 to

### TILE

Hopergy's Universal Tiled Roof Mount is suitable for almost any flat roof. It accommodates all framed and unframed solar panels currently on the market. Hopergy's complete product range of mounting brackets provide for fast and simple fixing to purlins or rafters, without affecting the integrity or function of the tiles themselves. Roof brackets are available for traditional profile tiles and flat tiles. To simplify connection of support rails to the brackets, Hopergy's rails are designed to allow fixing nuts to be simply swiveled into the rails and flat tiles.



### TILT

Hopergy's Tilt Systems are quick and easy to install, allowing solar panels to be installed in the angle ranges from 10 to 15 degrees, 15 to 30 degrees and 30 to 60 degrees.

To simplify installation, components are pre-assembled before delivery to site.

- Available tilt angles 10–15°, 15–30° and 30–60°
- Easy to fold, save storage and transportation
- Simple and fast installation
- Easy access to components and connections

# **TIN SOLUTION**







FRAME/ FRAMELESS COMPATIBLE



LANDSCAPE/ PORTRAIT

### **TIN SOLUTION**

### TECHNICAL DATA

**Features** 

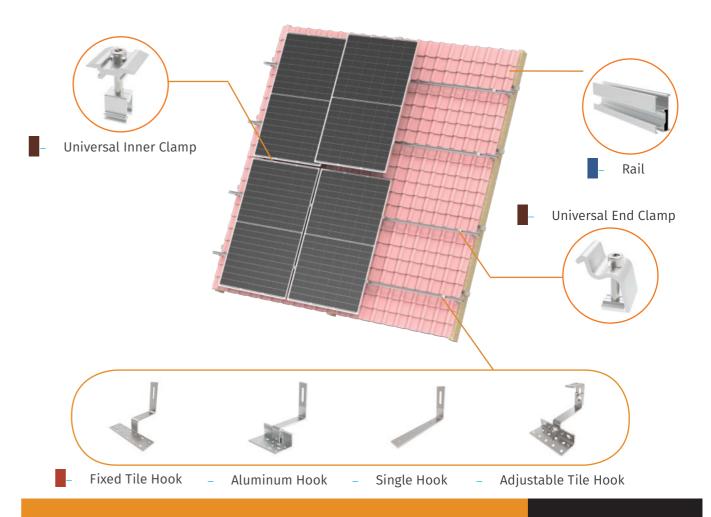
1. The interfaces, rails and clamps are of high quality, robust and corrosion-resistant materials including structural grade alloys.

2. Reliable, robust roof mounting system with high-quality components designed for the harshest conditions.



1 row x columns

# **TILE SOLUTION**



### **TILE SOLUTION**

### TECHNICAL DATA

1. This system allows installation on tile roofs.

### Features

2. Robust design and high-quality materials.

3. Corrosion resistance is achieved through anodized structural grade aluminum and stainless steel components.



1 row x columns

# IDEAL LAYOUT & APPLICATION



COMPATIBLE

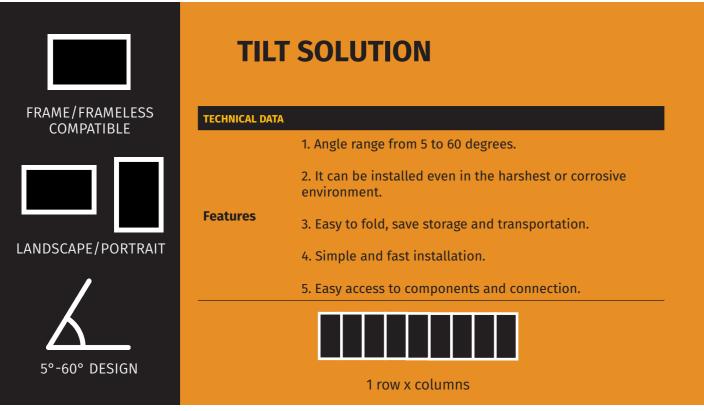


PORTRAIT



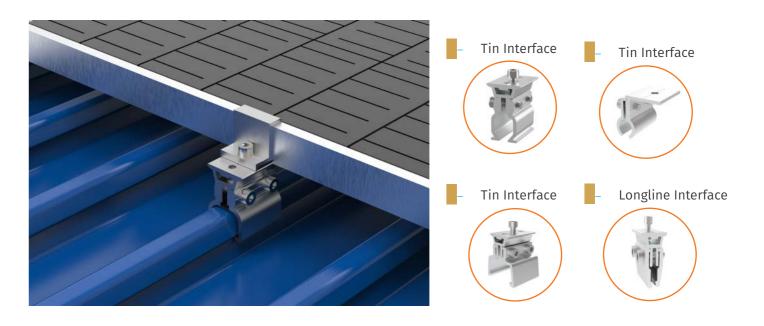
# **TILT SOLUTION**





# **OTHER SOLUTION**

### **TIN INTERFCAE**



### **FLASHFOOT**

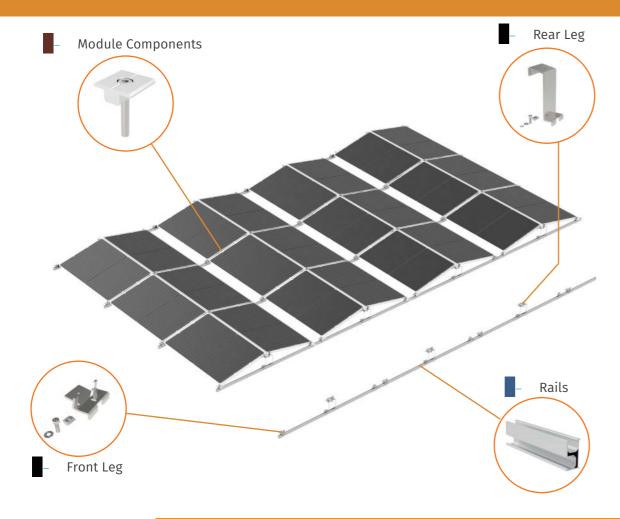


### **ADVANTAGES**

- 1 ECONOMY: INTEGRATED MOLDING, COST OPTIMIZATION
- 2 MATERIAL DIVERSITY: OPTIONAL GALVANIZED PLATE AND ALUMINUM PLATE FOR DIFFERENT ENVIRONMENTS CAN BE SELECTED
- 3 WATERPROOF: NO WATER LEAKAGE AT THE BRACKET BOLT AFTER INSTALLATION
- 4 SURFACE TREATMENT OPTIONAL: MILL, POWDER COAT AND PRE-PAINTED (PVDF)

### Hopergy

### **EAST-WEST SYSTEM**



### **ADVANTAGES**

- 1 NO MODULE SELF-SHADING
- 2 HIGH ENERGY PRODUCTION DENSITY
- MORE CONSTANT POWER
  OUTPUT
- 4 MORE AERODYNAMIC
- 5 LOWER ROOF LOADING PRESSURE

### **EAST WEST SYSTEM**

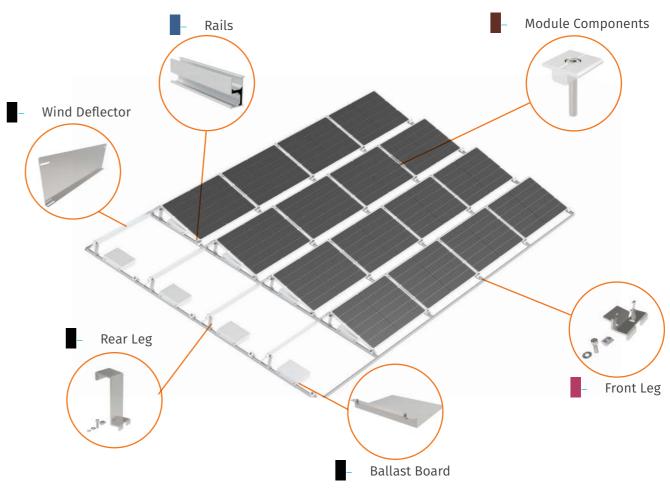
**Hopergy East West Mounting System** provides more stable and more consistent power throughout the day relative to south facing designs. It reduces the peak production spike at noon and widens the power duration into the morning and evening. The system is fully constructed from aluminum and designed specially to accommodate mainstream solar modules.

The system can be assembled and placed directly onto the flat roof without the need of drilling holes into the mounting surface, which ultimately eliminates the risk of water leakage through the roof during installation.

The front and rear leg are equipped with a limited position structure, which has the advantages of convenient, fast and labor-saving when installing solar modules

When installed on a flat roof, the ballast tray made of aluminum-magnesium-zinc has good corrosion resistance

### **BALLAST SYSTEM**



### **BALLAST SYSTEM**

Hopergy's Ballast Mounting Solution is suitable for almost any flat roof. The system's rigidity and linked rail design can withstand conditions in the high wind, snow and seismic zones and its aluminum and stainless steel components can endure even the most corrosive environments.

The system is fully constructed from aluminum and designed specially to accommodate mainstream solar modules.

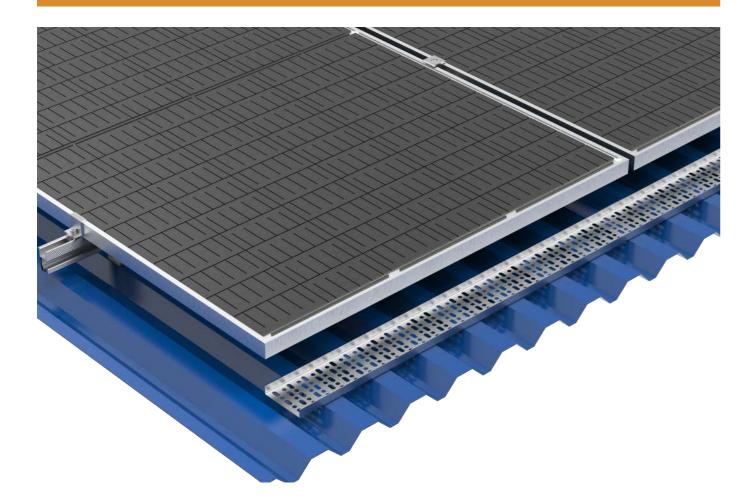
The system can be assembled and placed directly onto the flat roof without the need of drilling holes into the mounting surface, which ultimately eliminates the risk of water leakage through the roof during installation.

Our ballast board made from aluminum-magnesium-zinc providing the system with superior corrosion resistance, while our wind deflector is engineered to effectively enhance the stability of the system.





# **CABLE TRAY**



### **ADVANTAGES**

- PREVENTING
  TAMPERING FROM
  INSECTS OR ANIMALS
- ENHANCES SYSTEM
  LIFE EXPECTANCY
  AND PREVENTS CABLE
  TAMPERING
- KEEPS CABLE HIDDEN FOR A CLEAN AND CLUTTER FREE APPEARANCE

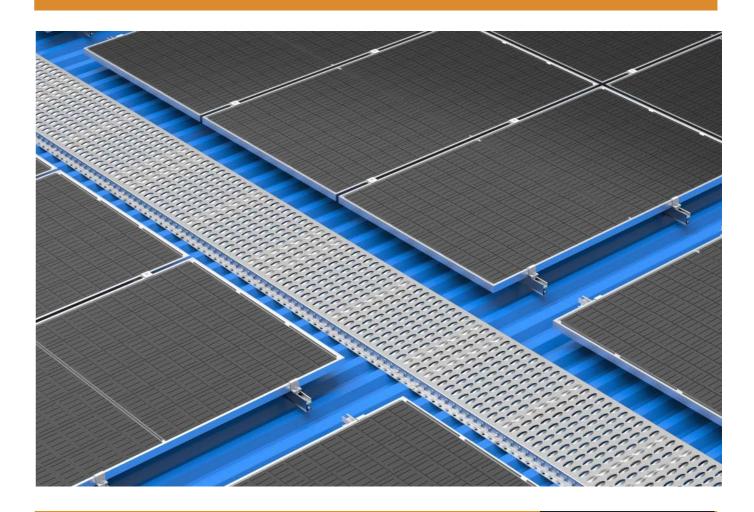
### **CABLE TRAY**

### TECHNICAL DATA

**Features** 

The Cable Tray was designed initially for information and energy cables for solar PV systems, however today as a versatile channel, its being used from building infrastructure to IT networking and so much more. The MT Rail is made from aluminum and allows for complex cables to be neatly connected, and with its cover, it provides great aesthetics and concealment.

## **WALKWAY**



### **WALKWAY**

### TECHNICAL DATA

Features

- 1. The shape of the surface prevents skidding.
- 2. Long service life, high quality and affordable.
- 3. Quick assemble.
- 4. Good Bearing

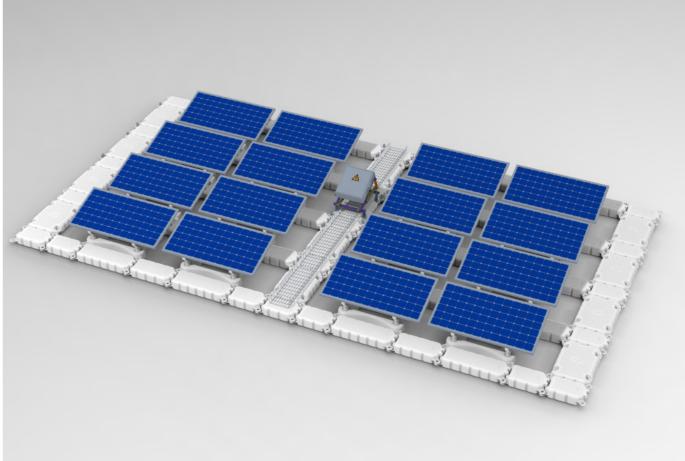
Application

Checkered plate channels are often used to homework, industrial workshop floor, narrow channel, terrace, warehouses, sidewalks and stair tread, etc.

ARE OFTEN USED TO HOMEWORK, INDUSTRIAL WORKSHOP FLOOR, NARROW CHANNEL, TERRACE, WAREHOUSES, SIDEWALKS AND STAIR TREAD, ETC.



# **FLOAT SYSTEM**



### **FLOAT SYSTEM**

### **Advantages**

**Hopergy's Float System** enables a cost effective and environmentally friendly solution to harass energy on water



TO LAST

1. Utilizing space on water which can greatly reduce land expropriation cost. 2. Installation site does not require pre-landscaping

resulting in saving relevant costs.

3. PV modules are cooled by its natural surroundings, increasing its power generation.

4. The float system will improve shading of the water source which can helps algae growth inside and slow **INSTALLATION** water evaporation in dry climate locations.

5. Engineered for convenience and easy installation.

### **APPLICATION** LOCATIONS



Sewage treat-ment plants





# **SOME OF OUR PROJECTS**





Bulgaria

1MW

Tile Roof System





Bosnia and Herzegovina

8MW

**Ground System** 





Kenya

2.7MW

Tin Roof System





Sw Hyogo, Japan

21MW

**Ground System** 

