



## Power Beyond Solar

The World Leading PV and Smart Energy IoT Total Solution Provider



Trina Solar  
Official Website



Vertex Product  
information

For more information regarding Vertex module,  
please follow our social media accounts or  
scan the QR codes to visit us at our website.



# Trina Solar INTRODUCTION OF **670W** VERTEX MODULE

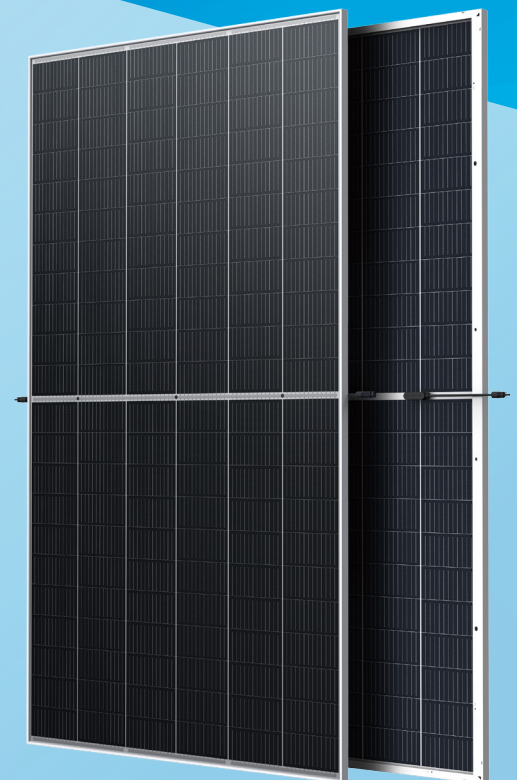


High Power  
**670W**

High Efficiency  
**21.6%**

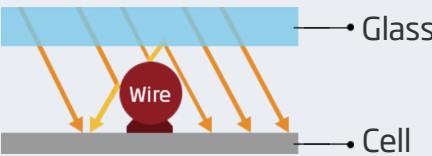
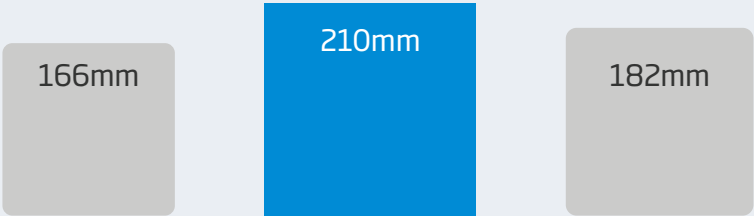
**Mechanical data**  
Size: 2384\*1303mm  
Weight: 33.9kg

**Electrical Data**  
Low voltage concept design  
Voc: 45.7V Isc: 18.5A

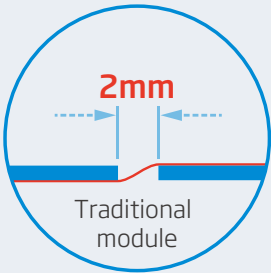


# 210, The Future from Now On!

Vertex module with 670W+ power  
and 21.6%+ efficiency

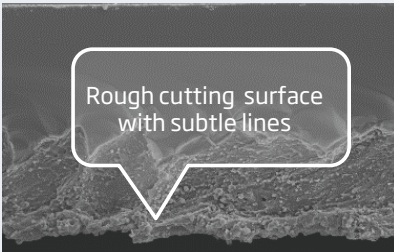


Multi-busbar technology,improving optical utilization rate with higher electricity performance,  
Module power increase **2~3%**, efficiency increase **0.4~0.6%**

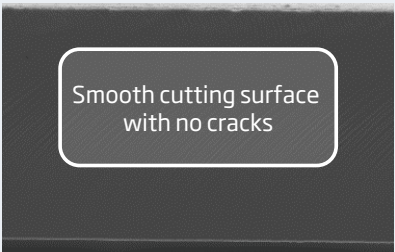


High density encapsulation technology, optimizing power output with good balance between  
reliability and efficiency, module efficiency increase **0.2~0.3%**

## Non-destructive Cutting(NDC) Technology



Cross-section from  
conventional cutting

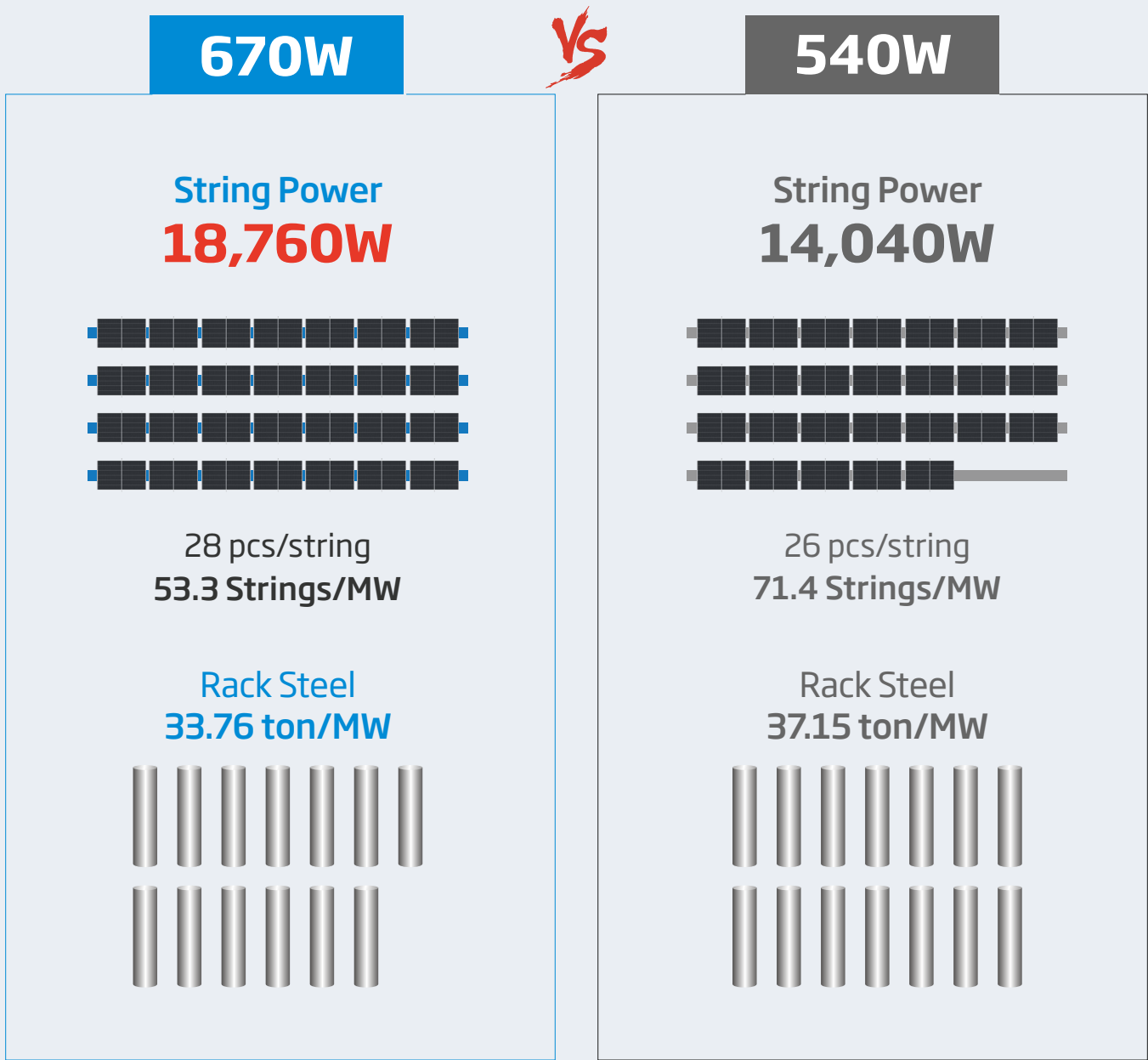


Cross-section from NDC

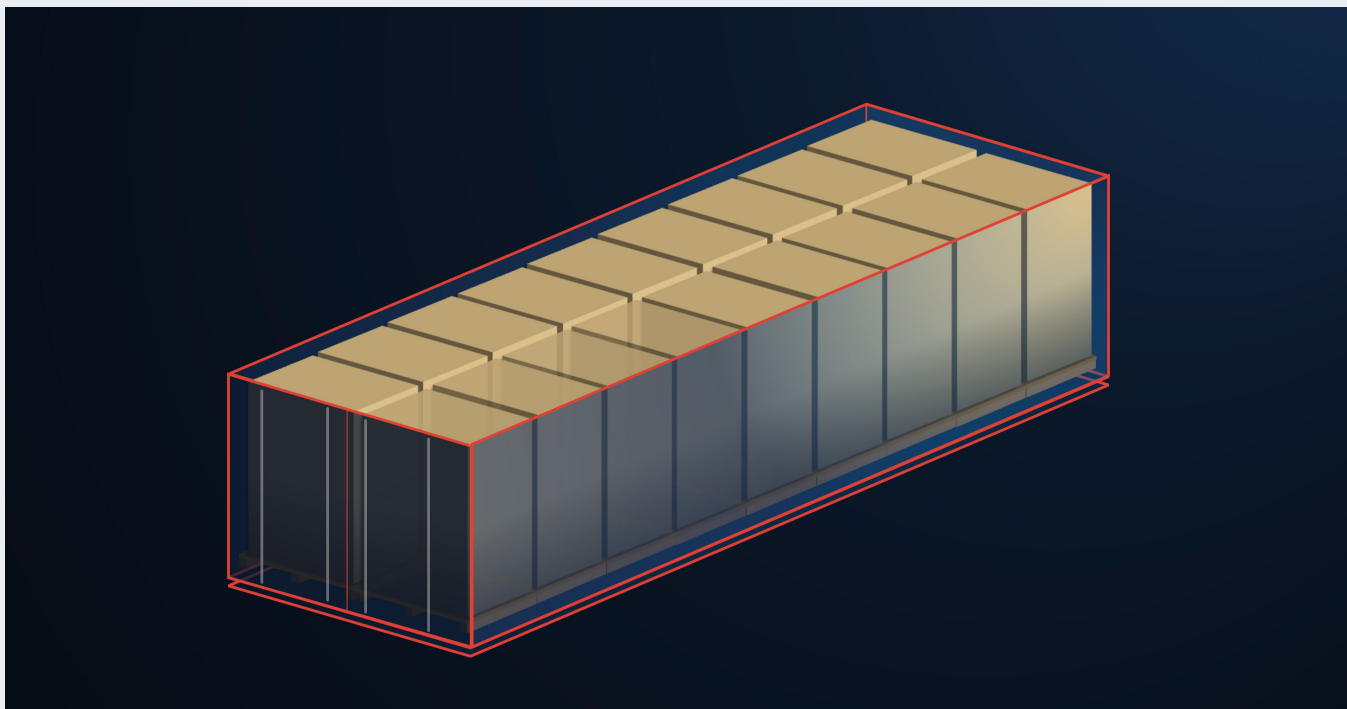
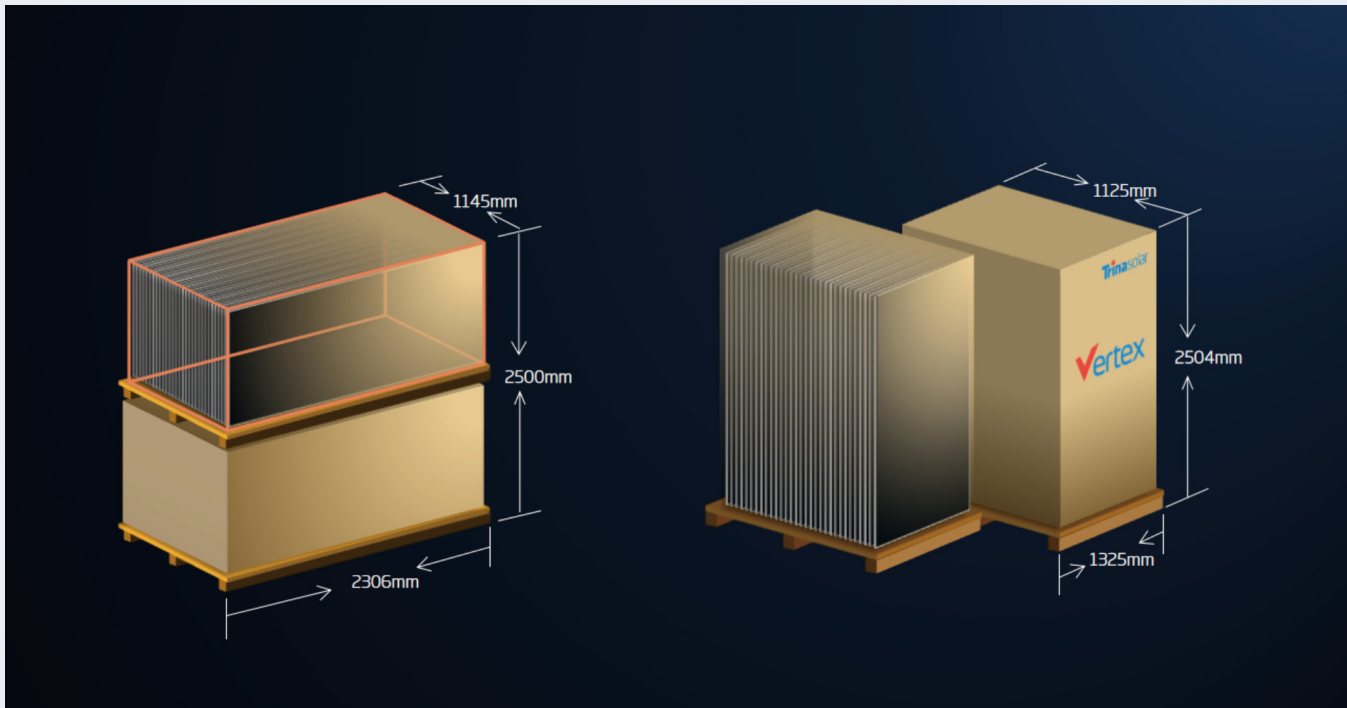
Achieving better cell strength, lower micro-cracks risk for better product reliability

# LOWER VOLTAGE BRINGS HIGHER STRING POWER 34%

| Module Type | String Module Number | Module Pmax | String Power | Higher Power |
|-------------|----------------------|-------------|--------------|--------------|
| 210         | 28                   | 670W        | 18,760       | 34%          |
| 182         | 26                   | 540W        | 14,040       | -            |



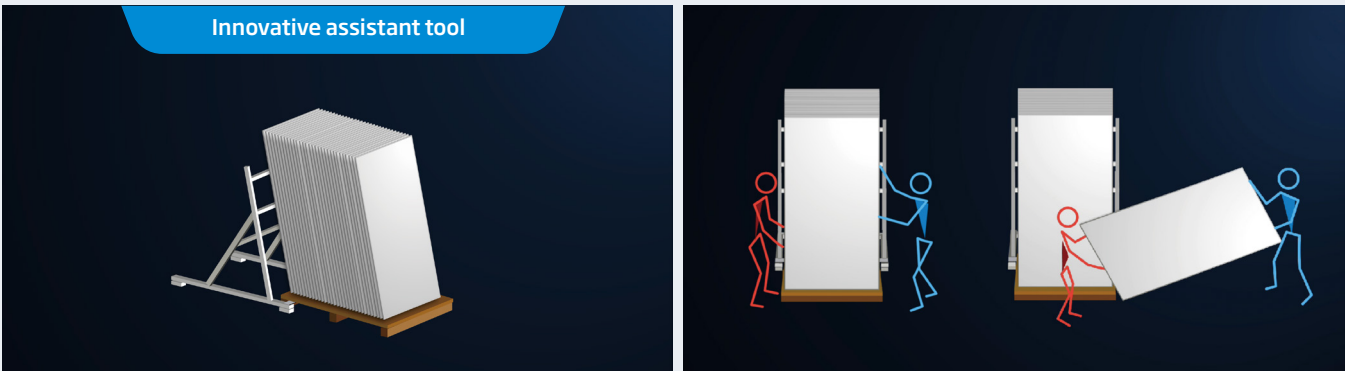
Logistic cost reduce **12%** per container



| Category      | Module Power | Piece per Pallet | Pallet NO. per Container | Power per Container |
|---------------|--------------|------------------|--------------------------|---------------------|
| Other Module  | 540W         | 31               | 20                       | 334,800W            |
| Vertex Module | 670W         | 31               | 18                       | 373,860W            |

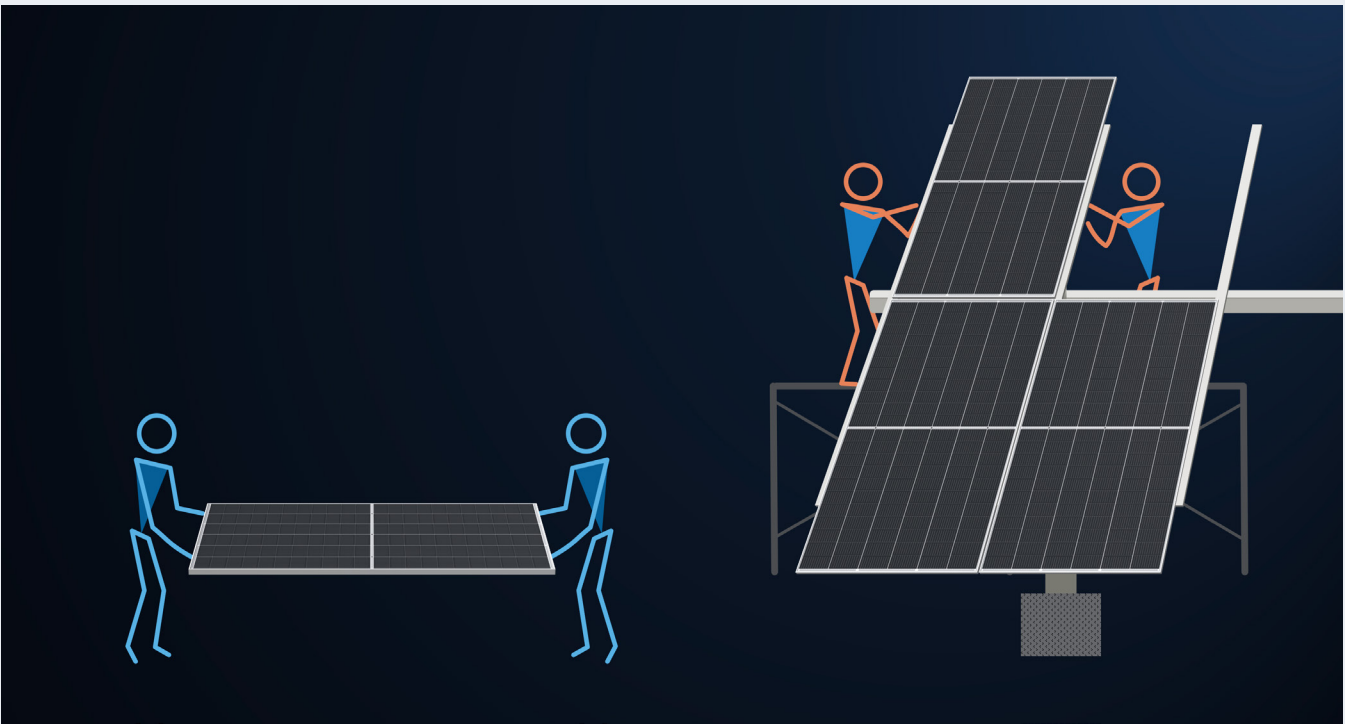
**+390,60W (+12%)**

Easy for unpacking and prevent module from falling down



Manual handling

4 crews/group, same staffing as traditional installation



**-24%**

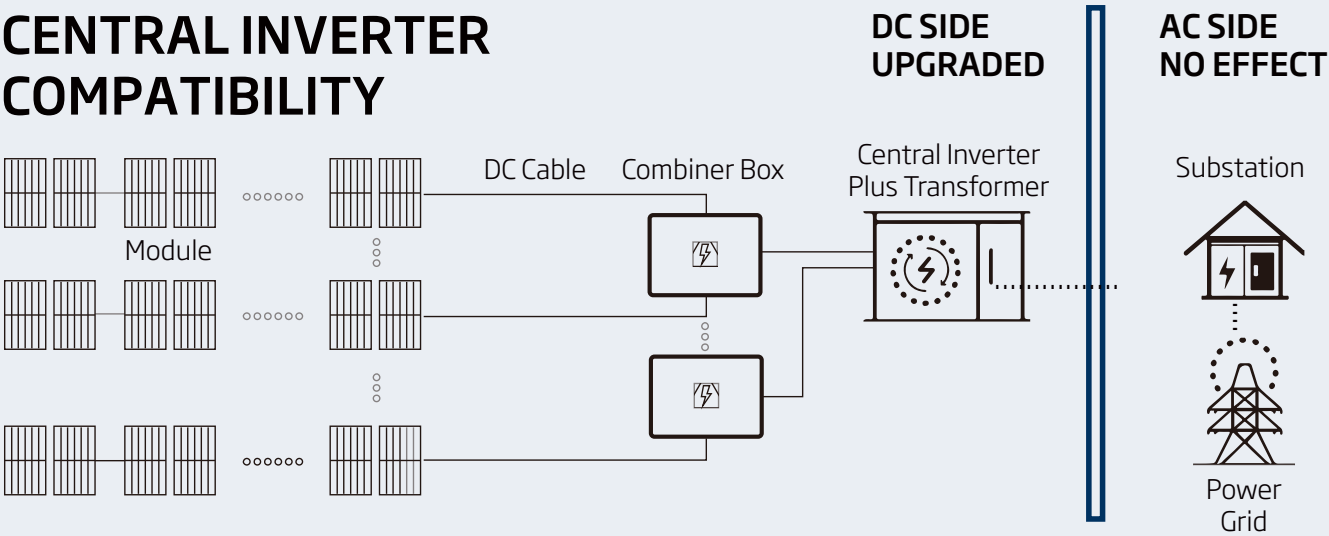
Module installation Quantity

**Installation cost reduction 5-7%**

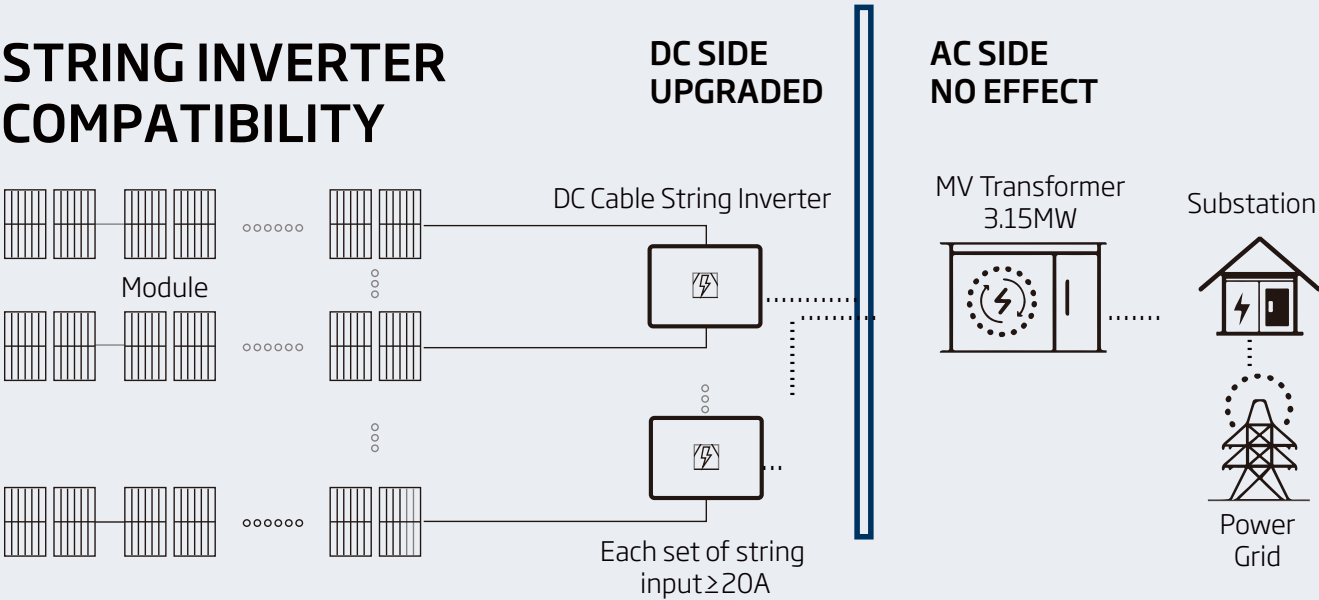
# ECOSYSTEM IS COMPLETELY IN PLACE

| TYPE         | BRAND                                       |         | MODULE                              |
|--------------|---------------------------------------------|---------|-------------------------------------|
| INVERTER     | Central                                     | SUNGROW | 1600/2500/3125KW                    |
|              | String                                      | SUNGROW | SG225HX/SG250HX                     |
|              |                                             | HUAWEI  | SUN2000-196KTL-H0/SUN2000-196KTL-H3 |
|              |                                             | SMA     | Sunny Tripower 150-20               |
|              |                                             | SINENG  | SP-225-H/SP-250K-H                  |
| COMBINER BOX | LongMax, Bentek, ConnectPV Shoals, SolarBOS |         | 1500V High Current                  |
| CABLE        | 4MM²/6MM²                                   |         |                                     |

## CENTRAL INVERTER COMPATIBILITY



## STRING INVERTER COMPATIBILITY



# MECHANICAL LOADING

Compatible with Fixed-tilt and Tracker

Frame design optimization

Conventional Module frame → 670W Vertex Module frame

Optimal Design:  
Optimized frame profile design;  
Strengthened material ;  
Reinforced supporting bar for backsheet module ;  
Excellent loading performance suits diversified scenarios.

**TÜVRheinland®**  
Precisely Right.

**IEC 61215, IEC 61730**  
Received certification in Jan 2021.

Fix-tilt

Tracker

Static loading +5400Pa/-2400Pa      Static loading +3600Pa/-2400Pa      Static loading +2400Pa/-2400Pa

| Company Name                     | Brand/Product Type                                                                                | 210 Modules |
|----------------------------------|---------------------------------------------------------------------------------------------------|-------------|
| Arctech Solar Holdings Co., Ltd. | Skyline/Skysmart II                                                                               | ✓           |
| Array Technologies Inc           | DuraTrack HZ v3                                                                                   | ✓           |
| GameChange Solar LP              | GENIUS TRACKER™ 1P/<br>GENIUS TRACKER™ 2P                                                         | ✓           |
| IDEEMATEC Deutschland GmbH       | H4PLUS™                                                                                           | ✓           |
| Nexttracker Inc.                 | Nexttracker products                                                                              | ✓           |
| PV HARDWARE SOLUTIONS, S.L.U     | Independent row: Monoline™<br>(all its versions 1V, 3H and 2V);<br>Multi-row: Axone™, Axone Duo™) | ✓           |
| SOLTEC ENERGIAS RENOVABLES S.L.  | SF7 & SF8                                                                                         | ✓           |
| Trina Solar Co., Ltd             | TrinaTracker<br>(Vanguard™/Agile™)                                                                | ✓           |
| FTC Solar                        | Voyager/Voyager+                                                                                  | ✓           |
| Soltigua                         | Soltigua products                                                                                 | ✓           |

Vertex Module Capacity in 2021

Module

50<sup>+</sup>GW

