

# Tiger Pro 60HC 440-460 Watt

### MONO-FACIAL MODULE

#### P-Type

Positive power tolerance of 0~+3%

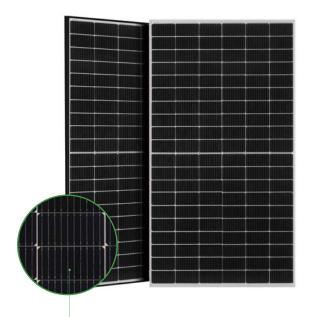
IEC61215(2016), IEC61730(2016)

ISO9001:2015: Quality Management System

ISO14001:2015: Environment Management System

ISO45001:2018

Occupational health and safety management systems



→ MBB HC Technology

## **Key Features**



#### Multi Busbar Technology

Better light trapping and current collection to improve module power output and reliability.



## Durability Against Extreme Environmental Conditions

High salt mist and ammonia resistance.



#### **Reduced Hot Spot Loss**

Optimized electrical design and lower operating current for reduced hot spot loss and better temperature coefficient.



#### **Enhanced Mechanical Load**

Certified to withstand: wind load (2400 Pascal) and snow load (5400 Pascal).



#### **PID Resistance**

Excellent Anti-PID performance guarantee via optimized mass-production process and materials control.



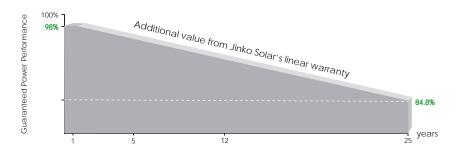








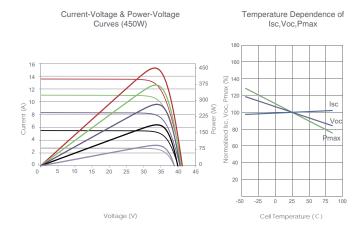
## LINEAR PERFORMANCE WARRANTY

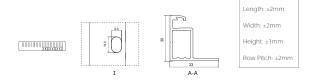


- **12** Year Product Warranty
- **25** Year Linear Power Warranty
- 0.55% Annual Degradation Over 25 years

#### **Engineering Drawings**

#### Electrical Performance & Temperature Dependence





#### **Packaging Configuration**

(Two pallets = One stack)

35pcs/pallets, 70pcs/stack, 840pcs/ 40'HQ Container

Mechanical Characteristics								
Cell Type	P type Mono-crystalline							
No. of cells	120 (6×20)							
Dimensions	1903×1134×30mm (74.92×44.65×1.18 inch)							
Weight	24.2 kg (53.35 lbs)							
Front Glass	3.2mm,Anti-Reflection Coating, High Transmission, Low Iron, Tempered Glass							
Frame	Anodized Aluminium Alloy							
Junction Box	IP68 Rated							
Output Cables	TUV 1×4.0mm <sup>-</sup> (+); 400mm , (-); 200mm or Customized Length							

SPECIFICATIONS											
Module Type	MM440-60HLD-MB MM440-60HLD-MBV		MM445-60HLD-MB MM445-60HLD-MBV		MM450-60HLD-MB MM450-60HLD-MBV		MM455-60HLD-MB MM455-60HLD-MBV		MM460-60HLD-MB MM460-60HLD-MBV		
	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	
Maximum Power (Pmax)	440Wp	327Wp	445Wp	331Wp	450Wp	335Wp	455Wp	339Wp	460Wp	342Wp	
Maximum Power Voltage (Vmp)	33.72V	31.39V	33.82V	31.56V	33.91V	31.73V	34.06V	31.91V	34.20V	32.07V	
Maximum Power Current (Imp)	13.05A	10.43A	13.16A	10.49A	13.27A	10.55A	13.36A	10.61A	13.45A	10.67A	
Open-circuit Voltage (Voc)	41.02V	38.72V	41.10V	38.79V	41.18V	38.87V	41.33V	39.01V	41.48V	39.15V	
Short-circuit Current (Isc)	13.73A	11.09A	13.79A	11.14A	13.85A	11.19A	13.93A	11.25A	14.01A	11.32A	
Module Efficiency STC (%)	20.39%		20.62%		20.85%		21.08%		21.32%		
Operating Temperature(°C)	-40°C~+85°C										
Maximum system voltage	1000/1500VDC (IEC)										
Maximum series fuse rating	25A										
Power tolerance	0~+3%										
Temperature coefficients of Pmax	-0.35%/°C										
Temperature coefficients of Voc	-0.28%/℃										
Temperature coefficients of Isc	0.048%/°C										
Nominal operating cell temperatu	operating cell temperature (NOCT) 45±2°C										













