

CERTIFICATE

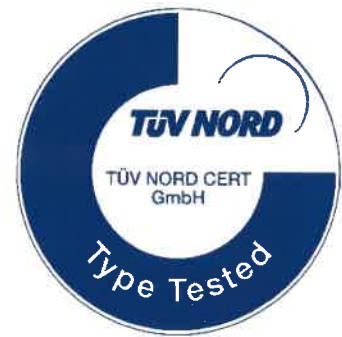
TÜV NORD CERT GmbH
herewith declares that

JINNENG CLEAN ENERGY TECHNOLOGY LTD.
No.1 Wenshui Economic Development Zone
Lvliang, Shanxi, 032100
China

is authorized to provide the product mentioned below with the mark as illustrated:

Description of product (details see Annex 2):

Crystalline Silicon Terrestrial Photovoltaic (PV) Modules



Valid from: 2024-05-07

Valid until: 2028-07-22

Certification program:	P12-VA-01 Rev. 17 09.20
Certification fundamental(s):	IEC / EN 61215-1:2016; IEC / EN 61215-1-1:2016; IEC 61215-2:2016 / EN 61215-2:2017 + AC:2017 + AC:2018; IEC 61730-1:2016 / EN IEC 61730-1:2018 + AC:2018; IEC 61730-2:2016 / EN IEC 61730-2:2018 + AC:2018.
Registered No.:	44 780 20 406749 - 011R9M12
Manufacturer:	see Annex 1
Test Report No.:	492011072.017
File No.:	PVP07125/23P-01



TÜV NORD CERT GmbH
Certification Body
Consumer Products

Essen, 2024-05-07

Please also pay attention to the information stated overleaf.



Manufacturer: **JINNENG CLEAN ENERGY TECHNOLOGY LTD.**
No.1 Wenshui Economic Development Zone
Lvliang, Shanxi, 032100, China

Factory 1: **JINNENG CLEAN ENERGY TECHNOLOGY LTD.**
No.1 Wenshui Economic Development Zone
Lvliang, Shanxi, 032100, China

Factory inspection report no.: 862010249.010

Factory 2: **Jinneng Photovoltaic Technology Ltd.**
No. 533 East Guo'an Street Green-car Park Jinzhong Development

Park, Demonstrative Zone of Shanxi Comprehensive Reform,
Jinzhong City, Shanxi Province, 030600, P.R. China



TÜV NORD CERT GmbH
Certification Body
Consumer Products

Description of product(s):

Aktenzeichen: / File reference: PVP07125/23P-01

2024-05-07

Module types:	Double Glass PV Modules with 6" Mono Heterojunction Bifacial Solar Cells: 72 cells: JNHM72-xxx (xxx = 330-390, in increment of 5) 60 cells: JNHM60-xxx (xxx = 275-325, in increment of 5) Remark: xxx only indicates maximum power output of the front side.
Maximum system voltage:	1500V
Fuse rating:	15A
Electrical protection class:	Class II
Pollution degree:	1
Material group:	I
Design load (positive / negative):	3600Pa / 1600Pa
Safety factors:	1.5



TÜV NORD CERT GmbH
Certification Body
Consumer Products

Module types:	Double Glass PV Modules with 6" Mono Bifacial Solar Cells: 72 cells: JNBM72-xxx (xxx = 360-390, in increment of 5) 60 cells: JNBM60-xxx (xxx = 300-325, in increment of 5) Remark: xxx only indicates maximum power output of the front side.
Maximum system voltage:	1500V
Fuse rating:	15A
Electrical protection class:	Class II
Pollution degree:	1
Material group:	I
Design load (positive / negative):	3600Pa / 1600Pa
Safety factors:	1.5
Fire safety class:	Class C according to ANSI/UL 1703-2018 (as per ANSI/UL 790-2018)



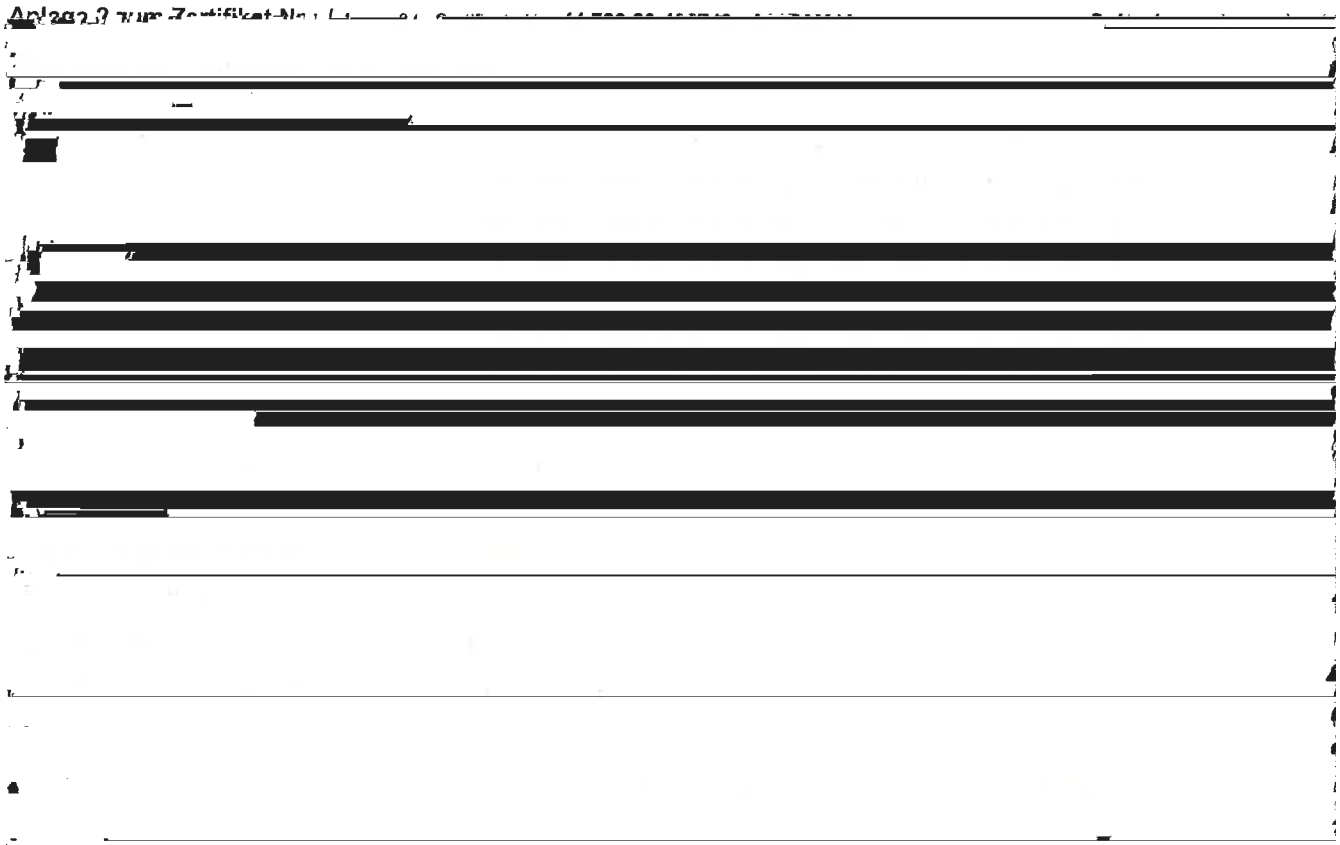
TÜV NORD CERT GmbH
Certification Body
Consumer Products

Module types:	Double Glass PV Modules with 7" Half-cut Mono Bifacial Solar Cells: 156 cells: JNBM156-xxx (xxx = 565-605, in increment of 5) 144 cells: JNBM144-xxx (xxx = 520-560, in increment of 5) 132 cells: JNBM132-xxx (xxx = 475-510, in increment of 5) 120 cells: JNBM120-xxx (xxx = 435-465, in increment of 5) 108 cells: JNBM108-xxx (xxx = 390-420, in increment of 5) 96 cells: JNBM96-xxx (xxx = 345-370, in increment of 5) Remark: xxx only indicates maximum power output of the front side.
Maximum system voltage:	1500V
Fuse rating:	30A
Electrical protection class:	Class II
Pollution degree:	1
Material group:	I
Design load (positive / negative):	3600Pa / 1600Pa
Safety factors:	1.5
Fire safety class:	Class C according to ANSI/UL 1703-2018 (as per ANSI/UL 790-2018)

Module types:	Double Glass PV Modules with 8" Half-cut Mono Bifacial Solar Cells: 132 cells: JNBM132-xxx (xxx = 630-670, in increment of 5) 120 cells: JNBM120-xxx (xxx = 575-610, in increment of 5) Remark: xxx only indicates maximum power output of the front side.
---------------	--



TÜV NORD CERT GmbH
Certification Body
Consumer Products



Aktenzeichen: / File reference: PVP07125/23P-01

2024-05-07

Module types: **Double Glass PV Modules with 7" Half-cut Mono Bifacial Solar Cells:**
156 cells: JNBN156-xxx (xxx = 565-635, in increment of 5)
144 cells: JNBN144-xxx (xxx = 520-610, in increment of 5)
132 cells: JNBN132-xxx (xxx = 480-560, in increment of 5)
120 cells: JNBN120-xxx (xxx = 435-505, in increment of 5)
108 cells: JNBN108-xxx (xxx = 390-455, in increment of 5)
96 cells: JNBN96-xxx (xxx = 350-405, in increment of 5)
Remark: xxx only indicates maximum power output of the front side.

Maximum system voltage: 1500V
Fuse rating: 30A
Electrical protection class: Class II
Pollution degree: 1
Material group: 1



TÜV NORD CERT GmbH
Certification Body
Consumer Products

Aktenzeichen: / File reference: PVP07125/23P-01

2024-05-07

Module types: **Double Glass PV Modules with 6" Mono-crystalline Silicon Solar Cells:**
72 cells: JNGM72-xxx (xxx = 340-380, in increment of 5)
60 cells: JNGM60-xxx (xxx = 285-315, in increment of 5)
48 cells: JNGM48-xxx (xxx = 225-250, in increment of 5)
Remark: xxx only indicates maximum power output of the front side.

Maximum system voltage: 1500V
Fuse rating: 15A
Electrical protection class: Class II
Pollution degree: 1
Material group: I
Design load (positive / negative): 3600Pa / 1600Pa (without frame)
3600Pa / 2400Pa (with frame)

Safety features:

1-5

Fire safety class: Class C according to ANSI/UL 1703-2018 (as per ANSI/UL 790-2018)

Module types: **Double Glass PV Modules with 6" Poly-crystalline Silicon Solar Cells:**
72 cells: JNGP72-xxx (xxx = 305-340, in increment of 5)
60 cells: JNGP60-xxx (xxx = 255-285, in increment of 5)
48 cells: JNGP48-xxx (xxx = 205-225, in increment of 5)
Remark: xxx only indicates maximum power output of the front side.

Maximum system voltage: 1500V
Fuse rating: 15A
Electrical protection class: Class II
Pollution degree: 1



TUV NORD CERT GmbH
Certification Body
Consumer Products

Module types:

Double Glass PV Modules with 8" Half-cut TOPCon Mono Bifacial Solar Cells:

132 cells: JNBN132-xxx (xxx = 670-710, in increment of 5)

120 cells: JNBN120-xxx (xxx = 610-645, in increment of 5)

Remark: xxx only indicates maximum power output of the front side.

Maximum system voltage: 1500V

Fuse rating: 35A

Electrical protection class: Class II

Pollution degree: 1

Material group: I

Design load (positive / negative): 3600Pa / 1600Pa

Safety factors: 1.5

Fire safety class: Class C according to ANSI/UL 1703-2018 (as per ANSI/UL 790-2018)

Remark:

For detailed product information, please refer to CDF (Constructional Data Form).



TÜV NORD CERT GmbH
Certification Body
Consumer Products