

# INFO Fotovoltaické panely LONGI

Hi-MO 4m | LR4-72HPH  
**425-455M**

**LONGI**

- vhodné pro rezidenční výstavbu
- vysoká účinnost konverze až 20,9%
- díky technologii Low LID Mono PERC je zajištěna pomalejší degradace výkonu: první rok 2 %, 0,55 % rok 2-25
- vynikající výkon při výrobě energie
- vysoká kvalita modulu zajišťuje dlouhodobou spolehlivost
- solidní odolnost PID zajištěná optimalizací procesu solárních článků a pečlivým výběrem modulu BOM
- snížená odporová ztráta s nižším provozním proudem
- vyšší energetický zisk při nižší provozní teplotě
- snížené riziko hot-spotů díky novější konstrukci a nižšímu provoznímu proudu

**Hi-MO 4m**

**LR4-72HPH 425-455M**

**20,9%**  
MAX MODULE  
EFFICIENCY

**0-+5W**  
POWER  
TOLERANCE

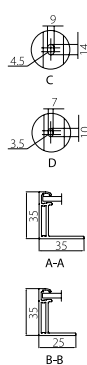
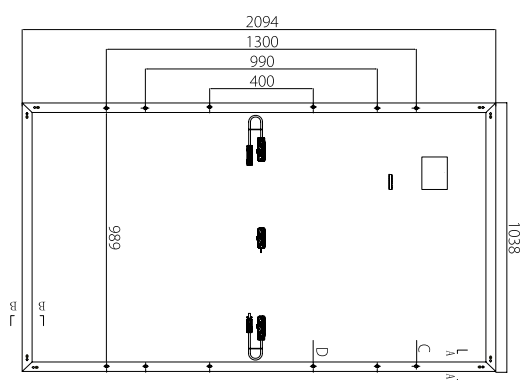
**<2%**  
FIRST YEAR  
POWER DEGRADATION

**0,55%**  
YEAR 2-25  
POWER DEGRADATION

**HALF-CELL**  
Lower operating temperature

**Záruka 12 let na materiál a zpracování | Záruka 25 let na lineární výkon**

## Design (mm)

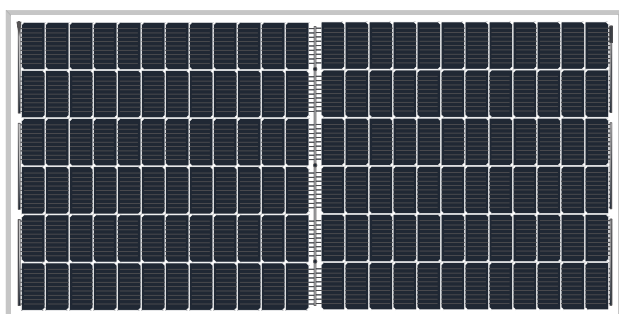


## Mechanical parameters

Cell Orientation: 144 (6×24)  
Junction Box: IP68, three diodes  
Output Cable: 4mm<sup>2</sup>, 300mm in length,  
length can be customized  
Glass: Single glass  
3.2mm coated tempered glass  
Frame: Anodized aluminum alloy frame  
Weight: 23.5kg  
Dimension: 2094×1038×35mm  
Packaging: 30pcs per pallet  
150pcs per 20'GP  
660pcs per 40'HC

## Operating parameters

Operational Temperature: -40 C ~ +85 C  
Power Output Tolerance: 0 ~ +5 W  
Voc and Isc Tolerance: ±3%  
Maximum System Voltage: DC1500V (IEC/UL)  
Maximum Series Fuse Rating: 20A  
Nominal Operating Cell Temperature: 45±2 C  
Safety Class: Class II  
Fire Rating: UL type 1 or 2



## Electrical Characteristics

Test uncertainty for Pmax: ±3%

Model Number	LR4-72HPH-425M		LR4-72HPH-430M		LR4-72HPH-435M		LR4-72HPH-440M		LR4-72HPH-445M		LR4-72HPH-450M		LR4-72HPH-455M	
Testing Condition	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT	STC	NOCT
Maximum Power (Pmax/W)	425	317.4	430	321.1	435	324.9	440	328.6	445	332.3	450	336.1	455	339.8
Open Circuit Voltage (Voc/V)	48.3	45.3	48.5	45.5	48.7	45.7	48.9	45.8	49.1	46.0	49.3	46.2	49.5	46.4
Short Circuit Current (Isc/A)	11.23	9.08	11.31	9.15	11.39	9.21	11.46	9.27	11.53	9.33	11.60	9.38	11.66	9.43
Voltage at Maximum Power (Vmp/V)	40.5	37.7	40.7	37.9	40.9	38.1	41.1	38.3	41.3	38.5	41.5	38.6	41.7	38.8
Current at Maximum Power (Imp/A)	10.50	8.42	10.57	8.47	10.64	8.53	10.71	8.59	10.78	8.64	10.85	8.70	10.92	8.75
Module Efficiency(%)	19.6		19.8		20.0		20.2		20.5		20.7		20.9	

STC (Standard Testing Conditions): Irradiance 1000W/m<sup>2</sup>, Cell Temperature 25 °C, Spectra at AM1.5

NOCT (Nominal Operating Cell Temperature): Irradiance 800W/m<sup>2</sup>, Ambient Temperature 20 °C, Spectra at AM1.5, Wind at 1m/S

## Temperature Ratings (STC)

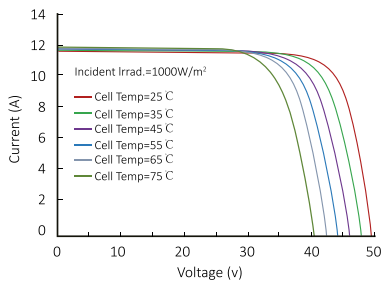
Temperature Coefficient of Isc	+0.048%/°C
Temperature Coefficient of Voc	-0.270%/°C
Temperature Coefficient of Pmax	-0.350%/°C

## Mechanical Loading

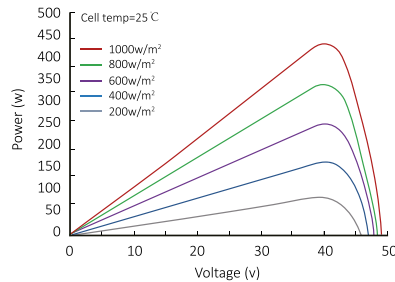
Front Side Maximum Static Loading	5400Pa
Rear Side Maximum Static Loading	2400Pa
Hailstone Test	25mm Hailstone at the speed of 23m/s

## I-V Curve

Current-Voltage Curve (LR4-72HPH-440M)



Power-Voltage Curve (LR4-72HPH-440M)



Current-Voltage Curve (LR4-72HPH-440M)

