# **BYD** Polycrystal Silicone Dual Glass Modules

## BYD-P6D-30 255W-280W

BYD, the first company in the world, encapsulate polycrystal cells with **silicone** and dual glass. Silicone Dual glass Module has longer lifetime due to unique design strcture. It can be applied to high-humidity areas (such as water surface, tidal flat), strong sand area (such as desert, wasteland), extremely cold areas and roof.

IEC 61215, IEC 61730
ISO9001:2008, ISO14001:2004

### Additional Power Generation Gain

Silicone without UV blockers which allows silicone dual glass module can generates power with UV portion.

### Excellent Low Temperature Performance

Lower glass transition temperature than EVA and POE guarantees silicone keep elastic and can protect cells from cracking even under -40℃.
Suitable for use in extremely cold areas.

### Excellent High Temperature Performance

Unlike EVA and POE capsulation, silicone won't undergo secondary crosslinking.
Suitable for use in high temperature regions.

### Double Protection from Moisture

Polyiso-butylene(PIB) as sealant with extreme low moisture transimission rate.
Suitable for use in high-humidity areas (such as water surface, tidal flat).

### ZERO PID (Potential Induced Degradation)

Silicone with high volume resistance and dual glass design, PID free.

### Longer Lifetime

Silicones are virtually unaffected by ultraviolet light or ozone and maintain their performance for decades.

### Higher Security

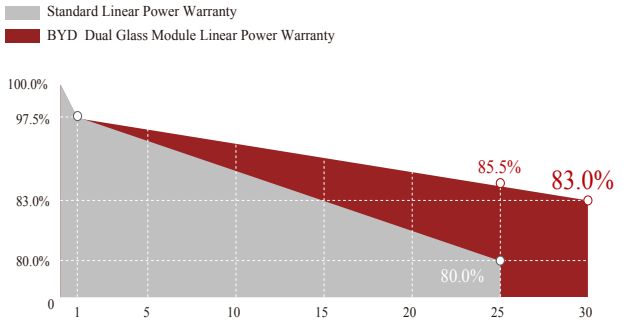
Fire Class A and Type 3 / Type 10 to minimize fire risks.

### Excellent Mechanical Properties

Withstand 3600Pa wind load and 5400Pa snow Load and no micro-cracks.

**10 YEARS** Product warranty on materials and workmanship

**30 YEARS** Power output warranty




BYD (HK:1211), one of the world's top PV manufacturers, produces from wafer to module, committing to high quality sustainable products and continuous improvement. Integrating with Photovoltaic Modules, Electrical Vehicles and Battery Energy Storage technology makes BYD the world-leading solution provider from energy generating to consumption and storage.

# BYD P6D-30 255W-280W

Silicone Dual glass module

## Electrical Properties (Front)*

| | | | | | | |
|---|---|---|---|---|---|---|
| Peak Power (Pmax) (W) | 255 | 260 | 265 | 270 | 275 | 280 |
| Open Circuit Voltage (Voc)(V) | 38.07 | 38.38 | 38.69 | 39.00 | 39.31 | 39.62 |
| Short Circuit Current (Isc) (A) | 8.89 | 8.97 | 9.05 | 9.13 | 9.21 | 9.29 |
| MPP Voltage (Vmp) (V) | 30.04 | 30.67 | 30.92 | 31.18 | 31.43 | 31.68 |
| MPP Current (Imp) (A) | 8.39 | 8.48 | 8.57 | 8.66 | 8.75 | 8.84 |
| Module Efficiency (%) | 15.8% | 16.1% | 16.4% | 16.7% | 17.0% | 17.4% |
| Encapsulation Material | Silicone | | | | | |
| Operating Temperature ( C ) | -40 C~+85 C | | | | | |
| Maximum System Voltage (V) | 1500(IEC) | | | | | |
| Maximun Series Fuse Rating (A) | 15 | | | | | |
| Safety Class | Class II | | | | | |
| Power Tolerance | 0~+5Wp | | | | | |

* Under Standard Test Conditions (STC) of irradiance of 1000 W/m², spectrum AM 1.5 and cell temperature of 25°C.

## Electrical Properties | NMOT *

| | | | | | | |
|---|---|---|---|---|---|---|
| Peak Power (Pmax) (W) | 191 | 195 | 198 | 202 | 206 | 209 |
| Open Circuit Voltage (Voc)(V) | 35.5 | 35.8 | 36.1 | 36.4 | 36.7 | 37.0 |
| Short Circuit Voltage (Isc)(A) | 7.20 | 7.26 | 7.33 | 7.39 | 7.45 | 7.52 |
| MPP Volatge (Vmp) (V) | 34.6 | 34.9 | 35.1 | 35.3 | 35.6 | 35.7 |
| Mpp Current (Imp) (A) | 6.70 | 6.77 | 6.83 | 6.90 | 6.96 | 7.02 |

* Under Nominal Module Operating Temperature (NMOT), irradiance of 800 W/m², spectrum AM 1.5, ambient temperature 20°C, wind speed 1m/s.

## Temperature Coefficient

| | |
|---|---|
| TemP. Coeff. of Pmax (TK Pmax) | -0.37%/℃ |
| TemP. Coeff. of Voc (TK Voc) | -0.3%/℃ |
| TemP. Coeff. of Isc (TK Isc) | +0.066%/℃ |
| NMOT | 43±2℃ |

## Mechanical Properties

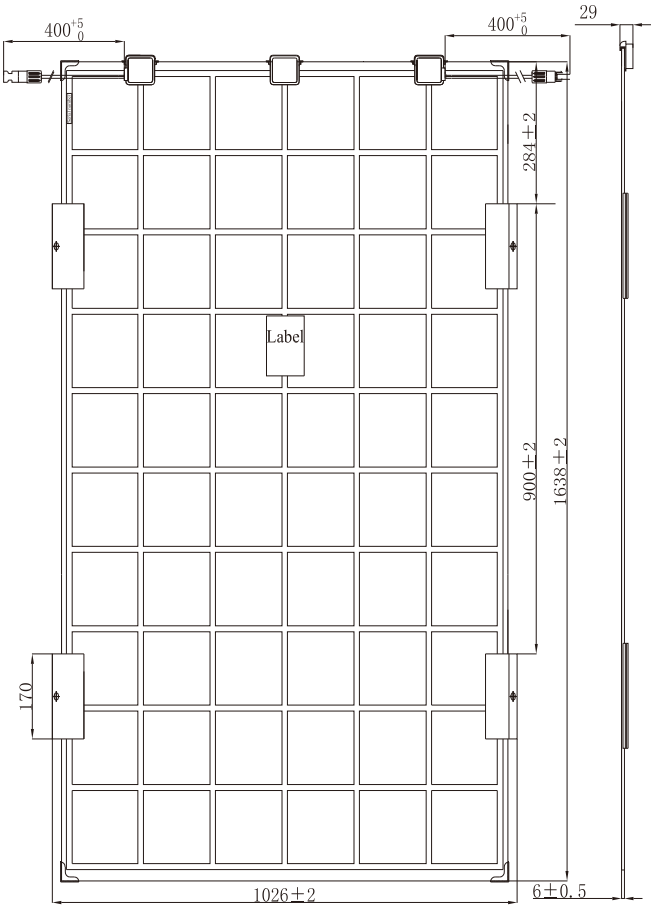
| | |
|---|---|
| Cell Type | 156.75mm*156.75mm |
| Number of Cells | 60pcs(6*10) |
| Diension | 1638mm*985mm*6mm |
| Weight | 23.0Kg |
| Front/Rear Glass | 2.5mm/2.5mm |
| Frame | Frameless |
| Junction Box | IP67(3 Diodes) |
| Cable Type | 4.0mm² 400mm |
| Connector | MC4 Compatible |

## Packing Information

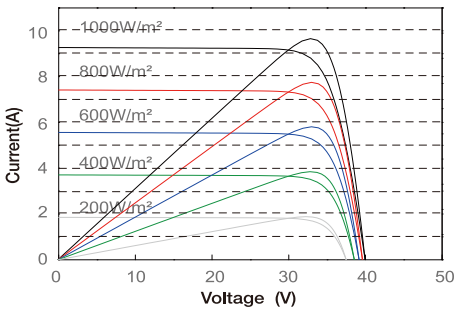
| | |
|---|---|
| Packing Type | 40'HQ |
| Piece/Pallet | 31 |
| Pallet/Container | 26 |
| Piece/Container | 806 |

## Mechanical Properties

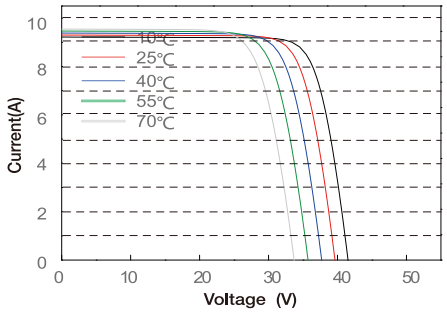
| | |
|---|---|
| Front Snow Load | 5400Pa |
| Rear Wind Load | 3600Pa |
| Hail Test | Diameter 25mm, Velocity23m/s |




Current-Voltage Curve under different irradiance >BYD-P6D-30-275




Current-Voltage Curve under different working temperatures > BYD-P6D-30-275





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