

**BiHiKu7** 

**MORE POWER** 

**BIFACIAL MONO PERC** 

635 W ~ 660 W

# CanadianSolar

# FRONT BACK



Module power up to 660 W Module efficiency up to 21.2 %

Up to 8.9 % lower LCOE Up to 4.6 % lower system cost

Comprehensive LID / LeTID mitigation technology, up to 50% lower degradation

CS7N-635 | 640 | 645 | 650 | 655 | 660MB-AG

Compatible with mainstream trackers, cost effective product for utility power plant

Better shading tolerance

# **MORE RELIABLE**

40 °C lower hot spot temperature, greatly reduce module failure rate

Minimizes micro-crack impacts

Heavy snow load up to 5400 Pa, wind load up to 2400 Pa\*

\* For detailed information, please refer to the Installation Manual.

12 Years **Enhanced Product Warranty on Materials** and Workmanship\*



Linear Power Performance Warranty\*

1st year power degradation no more than 2% Subsequent annual power degradation no more than 0.45%

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\*According to the applicable Canadian Solar Limited Warranty Statement.

### **MANAGEMENT SYSTEM CERTIFICATES\***

ISO 9001:2015 / Quality management system ISO 14001:2015 / Standards for environmental management system ISO 45001: 2018 / International standards for occupational health & safety

## **PRODUCT CERTIFICATES\***

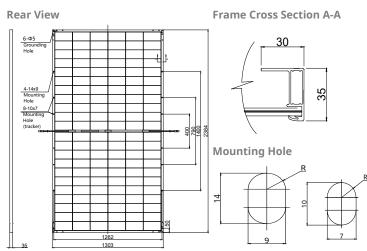
IEC 61215 / IEC 61730 / INMETRO / UKCA UL 61730 / IEC 61701 / IEC 62716 / IEC 60068-2-68 Take-e-way



\* The specific certificates applicable to different module types and markets will vary, and therefore not all of the certifications listed herein will simultaneously apply to the products you order or use. Please contact your local Canadian Solar sales representative to confirm the specific certificates available for your Product and applicable in the regions in which the products will be used.

CSI Solar Co., Ltd. is committed to providing high quality solar products, solar system solutions and services to customers around the world. Canadian Solar was recognized as the No. 1 module supplier for guality and performance/price ratio in the IHS Module Customer Insight Survey, and is a leading PV project developer and manufacturer of solar modules, with over 55 GW deployed around the world since 2001.

### **ENGINEERING DRAWING (mm)**



### **ELECTRICAL DATA | STC\***

		Nominal Max. Power (Pmax)		Opt. Operating Current (Imp)		Short Circuit Current (Isc)	Module Efficiency
CS7N-635MB-AG		635 W	37.3 V	17.03 A	44.4 V	18.27 A	20.4%
Bifacial Gain**	5%	667 W	37.3 V	17.89 A	44.4 V	19.18 A	21.5%
	10%	699 W	37.3 V	18.74 A	44.4 V	20.10 A	22.5%
	20%	762 W	37.3 V	20.44 A	44.4 V	21.92 A	24.5%
CS7N-640MB-AG		640 W	37.5 V	17.07 A	44.6 V	18.31 A	20.6%
Bifacial Gain**	5%	672 W	37.5 V	17.92 A	44.6 V	19.23 A	21.6%
	10%	704 W	37.5 V	18.78 A	44.6 V	20.14 A	22.7%
	20%	768 W	37.5 V	20.48 A	44.6 V	21.97 A	24.7%
CS7N-645N	/IB-AG	645 W	37.7 V	17.11 A	44.8 V	18.35 A	20.8%
	5%	677 W	37.7 V	17.97 A	44.8 V	19.27 A	21.8%
Bifacial Gain**	10%	710 W	37.7 V	18.84 A	44.8 V	20.19 A	22.9%
	20%	774 W	37.7 V	20.53 A	44.8 V	22.02 A	24.9%
CS7N-650MB-AG		650 W	37.9 V	17.16 A	45.0 V	18.39 A	20.9%
Bifacial Gain**	5%	683 W	37.9 V	18.03 A	45.0 V	19.31 A	22.0%
	10%	715 W	37.9 V	18.88 A	45.0 V	20.23 A	23.0%
	20%	780 W	37.9 V	20.59 A	45.0 V	22.07 A	25.1%
CS7N-655MB-AG		655 W	38.1 V	17.20 A	45.2 V	18.43 A	21.1%
Bifacial Gain**	5%	688 W	38.1 V	18.06 A	45.2 V	19.35 A	22.1%
	10%	721 W	38.1 V	18.93 A	45.2 V	20.27 A	23.2%
	20%	786 W	38.1 V	20.64 A	45.2 V	22.12 A	25.3%
CS7N-660MB-AG		660 W	38.3 V	17.24 A	45.4 V	18.47 A	21.2%
Bifacial Gain**	5%	693 W	38.3 V	18.10 A	45.4 V	19.39 A	22.3%
	10%	726 W	38.3 V	18.96 A	45.4 V	20.32 A	23.4%
	20%	792 W	38.3 V	20.69 A	45.4 V	22.16 A	25.5%
* Under Standard Test Conditions (STC) of irradiance of 1000 W/m², spectrum AM 1.5 and cell							

temperature of 25°C.

\*\* Bifacial Gain: The additional gain from the back side compared to the power of the front side at the standard test condition. It depends on mounting (structure, height, tilt angle etc.) and albedo of the ground.

## **ELECTRICAL DATA**

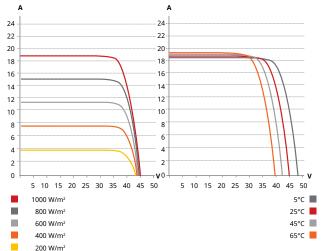
Operating Temperature	-40°C ~ +85°C
Max. System Voltage	1500 V (IEC/UL) or 1000 V (IEC/UL)
Module Fire Performance	TYPE 29 (UL 61730) or CLASS C (IEC61730)
Max. Series Fuse Rating	35 A
Application Classification	Class A
Power Tolerance	0 ~ + 10 W
Power Bifaciality*	70 %
* Power Bifaciality = Pmax / Pm	ax both Pmax and Pmax, are tested under STC. Bifaciality

\* Power Bifaciality =  $Pmax_{rear}$  /  $Pmax_{front}$ , both  $Pmax_{rear}$  and  $Pmax_{front}$  are tested under STC, Bifaciality Tolerance:  $\pm$  5 %

\* The specifications and key features contained in this datasheet may deviate slightly from our actual products due to the on-going innovation and product enhancement. CSI Solar Co., Ltd. reserves the right to make necessary adjustment to the information described herein at any time without further notice.

Please be kindly advised that PV modules should be handled and installed by qualified people who have professional skills and please carefully read the safety and installation instructions before using our PV modules.

### CS7N-650MB-AG / I-V CURVES



### **ELECTRICAL DATA | NMOT\***

	Nominal Max. Power (Pmax)	Opt. Operating Voltage (Vmp)	Opt. Operating Current (Imp)	Open Circuit Voltage (Voc)	Short Circuit Current (Isc)
CS7N-635MB-AG	476 W	35.0 V	13.61 A	42.0 V	14.73 A
CS7N-640MB-AG	480 W	35.2 V	13.64 A	42.2 V	14.77 A
CS7N-645MB-AG	484 W	35.3 V	13.72 A	42.3 V	14.80 A
CS7N-650MB-AG	487 W	35.5 V	13.74 A	42.5 V	14.83 A
CS7N-655MB-AG	491 W	35.7 V	13.76 A	42.7 V	14.86 A
CS7N-660MB-AG	495 W	35.9 V	13.79 A	42.9 V	14.89 A
* Under Nominal Module Operating Temperature (NMOT), irradiance of 800 W/m <sup>2</sup>					

spectrum AM 1.5, ambient temperature 20°C, wind speed 1 m/s.

# **MECHANICAL DATA**

Specification	Data
Cell Type	Mono-crystalline
Cell Arrangement	132 [2 x (11 x 6) ]
Dimensions	2384 × 1303 × 35 mm (93.9 × 51.3 × 1.38 in)
Weight	37.9 kg (83.6 lbs)
Front / Back Glass	2.0 mm heat strengthened glass
Frame	Anodized aluminium alloy
J-Box	IP68, 3 diodes
Cable	4.0 mm² (IEC), 10 AWG (UL)
Cable Length (Including Connector)	460 mm (18.1 in) (+) / 340 mm (13.4 in) (-) (supply additional jumper cable: 2 lines / Pallet) or customized length*
Connector	T4 series or MC4-EVO2
Per Pallet	31 pieces

Per Container (40' HQ) 527 pieces or 465 pieces (only for US) \* For detailed information, please contact your local Canadian Solar sales and technical representatives.

## **TEMPERATURE CHARACTERISTICS**

Specification	Data
Temperature Coefficient (Pmax)	-0.34 % / °C
Temperature Coefficient (Voc)	-0.26 % / °C
Temperature Coefficient (Isc)	0.05 % / °C
Nominal Module Operating Temperature	41 ± 3°C

# PARTNER SECTION