The new high performance champion



25 LG

Product and Performance Warranty

Up to 400 Watts Contactless cellfront Aesthetic Design





# LG NeON® R – performance & design with passion

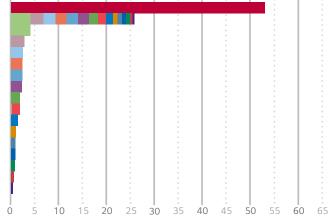
The LG NeON® R is the new high-performance solar module from LG. Its aesthetic design and outstanding performance of up to 400 Wp is a valuable addition to any roof. The 60 cell solar module can endure a static front load up to 6,000Pa, has an expanded product warranty of 25 years and a once-again improved linear performance warranty.

### Local quarantor, global security

LG Solar is part of LG Electronics, a global and financially strong company, with over 60 years of experience.

Good to know: LG Electronics is the warrantor for your solar modules.

The Warrantor's 2019 Global Sales in Billions of US Dollars



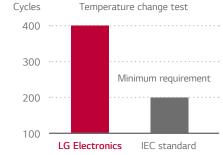
LG Electronics \$53.0bn All below combined \$26.2bn Jinko Solar \$4.1bn JA Solar\* \$2.8bn LONGi \$2.5bn Canadian Solar \$2.4bn Trina Solar\* \$2.4bn Hanwha Q Cells\* \$2.3bn First Solar \$1.9bn \$1.8bn Risen Energy' Sunpower/Maxeon \$1.4bn Astronergy\* \$1.0bn Talesun Solar\* \$0.9bn \$0.9bn Suntech Power GCLSI\* \$0.8bn Panasonic\* \$0.6bn REC Group\* \$0.4hn

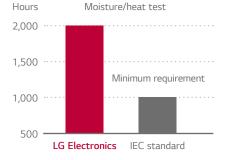
\*2019 Annual Financial Statements

### Excellent quality, independently tested

You can rely on LG. We test our products with double the intensity specified in the IEC standard. This quality is valued by installers across Europe, which is why they have awarded our LG solar

modules the Top Brand PV stamp of quality for the highest recommendationrates for the eighth time in a row.





## Strong design, powerful performance

The busbars on the LG NeON® R were mounted on the rear of the cells to expose the entire front side to light and therefore generate more electricity. LG creates an innovative and aesthetic cell design by incorporating 30 rear-side busbars instead of the standard busbars on the cell front, a revolutionary approach that guarantees outstanding module performance.

# Powerful design, guaranteed robust (LG Standard)\*

TOP BRAND PV

2021

With reinforced frame design, LG NeON® R can endure a front load up to 6,000Pa (represents snow height of normal snow of more than 1.8 meters) and a rear load up to 5,400Pa (represents wind speed of up to 93 m/s, compare max. wind speed of Hurricane Katrina 2005 of max. 75 m/s).



Module fully complies with the new IEC 61215-2: 2016 test procedures which confirmed 5.400 Pa front and 4.000 Pa rear side load. LG made internal tests to confirm 6.000 Pa front and 4.000 Pa rear side load also with new IEC 61215-2: 2016 norms. Further tests are on-going. Unless these tests turn out differently, LG confirms 6.000 Pa / 5.400 Pa \*\*1) First year: min. 98,5%. 2) From 2nd year: max. 0.25% annual degradation. 3) 25 years: 92.5%.

LG NeON®R

400W | 395W | 390W

# 60 cell

LG NeON® R is a powerful product with global top level performance. Applied new cell structure without electrodes on the front, LG NeON® R maximized the utilization of light and enhanced its reliability LG NeON® R demonstrates LG's efforts to increase customer's values beyond efficiency. It features enhanced warranty, durability, performance under real environment, and aesthetic design suitable for roofs.







### **Key Features**



#### **Enhanced Performance Warranty**

LG NeON® R has an enhanced performance warranty. After 25 years, LG NeON® R is guaranteed at least 92.5% of initial performance.



#### Aesthetic Roof

LG NeON® R has been designed with aesthetics in mind: no electrode on the front that makes new product more aesthetic. LG NeON® R can increase the value of a property with its modern design.



#### Better Performance on a Sunny Day

LG NeON® R now performs better on a sunny days thanks to its improved temperature coefficient.



#### **High Power Output**

The LG NeON® R has been designed to significantly enhance its output making it efficient even in limited space.

No Metal on the Front



#### **Outstanding Durability**

With its newly reinforced frame design, LG NeON® R can endure a front load up to 6,000Pa, and a rear load up to 5,400Pa.



#### 25 Years Product Warranty

In addition to the extended performance guarantee LG also offers a strong product guarantee for 25 years.

#### **About LG Electronics**

#### **Mechanical Properties**

6 x 10			
LG			
Monocrystalline / N-type			
1,740 x 1,042 x 40mm			
6,000Pa			
5,400Pa			
18.5 kg			
MC4 / Stäubli			
IP68 with 3 Bypass Diodes			
1,250 mm x 2 ea			
Tempered Glass with AR Coating			
Anodized Aluminium			

Manufacturer Declaration according to IEC 61215 : 2005 #Mechanical Test Loads 5400 Pa / 4000 Pa based on IEC61215-2 : 2016 (Test Load = Design Load x Safety Factor (1.5))

#### **Certifications and Warranty**

Certifications and warranty	ons and vvarranty		
	IEC 61215-1/-1-1/2: 2016, IEC 61730-1/2: 2016		
Certifications	IEC 61701:2011 Severity 6 (Salt mist corrosion test)		
	IEC 62716:2013 (Ammonia corrosion test)		
	ISO 9001, ISO 14001, ISO 50001 ,OHSAS 18001		
Module Fire Performance	Class C		
Product Warranty	25 Years		
Output Warranty of Pmax	25 years linear warranty <sup>1</sup>		

<sup>11)</sup> First year 98,5%. 2) after 2nd year: 0,25 annual degradation 3) 25 years: min 92,5%

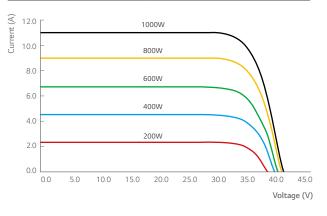
#### **Temperature Characteristics**

NMOT	[°C]	44 ± 3
Pmax	[%/°C]	-0.29
Voc	[%/°C]	-0.24
Isc	[%/°C]	0.04

#### **Packaging Configuration**

Number of Modules Per Pallet	[EA]	25
Number of Modules Per 40ft HQ Container	[EA]	650
Packaging Box Dimensions (LxWxH)	[mm]	1,790 x 1,120 x 1,213
Packaging Box Gross Weight	[kg]	498

#### Characteristic Curves



#### Electrical Properties (STC3)

Model		LG400Q1C-A6	LG395Q1C-A6	LG390Q1C-A6
Maximum Power (Pmax)	[W]	400	395	390
MPP Voltage (Vmpp)	[V]	37.2	37.0	36.7
MPP Current (Impp)	[A]	10.76	10.69	10.63
Open Circuit Voltage (Voc, ± 5%)	[V]	43.8	43.6	43.5
Short Circuit Current (Isc, ± 5%)	[A]	11.32	11.29	11.26
Module Efficiency	[%]	22.1	21.8	21.5
Operating Temperature	[°C]	-40 ~ +85		
Maximum System Voltage	[V]	1,000		
Maximum Series Fuse Rating	[A]	20		
Power Tolerance	[%]	0~+3		

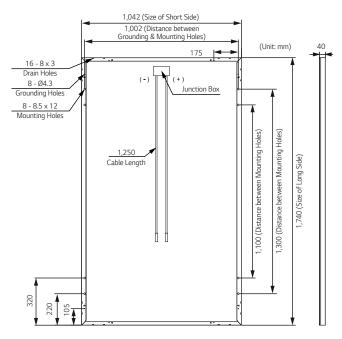
 $<sup>^3</sup>$  1) STC (Standard Test Condition): Irradiance 1,000 W/m², module temperature 25 °C, AM 1.5, Measure Tolerance of Pmax:  $\pm$  3 %.

#### Electrical Properties (NMOT4)

Model		LG400Q1C-A6	LG395Q1C-A6	LG390Q1C-A6
Maximum Power (Pmax)	[W]	303	299	296
MPP Voltage (Vmpp)	[V]	35.2	34.9	34.7
MPP Current (Impp)	[A]	8.62	8.57	8.52
Open Circuit Voltage (Voc)	[V]	41.8	41.6	41.5
Short Circuit Current (Isc)	[A]	9.13	9.10	9.07

 $<sup>^4</sup>$  NMOT (Nominal Module Operating Temperature) : Irradiance 800 W/m2, Ambient temperature 20  $^\circ$ C, Wind speed 1 m/s, Spectrum AM 1.5

#### Dimensions (mm)



The distance between the center of the mounting/grounding holes.



All details in this data sheet comply with DIN EN 50380. Subject to errors and alterations. Date: 02/2021

Document: DS-Q1C-A6-EN-202102

Copyright © 2021 LG Electronics. All rights reserved.



