

# LG NeON<sup>®</sup>H<sup>+</sup>

The LG NeON<sup>®</sup>H<sup>+</sup> is one of the most powerful and versatile modules on the market today. The LG NeON<sup>®</sup>H<sup>+</sup> is equipped with N-type cells and half-cut technology to increase power and efficiency. The LG NeON<sup>®</sup>H<sup>+</sup> includes a 25-year product and 90.6% performance warranty for higher performance and reliability.

**420W | 415W**  
**410W | 405W**

## FEATURES

**90.6%**  
in year 25

### Enhanced Performance Warranty

LG NeON<sup>®</sup>H<sup>+</sup> comes with an enhanced performance warranty. After 25 years of use, the LG NeON<sup>®</sup>H<sup>+</sup> is guaranteed to provide at least 90.6% of initial performance.

**25**  
YEARS  
WARRANTY

### Industry-Leading Product Warranty

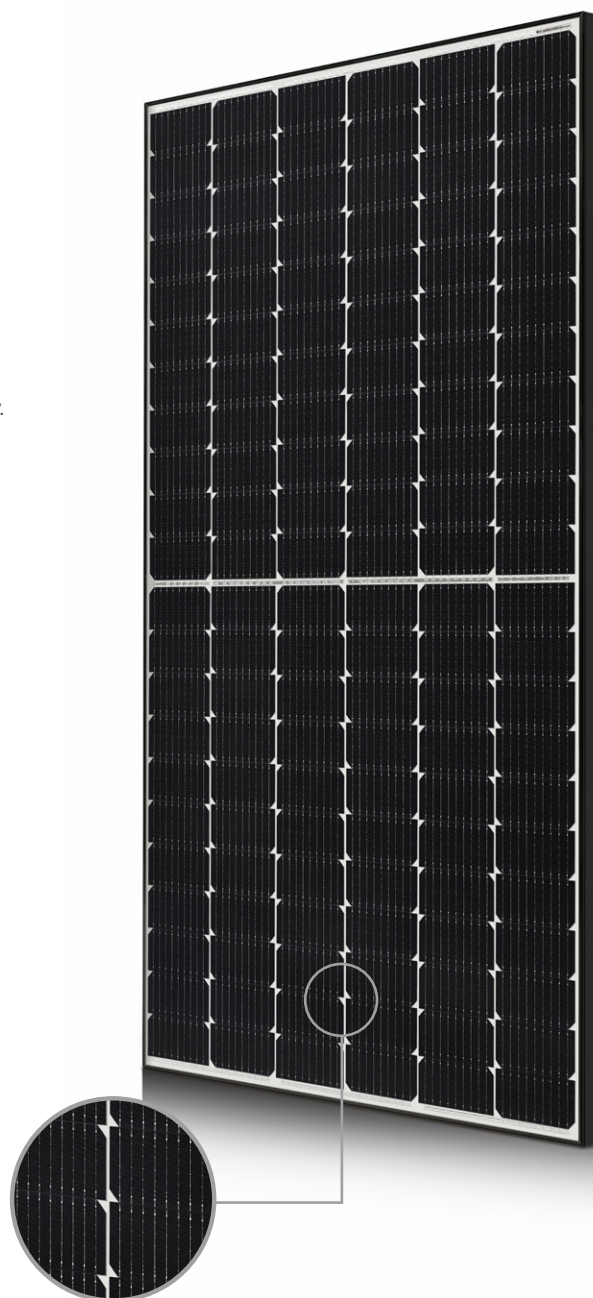
LG offers an industry-leading 25 year product warranty on the NeON<sup>®</sup>H<sup>+</sup>.



### Reliable Quality

LG NeON<sup>®</sup>H<sup>+</sup> offers reliable and proven quality through rigorous testing\*.

\* LG is subject to rigorous quality verification through PVEL PQP test. The PVEL PQP includes test sequences examining both the reliability and performance characteristics of PV modules.



**132**cells

### About LG Electronics

LG is transforming today's solar landscape, offering high-efficiency solar panels for customers who demand high performance, reliability and consistently strong energy yield from a brand they can trust. LG's modules feature high power outputs, outstanding durability, appealing aesthetics and high-efficiency technology.



## Electrical Properties (STC\*)

| Model                             |     | LG420N3C-V6 | LG415N3C-V6 | LG410N3C-V6 | LG405N3C-V6 |
|-----------------------------------|-----|-------------|-------------|-------------|-------------|
| Maximum Power (Pmax)              | [W] | 420         | 415         | 410         | 405         |
| MPP Voltage (Vmpp)                | [V] | 38.3        | 37.9        | 37.5        | 37.1        |
| MPP Current (Impp)                | [A] | 10.97       | 10.95       | 10.94       | 10.92       |
| Open Circuit Voltage (Voc, ± 5%)  | [V] | 45.6        | 45.4        | 45.2        | 45.0        |
| Short Circuit Current (Isc, ± 5%) | [A] | 11.54       | 11.49       | 11.44       | 11.40       |
| Module Efficiency                 | [%] | 21.4        | 21.2        | 20.9        | 20.7        |
| Power Tolerance                   | [%] | 0 ~ +3      |             |             |             |

\* STC (Standard Test Condition) : Irradiance 1,000W/m<sup>2</sup>, Cell temperature 25°C, AM 1.5, Measure Tolerance : ± 3 %

## Electrical Properties (NMOT)

| Model                       |     | LG420N3C-V6 | LG415N3C-V6 | LG410N3C-V6 | LG405N3C-V6 |
|-----------------------------|-----|-------------|-------------|-------------|-------------|
| Maximum Power (Pmax)        | [W] | 317         | 313         | 309         | 305         |
| MPP Voltage (Vmpp)          | [V] | 36.1        | 35.7        | 35.3        | 34.9        |
| MPP Current (Impp)          | [A] | 8.79        | 8.77        | 8.76        | 8.75        |
| Open Circuit Voltage (Voc)  | [V] | 43.0        | 42.8        | 42.6        | 42.4        |
| Short Circuit Current (Isc) | [A] | 9.29        | 9.25        | 9.21        | 9.18        |

## General Data

|                                   |                                |
|-----------------------------------|--------------------------------|
| Cell Properties (Material / Type) | Monocrystalline / N-type       |
| Cell Maker                        | LG                             |
| Cell Configuration                | 132 Cells (6 x 22)             |
| Number of Busbars                 | 9 EA                           |
| Module Dimensions (L x W x H)     | 1,880 x 1,042 x 40 mm          |
| Weight                            | 19.7 kg                        |
| Glass (Material)                  | Tempered Glass with AR coating |
| Backsheet (Color)                 | White                          |
| Frame (Material)                  | Anodized Aluminium             |
| Junction Box (Protection Degree)  | IP 68 with 3 Bypass Diodes     |
| Cables (Length)                   | 1,400 mm x 2 EA                |
| Connector (Type / Maker)          | MC4 / Staubli                  |

## Certifications and Warranty

|                               |                                                                                                                                    |
|-------------------------------|------------------------------------------------------------------------------------------------------------------------------------|
| Certifications                | IEC 61215-1 / -1-1 / 2:2016, IEC 61730-1 / 2:2016, UL 61730-1:2017, UL 61730-2:2017<br>ISO 9001, ISO 14001, ISO 50001<br>ISO 45001 |
| Salt Mist Corrosion Test      | IEC 61701 : 2011 Severity 6                                                                                                        |
| Ammonia Corrosion Test        | IEC 62716 : 2013                                                                                                                   |
| Module Fire Performance       | Type 1 (UL 61730)                                                                                                                  |
| Fire Rating                   | Class C (UL 790)                                                                                                                   |
| Solar Module Product Warranty | 25 Years                                                                                                                           |
| Solar Module Output Warranty  | Linear Warranty*                                                                                                                   |

\* 1) First years : 98.5%, 2) After 1st year : 0.33% annual degradation, 3) 90.6% for 25 years

## Operating Conditions

|                               |      |           |
|-------------------------------|------|-----------|
| Operating Temperature         | [°C] | -40 ~ +85 |
| Maximum System Voltage        | [V]  | 1,000     |
| Maximum Series Fuse Rating    | [A]  | 20        |
| Mechanical Test Load* (Front) | [Pa] | 5,400     |
| Mechanical Test Load* (Rear)  | [Pa] | 4,000     |

\* Based on IEC 61215-2 : 2016 (Test Load = Design Load x Safety Factor(1.5))

※ Mechanical Test Loads 6,000 Pa / 5,400 Pa based on IEC 61215 : 2005

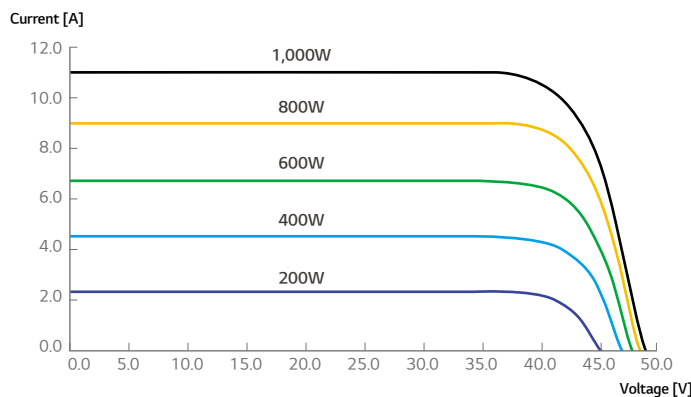
## Temperature Characteristics

|       |        |        |
|-------|--------|--------|
| NMOT* | [°C]   | 42 ± 3 |
| Pmax  | [%/°C] | -0.33  |
| Voc   | [%/°C] | -0.26  |
| Isc   | [%/°C] | 0.04   |

\* NMOT (Nominal Module Operating Temperature)

: Irradiance 800W/m<sup>2</sup>, Ambient temperature 20°C, Wind speed 1m/s, Spectrum AM 1.5

## I-V Curves



## Dimensions (mm/inch)

