

Features & Benefits



- Constant current design
- Full range AC dimming
- Integral aluminum heatsink/reflector combination also acts as driver housing
- Patented “sandwich” design uses integral mechanical and electrical interfaces to eliminate wiring harness on module
- Patented intelligent thermal design uses metal core board (MCPCB)
- Includes mounting holes for mechanical attachment and pre-wired leads
- Easily configured into existing and new luminaires
- Available in a variety of color temperatures
- Can be used to meet the requirements of CA Title 24, ENERGY STAR® and other green initiatives

Ratings and Performance Specifications

Nominal AC Power Consumption @ 120VAC	10W
Nominal Input Voltage	120VAC
Maximum Operating Range Ambient Temperature (Ta)	-40 to +50 °C
Maximum Solder Pad Temperature (Ts)	+105 °C
Maximum Driver Case Temperature (@ designated temperature measurement point, TMP).....	+75 °C
Estimated Lumen Depreciation (LM80 standard)	70% of initial lumens (L70) at 40,000 hours
Maximum Weight	700 grams

Safety/Compliance:

BB09 BD Series LED module:

UL Class 2 Recognized:

Pending, contact Brillia for further information

RoHs Compliant

BL26 Driver:

UL Class 2 Recognized Component E256806

RoHs Compliant

Output operating frequency ≥ 120Hz

Meets FCC requirements for consumer use

Class A sound rating

Complies with IEEE C.62.41-1991, Class A operation

340mA Output

Application Notes

1. Although this engine is designed with an integral heat sink, care should be taken in the luminaire designs that will use this engine to allow heat to escape the system.

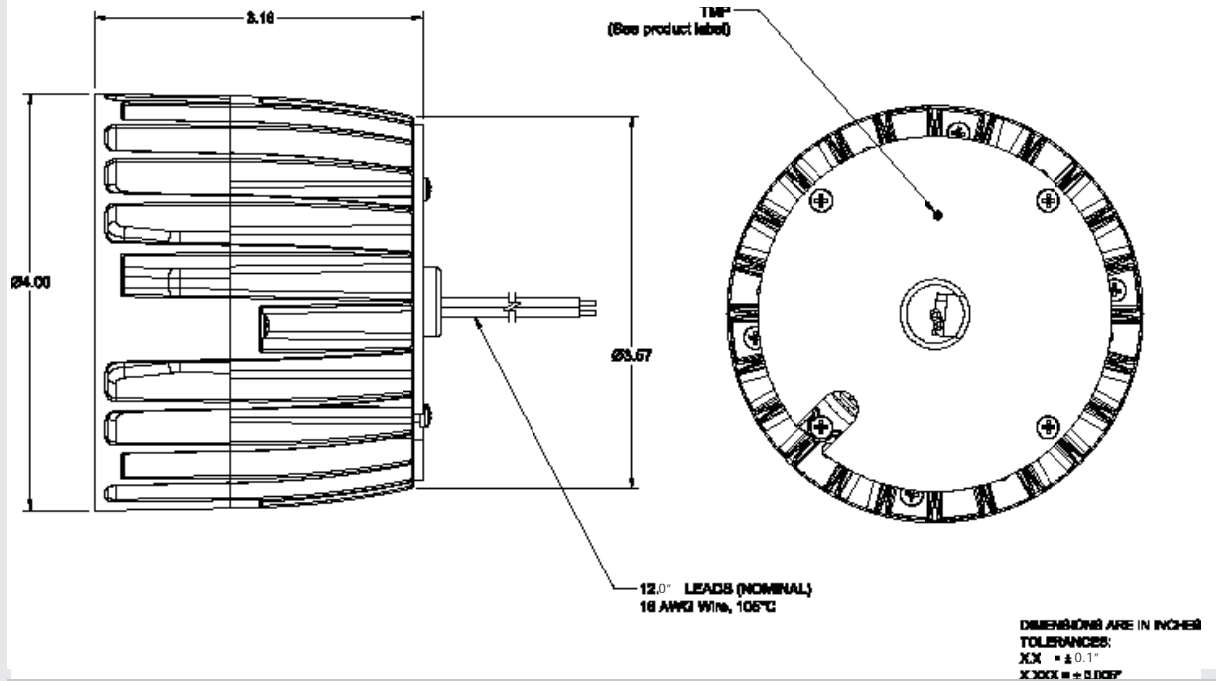
2. The proper LED Solder Pad Temperature (Ts) is critical to ensure long life. Careful design consideration required for factors such as ambient conditions (for example weather and surrounding atmosphere inside exterior luminaires) and proximity to other heat sources such as other LED modules and heat generating LED drivers.

3. Abnormal operating conditions such as high humidity or elevated operating temperatures can be expected to negatively impact lumen output, product lifetime, or product performance.

4. AC dimming works with most electronic dimmers such as Lutron® Diva and Maestro, see www.BrilliaLED.com for application notes, wiring diagrams and other compatible dimmers. For technical support or application assistance, please contact Brillia.



Physical Dimensions



Part Number	Nichia NS3x183 LED Package Bin	Nominal Values CCT Color Temp. (Kelvin)	Sample Values Light Output (Lumens)	Sample Values Efficacy (LPW) ^[2]	Sample Values CRI ^[1]	Nominal Beam Angle (Degrees)	Nominal Input Voltage Dimmable ^[3] (VAC)
BEH09BD120FHE27-001	SW27	2700	515	51	80	84	Yes
BEH09BD120FHE30-001	SW30	3000	555	55	80	84	Yes
BEH09BD120FHE35-001	SW35	3500	595	59	80	84	Yes
BEH09BD120FHE40-001	SW40	4000	625	62	80	84	Yes
BEH09BD120FHE50-001	SW50	5000	670	67	80	84	Yes

¹Higher CRI available by special order

²Sample value when used with compatible Brillia LED driver and proper heatsink

³Utilizing most standard triac or 3-wire electronic dimmers, see www.BrilliaLED.com for a listing of compatible dimmers.

Options

Other LED colors or LED manufacturers availableplease email sales@brillialed.com

Packaging

Brillia LED Light Engines are packed in individual containers and are marked with relevant SKU information and lot traceability.

Warranty

3-Year limited warranty in accordance with Brillia published warranty. No maximum ratings (such as Ts) shall be exceeded during any expected operating conditions of the system.

Permlight Products Inc. holds the following United States patents of which one or more may be applicable to the design and/or manufacture of this product. Additional granted patents, patents pending and other intellectual property protection rights may apply to this product.

United States Patents: 6712486, 6578986, 6846093, 7114831, 7306353, 7102172, 7108396, 7329024, 7387406, 7582911, 7582911, 7649327

www.brillialed.com

©2009 Permlight Products Inc. All rights reserved. Permlight, Brillia, Enbryten and Thermadjust are trademarks of Permlight Products, Inc. All others are trademarks of their respective companies or organizations. The information provided were obtained using data from laboratory results and may be subject to change. Permlight reserves the right to change any information without notice.