

NIOB-1 1" BWF IOLITE TRIMS

New Construction or Remodel Housing Required | Source: LED, 11 Watts, 600 Lumens

PRODUCT DESCRIPTION

Nora Lighting's 1" Iolite BWF trims are small aperture downlights that can be specified for use in new construction and remodel applications. The Iolite is a powerful 1" aperture downlight. The die-cast aluminum trims in square and round designs feature sharp, clean edges. The patent-pending, new construction housing allows for easy, tool-less removal of the driver. The Iolite ships with a 60° beam spread reflector installed and 20° and 40° reflectors included which can be easily changed in the field. The system provides 600 lumen output, 11 Watts and 96CRI. An obvious choice for Green energy efficient lighting in commercial and residential applications.

FEATURES

- 11 Watts
- Cree® LED COB package
- 600 Lumens
- 96 CRI
- 2700K, 3000K, 3500K, 4000K and 5000K CCT
- Comfort Dim - Dims from 3000K to a warm 1900K
- Quick Connector
- 6" Cable with insulating sleeve
- 60° (Flood) reflector installed, 40° (Narrow flood) and 20° (Spot) reflector included.
- 5-Year limited warranty
- cULus listed for Wet Location
- Dimmable

SPECIFICATION

Trim: Trims are constructed of heat dissipating die-cast aluminum. The aluminum die-cast LED heat sink is threaded to fit the die-cast lamp holder. The precision threads and positive fit transfers heat to the trim. Scientifically and specifiable "Unitized Thermal Management" (UTM) provides exceptional cool operation exceeding all industry standards. The 1" Iolite offers two trim styles in round or square. A sharp edge reflector and bull-nosed soft edge reflector that blends into ceiling lines.

Mounting: Trim includes Friction Blades to mount trim securely to housing.

Optics: Cree® COB (2700K-5000K), Premium non-Cree COB (Comfort Dim)

ELECTRICAL

Voltage: 120V or 277V AC
Current: 250mA-280mA
Wattage: 11 Watts
Lumens: 600 lm
CRI: 96 CRI
Operating Temp.: 0°C to 75°C ambient temperature
Life Expectancy: 50,000 hours
Dimming: Triac / ELV or 0-10V Dimming

Dimmable to 10% (varies by dimmer) [Click Here](#) or check complete dimmer list at www.NoraLighting.com in the "Compatibility" page under "Resources" tab

COMPATIBLE PATENT PENDING HOUSINGS

NIO-1 series is compatible with IC Air-Tight LED Iolite Series dedicated housings listed below. The housing is cULus listed for direct contact with insulation** and meets ASTM E283 standards for Air-Tight. Bar hangers are adjustable from 13-5/8" to 24-1/2". Bar hangers are slotted for T-Bar installation and include alignment feet.

CATALOG NO.	DESCRIPTION
NHIOICD-16LE3	1" Iolite IC Air-Tight LED Dedicated New Construction Housing, 120V Triac Dimming
NHIOICD-16LE4	1" Iolite IC Air-Tight LED Dedicated New Construction Housing, 120V Triac or 0-10V / 277V 0-10V Dimming
NHRIIOC-16LE4	1" Iolite IC Air-Tight LED Dedicated Remodel Housing, 120V Triac or 0-10V / 277V 0-10V Dimming

LABELS AND LISTINGS

cULus for Wet Location
 Title 24 / JA8 Compliant
 ENERGY STAR Rated
 5 Year Limited Warranty
 ROHS

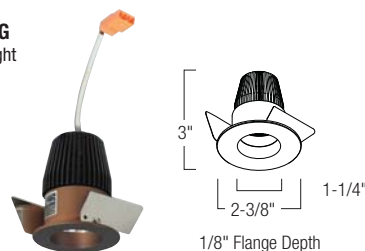


PRODUCT IMAGES AND DIMENSIONS

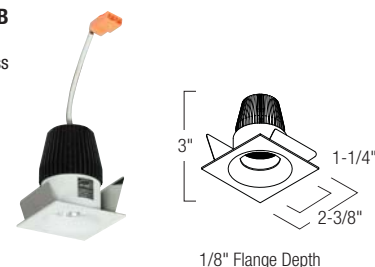
NIOB-1RNB
 Round Bull
 Nose Regress
 BWF Trim



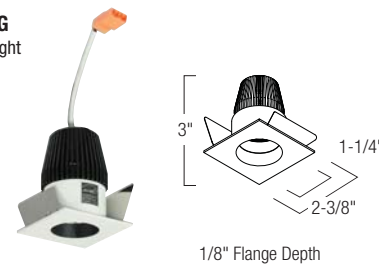
NIOB-1RNG
 Round Straight
 Regress
 BWF Trim



NIOB-1SNB
 Square Bull
 Nose Regress
 BWF Trim



NIOB-1SNG
 Square Straight
 Regress
 BWF Trim



1" Iolite BWF Trims New Construction or Remodel Dedicated Housing Required

CATALOG NO.	TRIM TYPE	TRIM STYLE	COLOR TEMP	BEAM SPREAD	FINISH
NIOB-1	R Round S Square	NB Bull Nose Regress	27 2700K	X 20°/40°/60°	BB Black / Black
		NG Straight Regress	30 3000K		BW ¹ Black / White
		35 3500K	BZ Bronze / Bronze		
		40 4000K	HW ¹ Haze / White		
		50 5000K	MPW Matte Powder White		
		CD Comfort Dim*	NN Natural Metal / Natural Metal WW White / White		

* Comfort Dim uses premium non-Cree COB 1" and 2 1/4" Comfort Dim dim on a different curve. Do not put 1" CD and 2 1/4" CD on the same switch leg (dimmer).

¹ Not available for Round and Square Bullnose (NB) trim style

** Not to be used in direct contact with spray foam insulation

Example: NIOB-1RNG27XWW Iolite 1" Round Straight Regress BWF Reflector 2700K with 20°/40°/60° Reflectors, White finish. (Requires NHIOICD-16XXX or NHRIIOC-16XXX Housing)

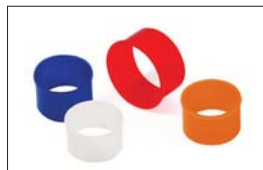
ACCESSORIES 1" IOLITE

Iolite accessories can be added at any point in the design process. Accessories easily install between module and die-cast trim.



Frosted Filter-Reflector

NIO-REFL20FR 20°
 NIO-REFL40FR 40°
 NIO-REFL60FR 60°



Translucent Deco Collar

NIO-AS15(color) 5/8" depth
 NIO-AS19(color) 3/4" depth
 NIO-AS24(color) 1" depth

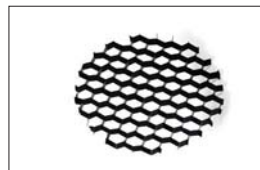
Blue, Amber, Frost or Red



Opaque Collar Snoot

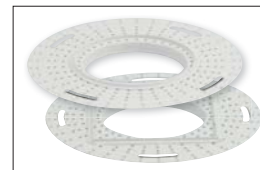
NIO-1AS15(color) 5/8" depth
 NIO-1AS19(color) 3/4" depth
 NIO-1AS24(color) 1" depth

Black, Matte Powder White, White



Hex Cell Louver

NIO-1HC



Flush Mount Mud Ring

NIO-FMMR-1R 1" Round
 NIO-FMMR-1S 1" Square

Allows flanged Iolite trims to be installed even with the ceiling plane. Flange is visible. Attaches to drywall. Requires professional drywall finishing. **Requires and only for use with NHIOICD-16 new construction housing and NIOB-1 trims.**

7-7/8" Diameter 1/2" Thick

NHIOICD-16 1" IOLITE IC AIR-TIGHT DEDICATED NEW CONSTRUCTION HOUSING

Source: LED, 11 Watts, 600 Lumens · Requires NIOB-1 or NIO-1 Series Iolite Trims

PRODUCT DESCRIPTION

New construction housing for use in insulated** ceilings can be in direct contact with insulation**. Rated for use with Iolite series fixtures.

FEATURES

- 11 Watts
- Cree® LED COB package
- 600 Lumens
- 96 CRI
- 2700K, 3000K, 3500K, 4000K and 5000K CCT
- Comfort Dim - Dims from 3100K to a warm 2000K
- Quick connector
- 5-Year limited warranty
- cULus listed for Wet Location

CONSTRUCTION

Housing: 0.040" Aluminum shallow housing constructed of Aluminum with integral bar hangers. Requires access from above.*

Air Flow Restriction: Meets requirements of Air-Tight (AT) <2CFM (cubic feet per minute) in accordance with ASTM-283 Air-Tight requirements.

Bar Hangers: Two 13-3/4" to 24-1/2" adjustable bar hangers with captive nails are included on housing. Bar hangers are parallel to junction box, but can be repositioned 90° perpendicular to junction box if desired. L-shaped bar hanger foot to align to bottom of construction joist. A T-Bar notch allows for easy installation in a suspended ceiling.

Junction Box: Pre-wired 25 cubic inch 0.064" thick galvanized steel, with seven 1/2" knockouts, four Romex® pryouts, and snap on covers. All leads are #18AWG wire, the ground wire is connected to the bottom, and quick connectors are supplied on all leads. Through branch circuit wiring, (4-in, 4-out). Access above ceiling required.*

Trim: Ordered separately. See NIO-1 and NIOB-1 specification sheets for available trim styles and finishes. All trims come with a light engine that comes in 2700K, 3000K, 3500K, 4000K 5000K, and Comfort Dim.

* For applications where there is no access from above, use Nora new construction frame-in and remodel housing.

** Not to be used in direct contact with spray foam insulation

ELECTRICAL

Voltage: 120V or 120/277V
Amp: 250mA - 280mA
Power Factor: >0.90
Operating Temp.: 122°F (50°C)
 Max. ambient temperature

Wattage: 11W
Dimming: Triac / ELV or 0-10V Dimming

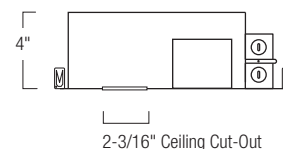
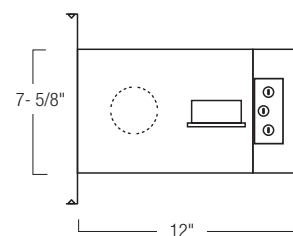
[Click Here](#) or check complete dimmer list at www.NoraLighting.com in the "Compatibility" page under "Resources" tab

LABELS AND LISTINGS

cULus for Wet Location
 Title 24 / JA8 Compliant
 ENERGY STAR Rated
 5-Year Limited Warranty
 ROHS
 Meets or exceeds ASTM-283 Air-Tight Requirements
 Washington State and California Approved



PRODUCT IMAGES AND DIMENSIONS



Housing Length: 12"
Housing Width: 7-5/8"
Housing Height: 4"
Cut-out: 2-3/16"

1" Iolite IC Air-Tight New Construction Housing (Compatible with NIOB-1 Trims)

- NHIOICD-16LE3** 1" Iolite IC Air-Tight LED Dedicated Housing, 120V Triac / ELV Dimming
- NHIOICD-16LE4** 1" Iolite IC Air-Tight LED Dedicated Housing, 120V Triac / ELV or 0-10V / 277V 0-10V Dimming

NHRI0IC-16 1" IOLITE IC AIR-TIGHT REMODEL HOUSING

Source: LED, 11 Watts, 600 Lumens · Requires NIOB-1 Series Iolite Trims

PRODUCT DESCRIPTION

Dedicated remodel housing for use in insulated ceilings; can be in direct contact with insulation**. Air-tight construction provides energy savings by reducing the flow of air through the ceiling.

FEATURES

- IC rated for direct contact with insulation**
- Quick connect provided for electrical connection to the LED Trim
- ASTM E283 for Air-Tight
- ENERGY STAR
- Title 24
- Dimming down to 5%
- Save 75% compared to incandescent sources
- 50,000 hours at 70% lumen maintenance rated life
- No harmful ultra violet light, infrared wavelengths, or light leak
- ROHS Compliant

CONSTRUCTION

Housing 0.030 steel can connects to integrated 0.040 steel structural arm with J-box and driver compartment. Integral spring brackets provided.

Air Flow Restriction Housing has factory installed gaskets to restrict airflow from room into ceiling plenum to <2CFM (cubic feet per minute) in accordance with ASTM-283 Air-Tight requirements.

Clearance IC Insulated ceiling housings are direct contact rated; no minimum clearance is required.

Mounting Three high-tension tempered steel springs secure remodel housing from 1/4" (min) to 5/8" (max) thick ceiling. Hole cutout template provided for convenience.

Junction Box Pre-wired 0.040 thick steel box shared with the driver compartment, one 0.88" knockout and screw in cover. All leads are #18AWG wire, the ground wire is connected to the housing, and wire nuts are supplied on all leads. Can NOT daisy chain.

Trim Ordered separately. See NIOB-1 specification sheet for available trim styles and finishes. All trims come with a light engine that comes in 2700K, 3000K, 3500K, 4000K 5000K, and Comfort Dim.

** Not to be used in direct contact with spray foam insulation

ELECTRICAL

Voltage: 120/ 277V
Amp: 250mA - 280mA
Power Factor: >0.90
Operating Temp.: 122°F (50°C)
 Max. ambient temperature
Wattage: 11W
Dimming: Triac / ELV or 0-10V Dimming

[Click Here](#) or check complete dimmer list at www.NoraLighting.com in the "Compatibility" page under "Resources" tab

LABELS AND LISTINGS

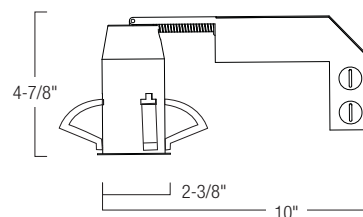
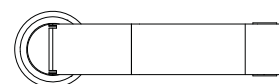
cULus for Wet Location
 Title 24 / JA8 Compliant
 ENERGY STAR Rated
 5-Year Limited Warranty
 ROHS
 Meets or exceeds ASTM-283 Air-Tight Requirements
 Washington State and California Approved



ACCESSORY

NHIOFK-1 New construction frame-in
 For use in new construction applications where remodel is to be used. Allows access to j-box from below.

PRODUCT IMAGES AND DIMENSIONS



Housing Length: 10"
Housing Height: 4-7/8"
Cut-out: 2-3/8"



NHIOFK-1 New Construction Frame-In

Housing Length: 13"
Housing Width: 8-1/4"
Cut-out: 2-3/8"

1" Iolite IC Air-Tight Remodel Housing (Compatible with NIOB-1 Trims)

NHRI0IC-16LE4: 1" Iolite IC Air-Tight Dedicated Remodel Housing, 120V Triac / ELV or 0-10V / 277V 0-10V Dimming

NHIOFK-1: 1" Iolite New Construction Frame-In

PHOTOMETRICS 1" IOLITE

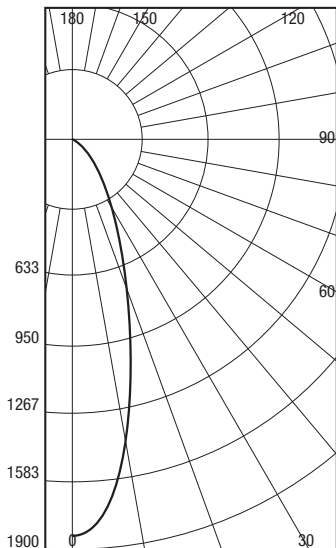
1" IOLITE LED 3000K, 20°

Item Number: NIO-1RNG3020WWLE3

Lamp Output: 605.1 Lumens

Max Candela: 1573.3

INTENSITY (CP) SUMMARY



ZONAL LUMEN SUMMARY

ZONE	LUMENS	% LUMINAIRE
0-30	462.6	76.4
0-40	532.7	88.0
0-60	581.5	96.1
0-90	605.1	100.0

ILLUMINANCE AT A DISTANCE

FOOTCANDLES CENTER BEAM	HEIGHT (IN FEET)	BEAM DIAMETER
393 fc	2'	1.0'
98.3 fc	4'	2.0'
43.7 fc	6'	3.0'
24.6 fc	8'	4.0'
<u>15.7 fc</u>	<u>10'</u>	<u>5.0'</u>
10.9 fc	12'	6.0'

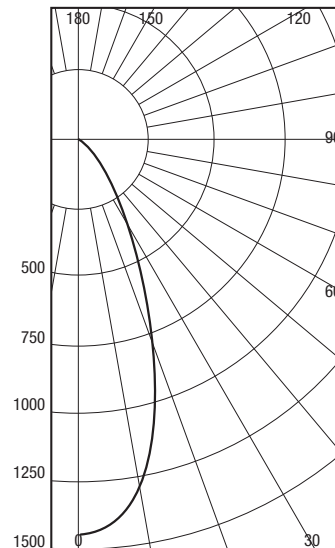
1" IOLITE LED 3000K, 40°

Item Number: NIO-1RNG3040WWLE3

Lamp Output: 610 Lumens

Max Candela: 1029.0

INTENSITY (CP) SUMMARY



ZONAL LUMEN SUMMARY

ZONE	LUMENS	% LUMINAIRE
0-30	440.3	72.2
0-40	515.7	84.5
0-60	571.9	93.7
0-90	610	100.0

ILLUMINANCE AT A DISTANCE

FOOTCANDLES CENTER BEAM	HEIGHT (IN FEET)	BEAM DIAMETER
257 fc	2'	1.5'
64.3 fc	4'	2.9'
28.6 fc	6'	4.4'
16.1 fc	8'	5.9'
<u>10.3 fc</u>	<u>10'</u>	<u>7.4'</u>
7.15 fc	12'	8.8'

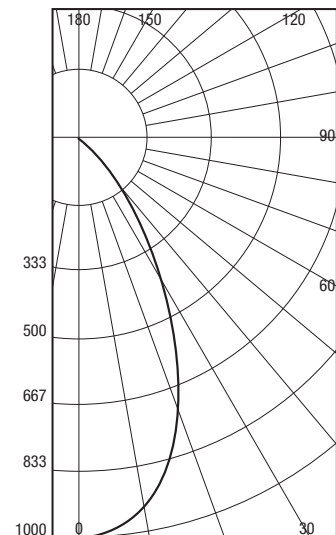
1" IOLITE LED 3000K, 60°

Item Number: NIO-1RNG3060WWLE3

Lamp Output: 610 Lumens

Max Candela: 832.1

INTENSITY (CP) SUMMARY



ZONAL LUMEN SUMMARY

ZONE	LUMENS	% LUMINAIRE
0-30	431.2	70.7
0-40	526.4	86.3
0-60	579.7	95.0
0-90	609.9	100.0

ILLUMINANCE AT A DISTANCE

FOOTCANDLES CENTER BEAM	HEIGHT (IN FEET)	BEAM DIAMETER
208 fc	2'	1.8'
52.0 fc	4'	3.5'
23.1 fc	6'	5.3'
13.0 fc	8'	7.1'
<u>8.32 fc</u>	<u>10'</u>	<u>8.9'</u>
5.78 fc	12'	10.6'