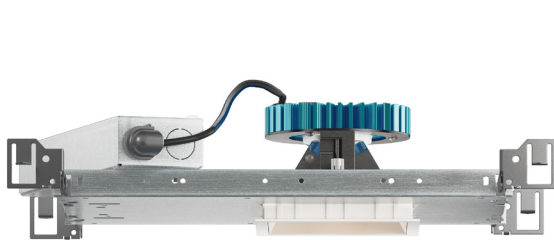


4" Square Downlight Tunable White



Trim



Trimless



Trimless Millwork

DESCRIPTION

The NU4QD-TW 4" recessed downlight by ALPHABET offers economical and efficient, tunable CCT LED technology from Luminus or Nichia, premium performance, thoughtful construction and pleasing aesthetics. Available with standard premium dimming using the EldoLED flicker-free driver with LightShape technology at 120V-277V universal voltage. Several beam angles available, plus an optional high-efficiency BrightView diffused lens for smooth light distribution and obscured LED image. Optional integrated nLight® interface for Acuity Controls compatibility. Optional Casambi interface for wireless control. DALI and 0-10V compatible dimming. For the trim version, a minimalistic look is achieved with an ultrathin 1/16" trim that is only 5/16" wide. Color choices of both trim and bezel are offered for a customized look. For the trimless version, a perforated, mud up, regressed trim assembly provides for clean, trim free installation. Perforated mud frame's integrated lip helps guide the joint compound creating a sharp and clean opening.

HOUSING

Electrocoated 16-gauge cold-rolled steel provides enhanced structural reinforcement and rust prevention. Superior, UL-certified, injection-molded commercial-grade Lexan™ (PC) is used for the frame and regressed bezel trim. Lexan provides unmatched durability and impact resistance, and is tested for UV resistance and water exposure in outdoor applications. The thermally-advanced, anodized heat sink uses 6063 aluminum alloy. Wet location rated is offered standard.

MOUNTING

An advanced mounting system allows for quick and secure installation with LED and driver serviceability from below the ceiling. The LED assembly uses die-cast aluminum mounting clamp grips (MCG) that swing out to tighten onto variable ceiling thicknesses. Integrated rubber feet on each MCG provide a non-slip vibration-resistant installation. The hidden MCG system is accessible from below ceiling by removing the snap-in lens/bezel assembly with either the included suction cup or a screwdriver blade. Integrated bar hangers feature integral toothed nails, T-bar mounting slots with locking holes, tabs for joist positioning. Retrofit mounting option allows for installation from below ceiling by use of compact driver box. No risk damaging LED or bezel assembly during installation, these are installed during last steps. Fixture and driver are easily removed for servicing after install without damaging drywall.

MOUNTING DIMENSIONS	CEILING THICKNESS	CEILING CUTOUT
Trim	1/8" to 1-5/8"	4-1/4" square
Trimless	3/8" to 1-3/4"	4-1/2" square
Millwork (Trimless)	5/8" to 1-3/4"	4-1/4" square

New Construction Bar Hangers (included)	Mounting Length: 14-3/4" to 26"
Extension Kit p/n: K20266 (ordered separately, 1 per fixture)	Extends a pair of Bar Hangers Total Mounting Length: 29" to 48"

LISTINGS

- ETLus Listed to UL1598, cETL Listed to CSA C22.2 #250.0
- IP65 with lens - Suitable for wet locations with lens - Suitable for damp locations without lens
- Non-conductive, Lexan dead-front construction.
- **Declare.** - LBC Red List Approved

RATINGS / CERTIFICATIONS	NC	RET	IC	ICAT	CP
Type non-IC	✓	✓			
Type IC			✓	✓	✓
Chicago Plenum (CCEA)					✓
Suitable for air handling plenums				✓	✓
Reduced airflow (with lens) ASTM E283	✓	✓	✓	✓	✓

LED INFO

- Luminus tunable white COB: 95 CRI, R9 > 70: SDCM = 4-step MacAdam Ellipse; Lumen Maintenance: L₇₀ > 54,000 hrs
- Nichia tunable white COB: 80 CRI, R9 > 0: SDCM = 3-step MacAdam Ellipse; Lumen Maintenance: L₉₀ > 33,000 hrs

PROJECT INFORMATION		
JOB NAME		TYPE
ORDERING CODE		

LUMINUS TUNABLE WHITE - ORDERING CODE

SERIES	NU4								
TYPE	QD QDT QDTMW	square downlight square downlight trimless square downlight trimless millwork							
LED	TW	tunable white (Luminus)							
DELIVERED LUMENS	07LM 10LM 13LM 16LM 20LM	775 lm 980 lm 1200 lm 1450 lm 1865 lm Calculated Delivered Lumens = [Delivered Lumen Value] x [CCT Multiplier] x [Reflector Multiplier] Standard Configuration: 3500K WH85							
CCT	2765	2700K to 6500K tunable white							
		CCT	2700K	3000K	3500K	4000K	5000K	5700K	6500K
		CCT MULTIPLIER FOR LUMEN OUTPUT	0.91	0.98	1.00	0.99	1.00	1.01	1.02
		EML RATIO²	0.49	0.57	0.68	0.79	0.96	1.04	1.12
		1840	1800K to 4000K tunable white						
			CCT	1800K	2000K	2400K	2700K	3000K	3500K
CCT MULTIPLIER FOR LUMEN OUTPUT	0.67		0.74	0.8	0.85	0.88	0.95	1.01	
EML RATIO²	0.21		0.33	0.46	0.53	0.59	0.67	0.73	
CRI	95		95 typical, 90 minimum						
REFLECTOR & LM MULTIPLIER	HE60 HE75 D70 WH85		60° high efficiency diffused lens (0.88) 75° high efficiency diffused lens (0.95) 70° diffused with clear lens (0.92) 85° brilliant white with clear lens (1.00)						
VOLTAGE	120 UNV	120V 120V-277V							
DIMMING	CASZ NLT DIM10Z DALIZ¹	Casambi dim to zero nLight control interface: standard Cat-5/RJ45 connection (female), dim to off eldoLED flicker free 0-10V dimming to 0% eldoLED flicker free DALI-2 dimming to 0%							
MOUNTING OPTIONS	NC IC ICAT CP RET	new construction with ceiling fitting plate insulation contact housing insulation contact/airtight housing chicago plenum housing retrofit, no ceiling fitting plate							
TRIM COLOR	BK WH MC BZ WT	black white matte chrome bronze wheat Not applicable to trimless option. Do not include in trimless ordering code.							
BEZEL COLOR	BK WH MC BZ WT	black white matte chrome bronze wheat							

ORDERING CODE

Follow the steps to specify your fixture, example:

NU4 - QD - TW - 13LM - 2765 - 95 - WH85 - 120 - CAS - NC - WH - WH

LUMINUS (LED)	POWER
DELIVERED LM	W (95 CRI)
775	10
980	13
1200	15
1450	19
1865	25

Power Factor ≥ 0.9

NOTES

1. Requires 2 wall controllers (see wiring diagram).
2. EML = equivalent melanopic lux. To calculate EML, multiply the measured photopic lux by the EML ratio for the given CCT.
Example: 254 lux x 0.79 = 200 melanopic lux at 4000K.

PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

NICHIA TUNABLE WHITE - ORDERING CODE

SERIES	NU4																	
TYPE	QD QDT QDTMW	square downlight square downlight trimless square downlight trimless millwork																
LED	TW	tunable white (Nichia)																
DELIVERED LUMENS	13LM 16LM 20LM 30LM	1050 lm 1300 lm 1600 lm 2400 lm <small>Calculated Delivered Lumens = [Delivered Lumen Value] x [CCT Multiplier] x [Reflector Multiplier] Standard Configuration: 3500K WH85</small>																
CCT	2750	2700K to 5000K tunable white <table><tr><td>CCT</td><td>2700K</td><td>3000K</td><td>3500K</td><td>4000K</td><td>5000K</td></tr><tr><td>EML RATIO²</td><td>0.43</td><td>0.51</td><td>0.63</td><td>0.69</td><td>0.80</td></tr></table>					CCT	2700K	3000K	3500K	4000K	5000K	EML RATIO ²	0.43	0.51	0.63	0.69	0.80
CCT	2700K	3000K	3500K	4000K	5000K													
EML RATIO ²	0.43	0.51	0.63	0.69	0.80													
CRI	80	80 CRI																
REFLECTOR & LM MULTIPLIER	HE65 HE75 HE85 D70 WH85	65° high efficiency diffused lens (0.89) 75° high efficiency diffused lens (0.87) 85° high efficiency diffused lens (0.95) 70° diffused with clear lens (0.91) 85° brilliant white with clear lens (1.00)																
VOLTAGE	120 UNV	120V 120V-277V																
DIMMING	CASZ NLT DIM10Z DALIZ ¹	Casambi dim to zero nLight control interface: standard Cat-5/RJ45 connection (female), dim to off eldoLED flicker free 0-10V dimming to 0% eldoLED flicker free DALI-2 dimming to 0%																
MOUNTING OPTIONS	NC IC ICAT CP RET	new construction with ceiling fitting plate insulation contact housing insulation contact/airtight housing chicago plenum housing retrofit, no ceiling fitting plate																
TRIM COLOR	BK WH MC BZ WT	black white matte chrome bronze wheat <small>Not applicable to trimless option. Do not include in trimless ordering code.</small>																
BEZEL COLOR	BK WH MC BZ WT	black white matte chrome bronze wheat																

ORDERING CODE

Follow the steps to specify your fixture, example:
NU4 - QD - TW - 13LM - 2750 - 80 - HE65 - 120 - CAS - NC - WH - WH

NICHIA (LED)	POWER	
DELIVERED LM	W (80 CRI) 2700K	W (80 CRI) 5000K
1050	15	12
1300	18	15
1600	22	18
2400	35	28

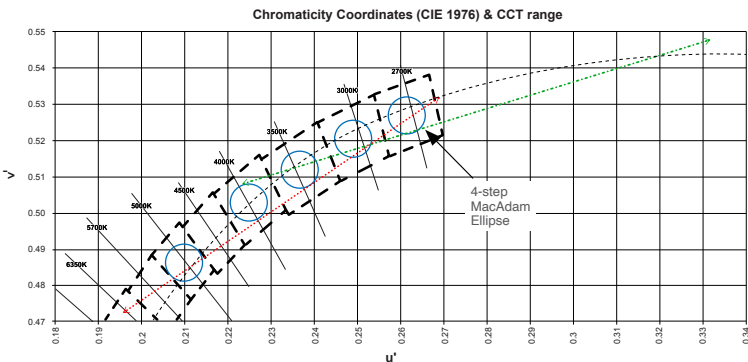
Power Factor ≥ 0.9

- NOTES
- Requires 2 wall controllers (see wiring diagram).
 - EML = equivalent melanopic lux. To calculate EML, multiply the measured photopic lux by the EML ratio for the given CCT.
Example: 290 lux x 0.69 = 200 melanopic lux at 4000K.

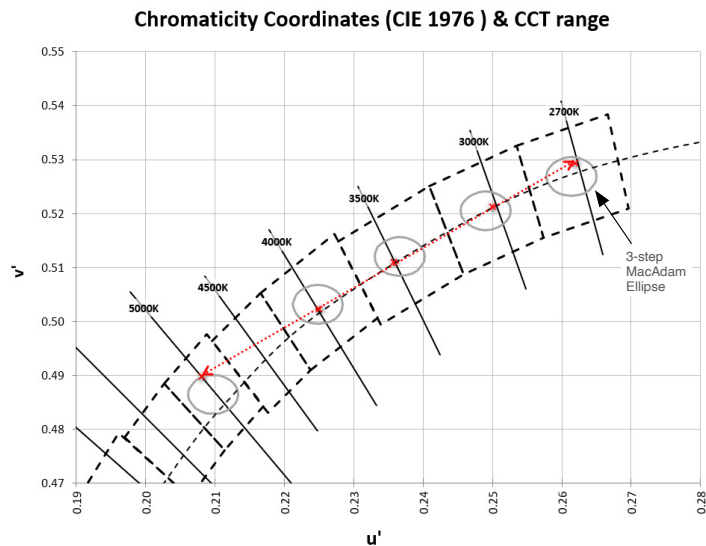
PROJECT INFORMATION		
JOB NAME		TYPE
ORDERING CODE		

TUNABLE WHITE

LUMINUS 95CRI



NICHIA 80CRI



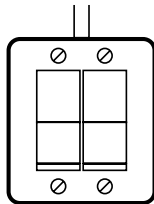
WIRING DIAGRAMS

“CAS” CASAMBI CONTROLS

120/277VAC
50/60Hz INPUT

NU Series
Tunable White

Integrated
Antenna



COMPATIBLE WIRELESS SWITCHES

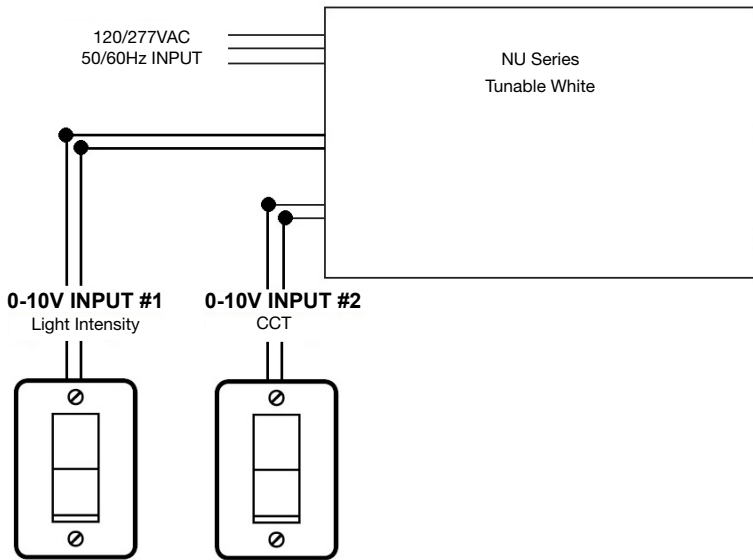
CCT & Light Intensity Control



CASAMBI™ APP (IOS & Android)

Wireless Commissioning,
CCT & Light Intensity Control

“DIM10Z” HARDWIRED 0-10V CONTROL



STANDARD 0-10V SWITCHES

(provided by others)

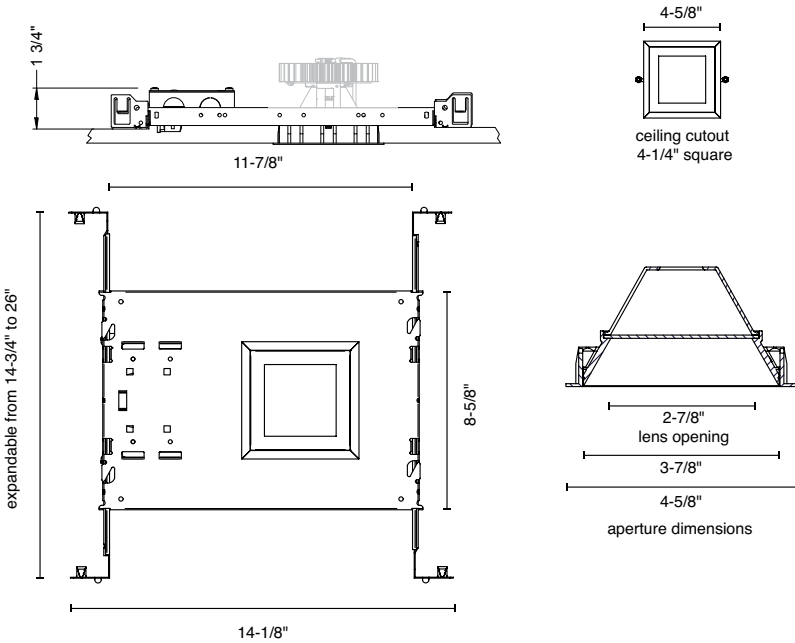
NOTES

- 1 Consult factory to order compatible wireless switches.

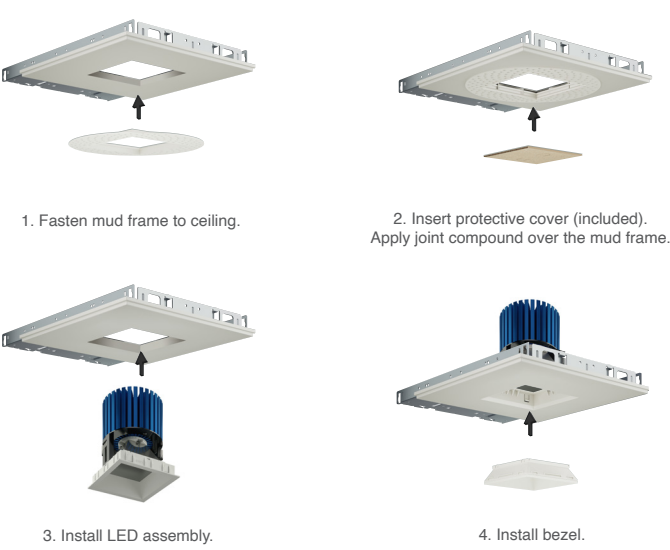
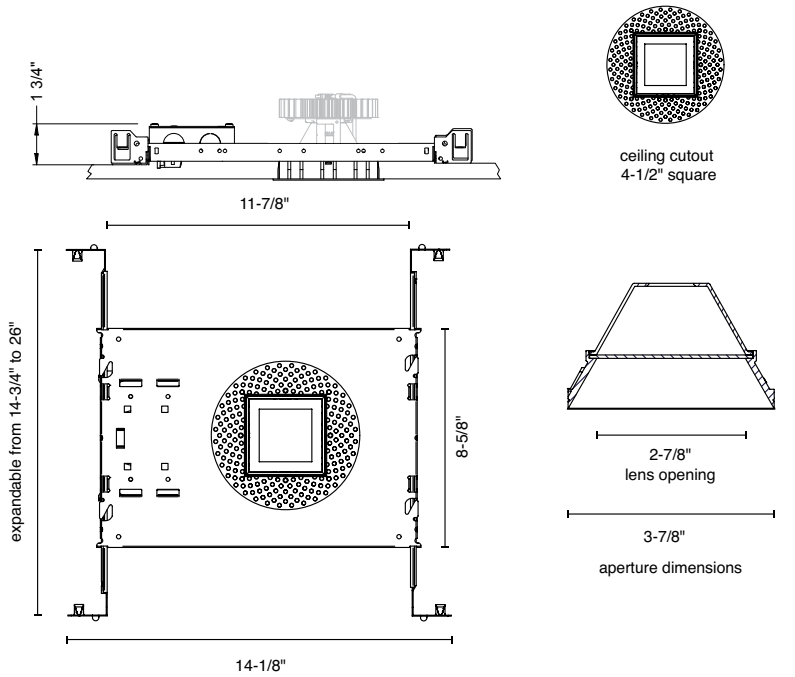
PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

MOUNTING OPTIONS

NC - NEW CONSTRUCTION TRIM



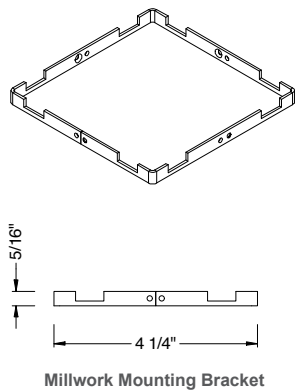
NC - NEW CONSTRUCTION TRIMLESS



PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

MOUNTING OPTIONS (CONTINUED)

QDTMW – MILLWORK TRIMLESS



- NOTES**
- 1 Ceiling cutout 4-1/4" x 4-1/4".
 - 2 Millwork Mounting Bracket & Mounting Screws are included with each Luminaire.
 - 3 One Plastic Spacer and two C-Clamps are included with each order.
 - 4 Refer to Installation Instructions for further details.



1. Insert Millwork Mounting Bracket using the included Plastic Spacer for proper depth positioning.



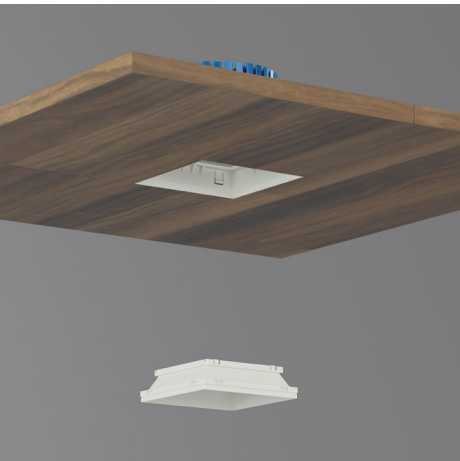
2. Use the included C-Clamps to temporarily hold the Plastic Spacer in position. Fasten the included wood screws into the Mounting Bracket using a right-angle impact driver (supplied by others).



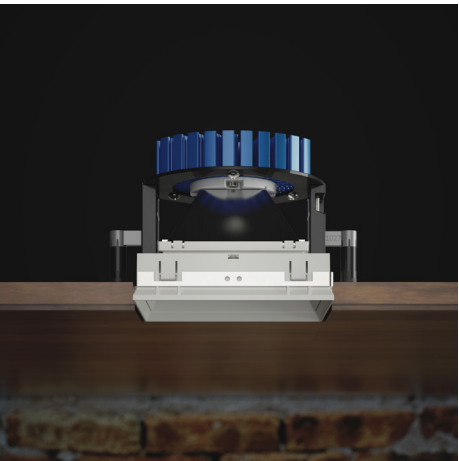
3. Remove Plastic Spacer.



4. Install Luminaire.



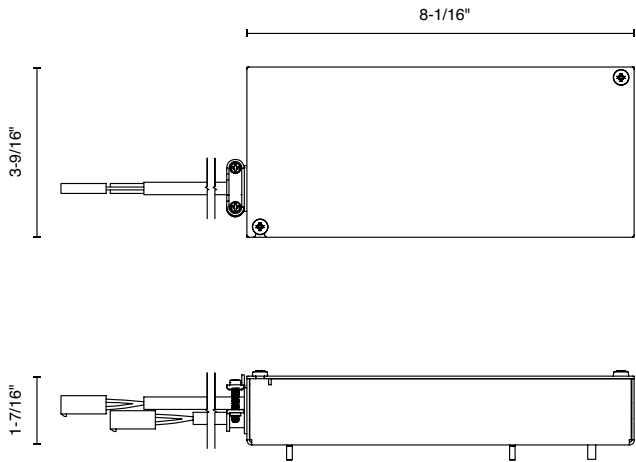
5. Insert Bezel to finish the installation.



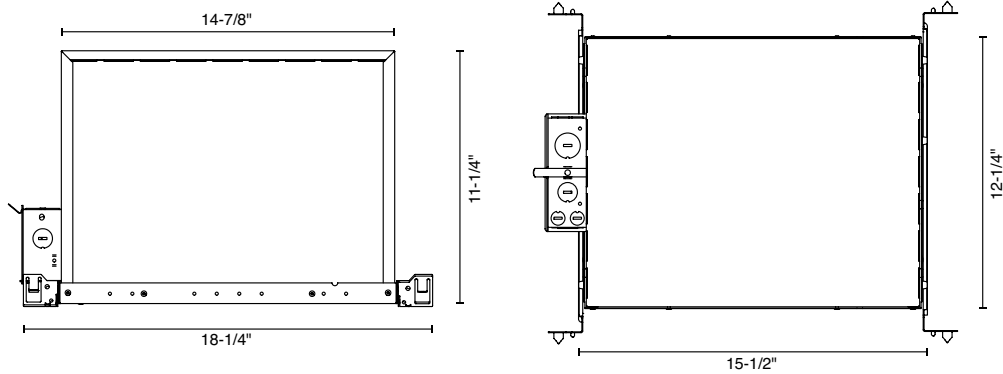
PROJECT INFORMATION			
JOB NAME		TYPE	
ORDERING CODE			

MOUNTING OPTIONS (CONTINUED)

RET - RETROFIT
TRIM/TRIMLESS



IC - INSULATION CONTACT HOUSING
TRIM/TRIMLESS



CP - CHICAGO PLENUM
ICAT - INSULATION CONTACT / AIR TIGHT
TRIM/TRIMLESS

