



LIGHTPLANE 3.5

LP3.5 | SUSPENDED, WALL, SURFACE



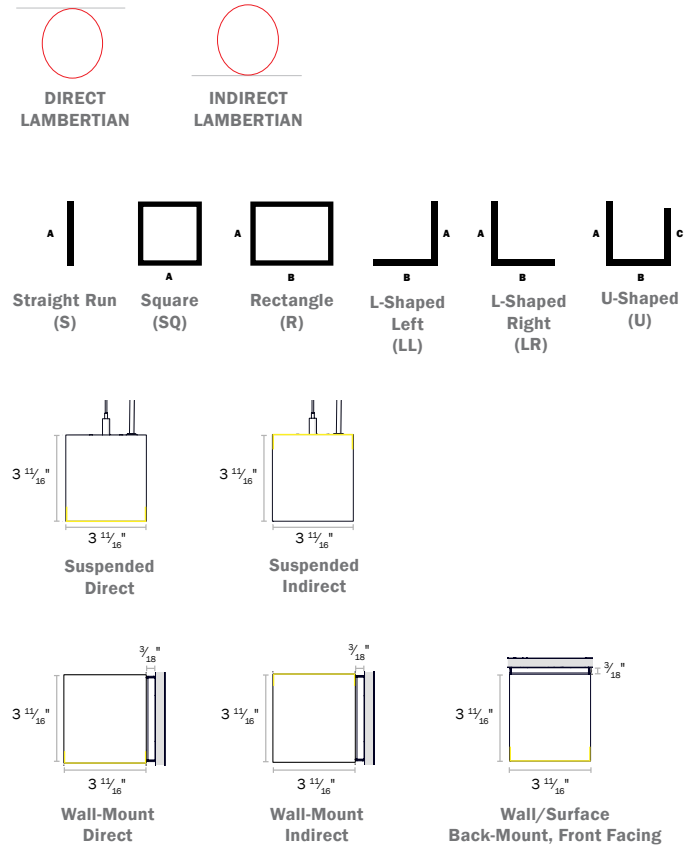
SPECIFICATIONS

PROFILE	3.5" Aperture, 3 11/16" height (+3/8" for surface mount)
SIZES	Configurable linear sections and shapes. 2ft minimum length.
LED OUTPUT	125lm/ft - 1,100lm/ft. Accent downlights available (800/1000/1500lm Output Options).
CCT/CRI	2700K/3000K/3500K/4000K • 80 or 90+ CRI Tunable White (2700K – 6500K) • RGB and RGB+W
DIMMING/ DRIVER	Integral Driver: 0-10V, DALI, DMX, eldoLED, Lutron®, PoE (Molex, Igor, NuLEDs). Dimming to 0% for select models.
POWER	6.2W - 10.7W per ft
INPUT	120VAC, 277VAC, or 347VAC
OPTICS	Lambertian distribution, Flush and reveal lens options.
FINISHES	16 powder coat finishes - Custom finishes also available
MATERIAL	6061 Extruded Aluminum
ENVIRONMENT	Dry or damp locations

WELL/UGR

See pages 6-7 for recommended options that contribute to meeting the WELL Building Standard™. UGR values available under 'Glare Control' on page 6.

DISTRIBUTIONS & PROFILES



Not to scale. Dimensions are nominal. Consult factory for CAD drawing



*Safety and Performance information available on last page. Output and other specifications available on pages 8-9.

Rev 080224



PRODUCT SPECIFICATION SHEET

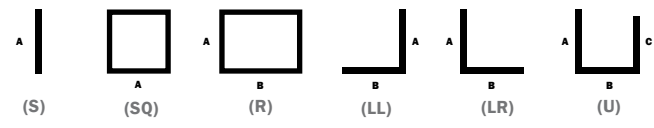
1	2	3a	3b	3c	4	5	6a	6b	6c	6d	7	8	9	10	11	12a				
12b		12c		EXAMPLE: LP3.5SD – S5 – MED/90/3500 – V00 – EXT/R – DL1000/80/3500/25 – HEX – V00 – 1 – SW – UNV – EMB/1 – NLT – SB																
				1 2 3 4 5 6a 6b 6c 6d 7 8 9 10 11 12a 12b 12c																

1. BASE MODEL (CHOOSE 1)	2. SHAPE/LENGTH (CHOOSE 1 & ENTER LENGTH IN FEET) - FOR CUSTOM ANGLES, CONTACT ALW	3. LED LAMPING* (CHOOSE 1 FOR EACH)
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QS LP3.5SD	3.5" Suspended, Direct	QS S__	Individual/Straight Run Section (enter length in product code above, ex. S5)
QS LP3.5SI	3.5" Suspended, Indirect	QS SQ__	Square Configuration (enter side length A, ex: SQ5)
QS LP3.5WD	3.5" Wall-Mount, Direct	QS R__	Rectangular Configuration (enter side lengths A and B, ex. R5-7)
QS LP3.5WI	3.5" Wall-Mount, Indirect	QS LL__	L-Shaped, Left Configuration (enter side lengths A and B, ex. LL5-7)
QS LP3.5SMB	3.5" Wall/Surface, Back-Mounted, Front-Facing	QS LR__	L-Shaped, Right Configuration (enter side lengths A and B, ex. LR5-7)
		QS U__	U-Shaped Configuration (enter side lengths A, B, and C, ex. U5-7-4)

A. OUTPUT	B. CRI ¹	C. CCT ²
QS LOW (635 lm/ft)	NO CRI/CCT³	
QS MED (870 lm/ft)	QS 80	QS 2700K⁴
QS HI (1100 lm/ft)	QS 90	QS 3000K
QS RGB (125 lm/ft)		QS BIOS⁵ 3500K
QS TUNE (2700K-6500K, 90 CRI, 416/450 lm/ft)		QS 4000K
QS RGBW (3500K, White, 80 CRI, 325 lm/ft)		QS BIOS⁵ (DYNAMIC BIOS)
QS CSTM ____ ⁶	(Enter lumens in product code above. Ex. 0100=100lm/ft)	

*Lengths are nominal and may vary based on lamping and other specification selections. Consult ALW when exact lengths are required.
¹Shape orientation (Looking from the Ceiling down to the floor)



⁴For delivered lumens and watts, see 'Performance Details'
⁵CRI/CCT options not applicable for TUNE, RGB, or RGBW lamping
⁶Choose when TUNE, RGB, or RGBW is desired output
⁷Static BIOS SkyBlue® 490nm LED is always on. Dynamic BIOS SkyBlue® 490nm LED can be tuned out with most LED driver and dimmer combinations. See pages 9-10 for details.
⁸90 CRI only. 2700K is not available in BIOS options
⁹Consult ALW for custom lumen packages.

4. DRIVER* (CHOOSE 1)	5. LENS*	6. ACCENT - DOWNLIGHT* (CHOOSE 1 FOR EACH)	7. ACCESSORY-ACCENT DOWNLIGHT (CHOOSE 1)
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QS V00 (0-10V, dim to 0%)	QS EXT/F	Extra diffuse, flush	QS N	None
QS V01 (0-10V, dim to 1%)	QS EXT/R	Extra diffuse, reveal	QS DL800	(800 lm/ft)
QS V05 (0-10V, dim to 5%)			QS DL1000	(1000 lm/ft)
QS P01 (ELV/TRIAC Dim to 1%)			QS DL1500	(1500 lm/ft)
QS LDE1 (Lutron ECOSYS1, 0-10V, dim to 1%)				
QS TSERIES (Lutron Tuneable White)				
QS ELDVO (eldoLED, 0-10V, dim to 0%)				
QS ELDDW (eldoLED dim to warm)				
QS DALI (DALI, dim to 0%)				
QS DMX (DMX, dim to 0%)				
QS POEM (POE Molex)				
QS POEI (POE IGOR)				
QS POEN (POE Nuleds)				
QS POE* (POE Ready)				

QS N	None. Select when Accent Downlight Lamping not desired.
	A. SPOT
	QS DL800 (800 lm/ft)
	QS DL1000 (1000 lm/ft)
	QS DL1500 (1500 lm/ft)
	B. CRI¹
	QS 80
	QS 90
	QS 3500K
	QS 3000K
	QS 4000K
	C. CCT
	QS 2700K
	QS 3000K
	QS 3500K
	QS 4000K
	D. BEAM SPREAD
	QS 25
	QS 40

*Downlights are not available in BIOS options as the COB is too large to fit in downlight housing.

QS N	None
QS HEX	Hexcell louver
QS SNT	Snoot
QS HEXSNT	Both Hexcell louver and Snoot



*See 'Driver', 'Sensor' and lamping charts for driver details and sensor compatibility.
⁶Choose desired PoE solution not listed. Contact customer service to review and confirm the PoE system of your choice.

8. DRIVER - ACCENT DOWNLIGHT (CHOOSE 1)	9. QUANTITY - ACCENT DOWNLIGHT (CHOOSE 1)	10. FINISH (CHOOSE 1)	11. VOLTAGE (CHOOSE 1)
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QS N	None. Select when Accent Downlight Lamping not desired.
QS [____]	Manually type code for desired driver in product code above.

QS N	None
QS ---	Type total quantity of downlights per run length in product code on previous page. (Maximum 1x for 2-3ft., 2x for 4-5ft, and 3x for 6-8ft.)

QS SW	□ Satin White
QS SB	■ Satin Black
QS AS	■ Aluminum Silver Anodized Effect
QS TB	■ Textured Black
	PREMIUM FINISHES
---	See chart on page 5 for premium finishes. Manually type in the finish code (Ex: 0B = Oil-Rubbed Bronze)
	SPECIAL ORDER FINISHES*
RAL____	Specify RAL Classic Color (Ex: RAL 3003)
CCM____	Custom Color Match

QS UNV	Universal Voltage (120VAC-277VAC)
QS 347	347 Volt (Driver options may be limited. Not available with EMB)

*Accent downlights not available with TSERIES and ELDO/DW driver types.

*Manually type in the finish code for special order finishes types

CONTINUES ON NEXT PAGE →

QS = QuickShip-qualifying option. For the entire luminaire configuration to be QuickShip-eligible, ALL options specified in the configuration must be ones notated with "QS".
 NOTE: Maximum 800 ft. of QuickShip-eligible product per order.



PRODUCT SPECIFICATION SHEET CONT'D

12a. EMERGENCY OPTIONS (OPTIONAL, CHOOSE 1)	12b. SENSOR OPTIONS* (OPTIONAL, CHOOSE 1)
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QS EMB/___ Emergency Battery (indicate QTY – each battery powers 4ft. section @ 1492lm. Not available in 347 V)

QS EMC/___ Emergency Circuit (indicate QTY of 4ft sections to be illuminated by emergency circuit)

*For fixtures under 4ft in length, entire fixture will be illuminated with a proportional lumen output. Consult ALW for more details.

N (None)

WLN/INT/___ (Cooper Wavelinx, integral)

WLN/___ (Cooper Wavelinx, remote)

QS ENLGT/___ (Enlighted, remote)

QS ENLGT/INT/___ (Enlighted, integral)

VRF/___ (Lutron Vive, integral)

VDO/___ (Lutron Vive, integral+ occ/daylight sensor)

FCJS/___ (Lutron, remote)

FCJS/S/___ (Lutron, remote + occ/daylight sensor)

MLX/INT/___ (Molex POE, integral)

MLX (Molex POE, remote)

NLT/INT/___ (nLight wired, integral occ/daylight sensor)

NLT (nLight wired remote connection)

NLTAIR/INT/___ (nLight AIR, integral)

NLTAIR (nLight AIR, remote connection)

OS/PH/INT/___ (Acuity 0-10VDC integral occ/daylight sensor)

OS/INT/HV/___ (Legrand Wattstopper High Voltage integral occ/daylight sensor)

QS OS/PH/HV/___ (Hubbel WASP remote occ/daylight sensor)

*Quickship availability on occupancy and photocell/daylight sensors may vary. Contact ALW for more information.
 *Default quantity is 1 sensor per 8ft, type alternate quantity into product code above if desired. Sensor descriptions available on page 12.
 *Not all sensors are compatible with all drivers. See 'Driver', 'Sensor' and lamping charts for driver details and sensor compatibility.

12c. ADDITIONAL OPTIONS* (OPTIONAL)	13. QUICKSHIP OPTIONS
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QS SB Seismic Bracing

*Only compatible with suspended mount models.

QS Select if you want your fixture to be **QS**

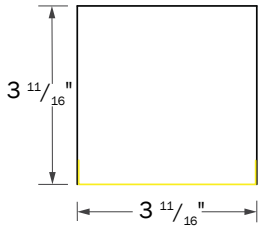
Note: To be eligible for the Quickship (QS) program, all previous selected options must also be marked QS

QS = QuickShip-qualifying option. For the entire luminaire configuration to be QuickShip-eligible, ALL options specified in the configuration must be ones notated with "QS".
NOTE: Maximum 800 ft. of QuickShip-eligible product per order.

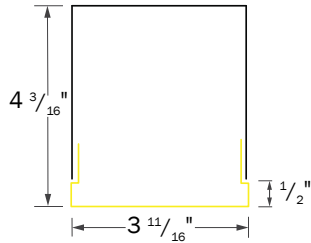


MECHANICAL DIAGRAMS

NOMINAL DIMMENSIONS AND LENS OPTIONS



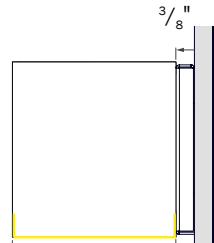
FLUSH LENS



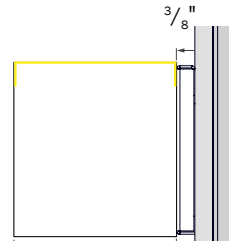
REVEAL (DROPPED) LENS

SURFACE/WALL MOUNT

Wall mounting can be specified with direct or indirect mounting. Wall/surface back mount is only available with direct lamping. The wall mount and surface/back mount hardware adds an extra 3/8" to the dimensions of the fixture as shown.



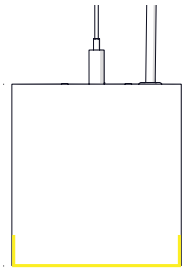
LP3.5WD WALL-MOUNT, DIRECT



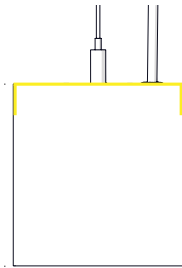
LP3.5WD WALL-MOUNT, INDIRECT

SUSPENDED

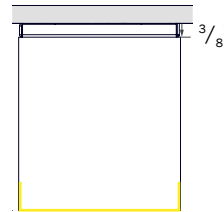
Suspended mounting can be specified with direct or indirect lamping.



LP3.5SD SUSPENDED, DIRECT

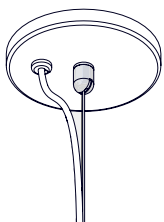


LP3.5SI SUSPENDED, INDIRECT



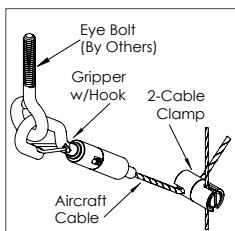
LP3.5SMB WALL/SURFACE, BACK-MOUNTED, FRONT-FACING

SUSPENSION MOUNTING OPTIONS



CEILING HARDWARE

- 4.5" canopy per power feed location. Canopy finish is always white. Contact ALW for alternate colors.
- Bullet mount,
- 8' aircraft cable
- 2" canopy (for use with T-bar mounting) per suspension point



SEISMIC BRACING (SB)

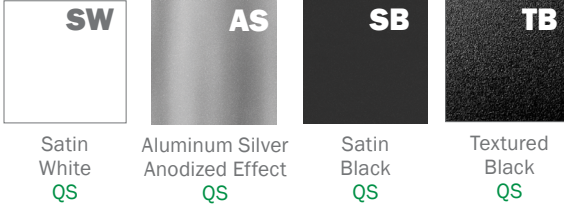
Add-on hardware includes cable gripper with hook, 2-cable clamp and specified length of aircraft cable per suspension point.



FINISHES

Standard finishes are available at no additional charge.

STANDARD FINISHES - QS ELIGIBLE

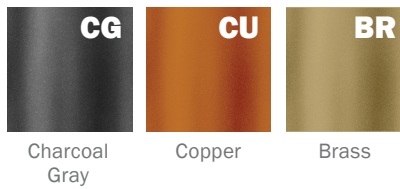


PREMIUM FINISHES

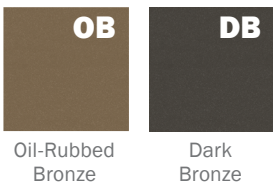
BASIC POWDER COAT



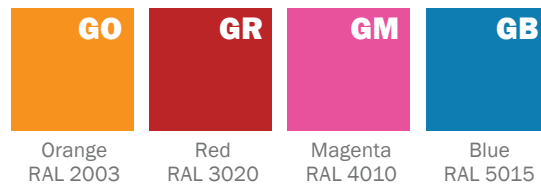
METALLIC POWDER COAT



SATIN ANODIZED EFFECT POWDER COAT



GLOSS POWDER COAT (80-95% GLOSS)



Contact ALW Quotes for sample paint finish swatches.

SPECIAL ORDER FINISHES*



RAL CLASSIC COLORS (80-95% GLOSS): RAL_ _ _ _

Most RAL Classic Colors are available for a minimum setup fee. On your specification submittal choose your RAL color by entering the 4-digit RAL code (Ex: RAL 3003). See www.alw-inc.com/resources/finishes



CUSTOM COLOR MATCH: CCM_ _ _ _

Custom powder coat color matching is available for a premium setup fee. Consult ALW for additional information.

*An individual setup fee will apply to each unique Special Order Finish per purchase order.
(ex: RAL 5023 and RAL 2008 are specified for multiple line items on a purchase order. 2x setup fees will apply)

*Printed or on-screen colors are only approximations - consult actual Color Chip Set before specifying



SPECIFYING FOR THE WELL BUILDING STANDARD™ - WELL™

ALW is committed to providing the highest quality luminaires for a multitude of applications, with many versatile lighting solutions that contribute to satisfying the WELL Building Standard. Below is a quick guide to assist you in specifying appropriate product configurations for WELL features. Links to official WELL standards can be found [here](#).

CIRCADIAN LIGHTING DESIGN FEATURE L03

The Circadian Lighting Design feature requires projects to provide users with appropriate exposure to light for maintaining circadian health and aligning the circadian rhythm with the day-night cycle.

To conform to these requirements, the project must meet one of the following 4 light level options (a, b, c, or d) below. These light levels are measured on the vertical plane at eye level of the occupant. The light levels are achieved at least between the hours of 9 a.m. and 1 p.m. and may be lowered after 8 p.m. at night.

DESIGNING WITH ELECTRIC LIGHT ONLY	DESIGNING WITH BOTH ELECTRIC LIGHT & DAYLIGHT	POINTS
a. At least 150 EML [136 melanopic equivalent daylight D65]	b. The project achieves at least 120 EML [109 melanopic equivalent daylight D65] with electric light and at least 2 points in Feature L05: Enhanced Daylight Access	1
c. At least 240 EML [218 melanopic equivalent daylight D65]	d. The project achieves at least 180 EML [163 melanopic equivalent daylight D65] with electric light and at least 2 points in Feature L05: Enhanced Daylight Access	3

Choose from a BIOS Static or BIOS Dynamic light engine to assist in a healthy, circadian lighting design. CCT, CRI, Luminous Flux Multipliers, and Melanopic Ratios are shown below for easy specification.

CIRCADIAN LIGHTING DESIGN (3PT MAX)	BIOS STATIC (BIOS)			BIOS DYNAMIC (BIOSD)			HOW TO SPECIFY
CCT	3000K	3500K	4000K	3000K	3500K	4000K	1. Select BIOS or BIOSD for LED LAMPING 2. Select the appropriate Lumen OUTPUT 3. Select the appropriate CCT
CRI / R9	83 / 80+	83 / 80+	83 / 80+	83 / 80+	83 / 80+	83 / 80+	
LUMINOUS FLUX MULTIPLIER	0.95	0.98	1.00	0.95	0.98	1.00	
MELANOPIE RATIO (R)*	0.70	0.80	0.90	0.74	0.83	0.95	See BIOS LED Lamping and Performance Details at the back of this spec sheet for lumen outputs, COI index values, and other additional information.

GLARE CONTROL FEATURE L04

Glare is defined as excessive brightness of a light-source, excessive brightness-contrasts and excessive quantities of light. Glare has been associated with a host of health issues that range from visual discomfort and eye fatigue to headaches and migraines.

To conform to Glare Control requirements, each luminaire must meet one of the following options (a, b, or d) for regularly occupied spaces.

GLARE CONTROL CRITERIA (3PT MAX)	COMPLIANT	VALUE	HOW TO SPECIFY
a. Indirect (100% emission above horizontal)	✓	100%	1. Select any of the INDIRECT options for LED LAMPING
b. Unified Glare Rating (UGR)*	✓	13.73 @ 16ft (HI Output) 11.93 @ 20ft (HI Output)	1. Select ANY output for LED LAMPING 2. Select ANY option for LENS
c. Shielding Angle	No	-	-
d. Max. Luminance (45°-90°) Max. Intensity (45°-90°)	No	-	-

*Advertised UGR values are averages and were calculated in AGI32 using the following method: 1) A 5.4m x 3.6m room was created and fixtures were spaced 2m apart center-to-center. Calculations were performed at 16ft. and 20ft.



SPECIFYING FOR THE WELL BUILDING STANDARD™ - WELL™ (CONTINUED)

**ELECTRIC LIGHT QUALITY - PART 1: COLOR RENDERING QUALITY + PART 2: FLICKER
FEATURE L07**

Using light sources that have characteristics similar to daylight, including high color rendering and minimal flicker can improve comfort and well-being of users in a space and contribute to creating a healthy environment.

Part 1: Each luminaire must meet one of the following requirements (a or b) for regularly occupied spaces.
 Part 2: Each luminaire must meet the IEEE 1789-2015 Standard Recommended Practice to manage flicker.

PART 1 - ENSURE COLOR RENDERING QUALITY (1PT MAX)	COMPLIANT	VALUE	HOW TO SPECIFY
a. CRI > 90	✓	CRI = 93 - 95	• Select 90 (90CRI) for LED LAMPING
b. CRI > 80 with R9 > 50	✓	CRI = 83, R9 > 90	• Select BIOS or BIOSD for LED LAMPING
c. IES Rf ≥ 78, IES Rg ≥ 100, -1% ≤ IES Rcs, h1 ≤ 15%	No	-	-
PART 2 - MANAGE FLICKER (1PT MAX)	COMPLIANT	VALUE	HOW TO SPECIFY
Meets IEEE 1789-2015 Standard Recommended Practice	✓	Modulation = 1% Flicker Frequency = 120 - 2000Hz	• Select V05, V01, LDE1, DALI or DMX for LED DRIVER



PERFORMANCE DETAILS

OUTPUT	DELIVERED LUMENS/FT	EFFICACY (LM/W)	WATTS/FT ⁹	CRI OPTIONS	CCT OPTIONS
LOW ¹⁰	635	Up to ~103	6.2	80 90	2700K (90CRI Only) 3000K 3500K 4000K 5000K
MED ¹⁰	870		8.4		
HI ¹⁰	1100		10.7		
TUNE	WW: 416, CW: 450	Up to ~107	8.4	90+	
RGB ¹¹	125	N/A	5	N/A	
RGBW ¹²	RGB: 122 RGB+W: 325 White Only: 203		5x	80 (White Chip)	2700K - 6500K

⁹ Lumens/Watt and Watts/ft have been calculated assuming a driver efficiency of 85%. Depending on field conditions, actual measured values may fluctuate by 5-8%.

¹⁰ Performance calculations are based on LM-79 test of HI output at 80 CRI and 4000K. LOW and MED calculations are extrapolated values.

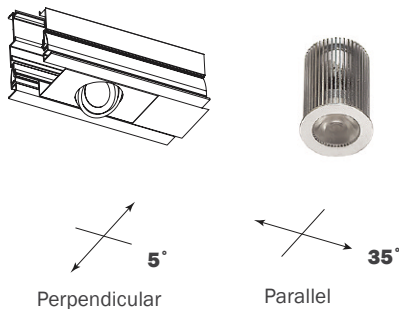
¹¹ Performance calculations are derived from LM-79 test with all RGB LEDs illuminated (Red, Green, Blue).

¹² Performance calculations are derived from the following LM-79 tests: 1) RGB LEDs illuminated, 2) RGB+W LEDs illuminated, 3) White LED only illuminated.

PERFORMANCE DETAILS - ACCENT/DOWNLIGHT LAMPING

SPOT	DELIVERED LUMENS (LM)	WATTS (W)	EFFICACY (LM/W)	CRI	CCT OPTIONS	BEAM SPREAD OPTIONS (DEGREES)
DL800	800	5.1	157	80 90	2700K 3000K 3500K 4000K	25 40
DL1000	1000	6.7	150			
DL1500	1500	10.5	143			

AIMING



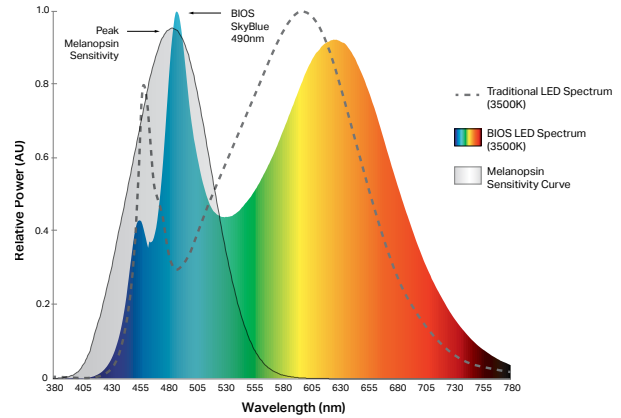


BIOS OVERVIEW



BIOS SkyBlue® technology is designed to provide the specific circadian stimulus required to improve overall sleep by **featuring a distinct peak in the 'skyblue' spectral power at 490nm**. Unlike traditional white LEDs, BIOS SkyBlue® makes it possible to achieve **high EML (Equivalent Melanopic Lux) and Melanopic/Photopic ratios** without harsh CCTs or high, glare-inducing light levels.

BIOS light engines are available in **Static** or **Dynamic** options for use with a variety of applications. In Static light engines, the SkyBlue 490nm signal always remains on while the fixture is powered. Dynamic options include a dynamic board and Bio-Dimmer module to allow the user to dim-out the SkyBlue 490nm signal during night time hours.



	BIOS STATIC (BIOS)	BIOS DYNAMIC + BIO-DIMMING™ (BIOSD)
DESCRIPTION	490nm SkyBlue light signal always remains on while the fixture is powered.	Dynamic light engine with Bio-Dimming add the ability to fine-tune and dim-out the 490nm SkyBlue signal during night time hours or as desired.
TYPICAL APPLICATIONS	Environments typically occupied only during daylight hours (6am - 8pm) such as offices and schools.	Environments occupied for a 24-hour period such as hospitals, security facilities, behavioral health facilities, factories, etc.
CONTROLS & DIMMING*	Works with any standard dimming controls (0-10V, Dali, EcoSystem, ELV, Triac, DMX, Wireless, etc.). BIOS melanopic ratio remains constant as you dim down the light intensity.	Works with any standard dimming controls (0-10V, Dali, EcoSystem, ELV, Triac, DMX, Wireless, etc.). BIOS SkyBlue® LED can be dimmed-out using a standard control/dimmer.

*No unique wiring instructions required. However, Dynamic + Bio-Dimming™ option must be set up properly during initial startup to the desired light level setpoint. See installation guide for details.

BIOS LED LAMPING DETAILS (STATIC OR DYNAMIC)

OUTPUT	DELIVERED LUMENS (LM/FT)	WATTS (W/FT)	EFFICACY (LM/W)	CRI OPTIONS
LOW¹³	635	6.2	Up to ~103	82+
MED¹³	870	8.4		
HI¹³	1100	10.7		

BIOS LED PERFORMANCE DETAILS

CCT	CRI (Ra) <i>Static BIOS</i> <i>Dynamic BIOS</i>	CRI (R9) <i>Static BIOS</i> <i>Dynamic BIOS</i>	DAYTIME M/P RATIO ¹⁴ <i>Static BIOS</i> <i>Dynamic BIOS</i>	NIGHTTIME M/P RATIO ¹⁵ <i>Static BIOS</i> <i>Dynamic BIOS</i>	COI ¹⁶ <i>Static BIOS</i> <i>Dynamic BIOS</i>
3000K	82	94	0.70	0.70	3.0
	83	90	0.73	0.45	3.3
3500K	83	91	0.80	0.80	3.1
	83	90	0.84	0.50	3.1
4000K	83	91	0.90	0.90	3.1
	83	90	0.95	0.55	3.1

¹³Performance calculations are based on LM-79 test of BIOS 4000K, HI output. LOW and MED calculations are extrapolated values.

¹⁴Melanopic to photopic (M/P) ratios are used to help calculate equivalent melanopic lux (EML) values which is the metric used for circadian lighting in the WELL™ Building Standard.

¹⁵Static LED nighttime M/P ratios remain the same as daytime M/P ratios as BIOS SkyBlue® always remains at full output.

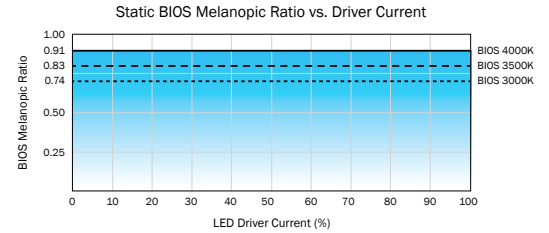
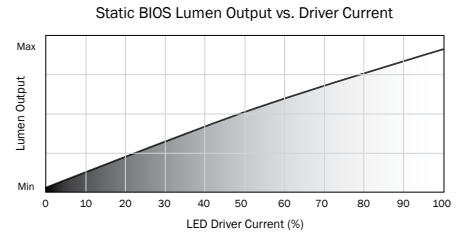
¹⁶BIOS SkyBlue® meets the Cyanosis Observation Index (COI) requirements for visual assessment of cyanosis, providing a COI up to 3.3.



BIOS STATIC DIMMING CONTROL CHARACTERISTICS

DIMMER SETTING	LIGHT OUTPUT* (BIOS SKYBLUE® + WHITE LED)		BIOS + White LED Intensity Dimming
100%* (Full On)	100%		
99% - 51%	Linear Dimming 99% - 51%		
50%	Linear Dimming 50%		
49% - 0%	Linear Dimming 49% - 0%		

BIOS SkyBlue® LED and White LED dim with a 1-to-1 ratio.



*While melanopic ratio remains constant, dimming/reducing light output will have an overall impact on Equivalent Melanopic Lux (EML). That is because $EML = \text{Vertical Lux} * \text{melanopic ratio}$. Therefore, if you reduce light levels by dimming the LEDs, you will reduce your effective EML, even when the melanopic ratio stays constant.

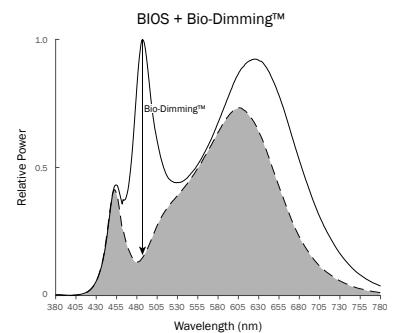
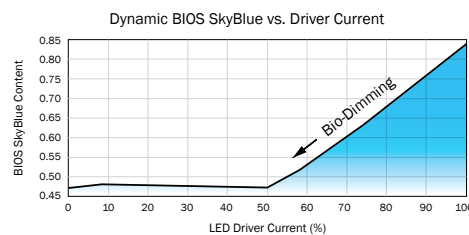
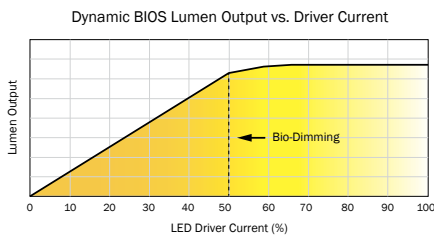
BIOS DYNAMIC + BIO-DIMMING™ DIMMING CONTROL CHARACTERISTICS

DIMMER SETTING	BIOS SKYBLUE® LED	WHITE LED	LIGHT OUTPUT	
100%* (Full On)	100%	100%	100%	Bio-Dimming
99% - 51%	100% - 0%	100%	100% - 90%	
50%	NO BIOS	100%	~90%	White LED Intensity Dimming
49% - 0%	NO BIOS	100% - 0%	Linear Dimming 90% - 0%	

BIOS SkyBlue® maintained for maximum circadian impact.
Light output remains relatively constant.

BIOS SkyBlue® removed to provide minimal circadian impact.
White LED output dims linearly.

*No unique wiring instructions required. However, Dynamic + Bio-Dimming™ option must be set up properly during initial startup to the desired light level setpoint. See installation guide for details.





DRIVERS

PRODUCT CODE	DESCRIPTION
N	None. Choose when indirect lambing is not desired.
V00	0-10V dimming down to 0% (dim to off).
V01	0-10V dimming down to 1%.
V05	0-10V dimming down to 5% (Down to 10% for TUNE lambing).
P01	Driver supports both TRIAC Forward Phase 2-Wire and ELV Reverse Phase 3-Wire dimming controls.
LDE1	(LDE1) Lutron Hi-lume 1% EcoSystem LED driver with Soft-on, Fade-to-Black dimming technology.
TSERIES	Lutron T-Series Tunable White Class 2 LED Driver (For use with Lutron Quantum Control Systems)
ELDV0	eldoLED 0/10V dimming down to 0% (when choosing nLight Air integral sensors a compatible eldoLED LEDcode version will be specified)
ELDDW	eldoLED 0/10V dim-to-warm dimming down to 0% (specify with TUNE LED lambing. Driver will be programmed with LightShape dim-to-warm setting)
DALI	DALI flicker-free dimming down to 0%.
DMX	DMX flicker-free dimming down to 0%.
POEM	Molex CoreSync PoE LED Driver. Contact ALW to assist with your project.
POEI	IGOR PoE LED Driver. Contact ALW to assist with your project.
POEN	NuLEDS PoE LED Driver. Contact ALW to assist with your project.
POE	Specify a PoE driver of your choice. Fixture comes with low voltage leads and no LED driver. Contact ALW to assist with your project

*Most drivers can be programmed to specific dimming levels if desired. Contact ALW for specific dimming level requests.
 ALW lighting fixtures are intended for use with a wide range of sensors, lighting controls, LED drivers, and building management systems. If there are specific components required for your application that aren't listed on this spec sheet, please contact ALW customer support today to specify a compatible solution of your choice.

DRIVER/LED LAMPING COMPATIBILITY							
	STD	STD/BIOS	TUNE	RGB	RGB(W)	CA TITLE 24 JA8/JA10 ¹⁷	IEEE P1789 & HD TV STUDIO ¹⁸
V00	●	●	●			●	
V01	●	●	●			●	
V05	●	●	●			●	
P01	●	●				●	
LDE1	●	●				●	●
TSERIES			●			●	●
ELDV0	●	●	PER REQUEST			●	●
ELDDW			●				
DALI	●	●	●			●	
DMX	●		●		●	PER REQUEST	PER REQUEST
POEM			PER REQUEST			●	●
POEI			PER REQUEST			●	●
POEN			PER REQUEST			●	●

● - Indicates compatibility
 *Standard lambing (STD) - LOW/MED/HI
¹⁷Fixtures specified with 90CRI 2700K, 3000K, 3500K, and 4000K lambing with applicable LED drivers have the ability to conform to California Title 24 JA8 and JA10 Appendices
¹⁸The following drivers conform to IEEE P1789 Flicker Standard: 'IEEE Recommended Practices for Modulating Current in High-Brightness LEDs for Mitigating Health Risks to Viewers'. These drivers may also be installed in HD TV Studio applications utilizing high frequency camera equipment.



SENSORS

	PRODUCT CODE	DESCRIPTION	Location
	N	None. Choose when sensors are not desired.	-
COOPER WAVELINX	WLNK/INT	Wavelinx Wireless integral occ/daylight sensor (WaveLinX part: OEM-WAA)	Integral
	WLNK	Fixture is built with 0/10V wiring to connect to Wavelinx Wireless sensors and power/relay packs (sensors and equipment not provided by ALW)	Remote
ENLIGHTED™	ENLGH/INT	Enlighted integral connected lighting smart sensor - occ/daylight/networking (Enlighted Part: SU-5E-CL)	Integral
	ENLGH	Enlighted® remote connected lighting smart sensor - occ/daylight/networking (Enlighted Part: SU-5S-H-CL)	Remote
LUTRON VIVE	VRF	Lutron® Vive integral RF wireless fixture control (Lutron Part: DFCSJ-OEM-RF)	Integral
	VDO	Lutron® Vive integral RF wireless fixture control + daylight/occ sensor (Lutron Part: DFCSJ-OEM-OCC)	Integral
	FCJS	Lutron® Vive remote RF wireless fixture control (Lutron Part: FCJS-ECO or FCJS-010)	Remote
	FCJS/S	Lutron® Vive remote RF wireless fixture control + daylight/occ sensor (Lutron Part: FCJS-ECO or FCJS-010, & FC-Sensor)	Remote
MOLEX POE CORESYNC	MLX/INT	Molex CoreSync PoE Integral Fixture-Mounted Sensor R - occ/daylight/temperature/humidity (Molex Part: 182091-1000)	Integral
	MLX	Molex PoE sensors for use with Molex/PoE drivers. Customer will need to determine who to purchase PoE equipment from	Remote
NLIGHT WIRED®	NLT/INT	Fixture is built with nLight Wired integral components specified by agency. Contact ALW to review project details.	Integral
	NLT	Fixture is built to connect to nLight Wired remote components specified by agency. Contact ALW to review project details.	Remote
NLIGHT WIRELESS®	NLTAIR/INT	Fixture is built with nLight Air (Wireless) components specified by agency. Contact ALW to review project details.	Integral
	NLTAIR	Fixture is built to connect to nLight Air (Wireless) remote components specified by agency. Contact ALW to review project details.	Remote
VALUE SENSORS	OS/PH/INT	Acuity 0-10VDC Integral occ/daylight sensor (Acuity Part: MSD 7 ADC WH) Automated Dimming Functionality Only. Manual Dimming not available. Customer to set sensor functionality in the field. Lowest dim level depends on driver.	Integral
	OS/INT/HV	Legrand Wattstopper High Voltage Integral occ/daylight on/off sensor (Part: FS-355) On/Off or Manual Dimming Functionality Only (based on occupancy and daylight). Connect fixture 0/10V wires to wall dimmer in the field. No Automated Dimming available.	Integral
	OS/PH/HV	Hubbell WASP High Voltage 0-10V remote surface mount occ/daylight sensor. 120/277/347VAC input (Hubbell Part: WSPDSMUNV) Automated Dimming Functionality: Connect fixture 0/10V wires to sensor in the field. Adjust occ/photo cell settings as desired. On/Off or Manual Dimming Functionality: Turn photocell functionality OFF. Cap off 0/10V wires on sensor. Connect fixture 0/10V wires to wall dimmer in the field.	Remote

*All connected lighting sensors/systems must be programmed in the field by an electrical commissioner familiar with the system. Refer to the 'Sensor Compatibility' and 'Driver/Sensor Compatibility' charts to specify compatible sensors, LED lamping, and LED driver systems.



SENSORS CONT'D

SENSOR COMPATIBILITY								
PRODUCT CODE		SENSOR TYPE	MAX MT HT	CA TITLE 24	STD*	TUNE	RGB	RGB(W)
COOPER WAVELINX	WLN _X /INT	OCCUPANCY/PHOTOCELL	15 ft	●	●			
	WLN _X		15 ft	●	●			
ENLIGHTED™	ENLGH _T /INT	OCCUPANCY/PHOTOCELL	15 ft	●	●	CUSTOM REQUEST		
	ENLGH _T	OCCUPANCY/PHOTOCELL	40 ft	●	●	CUSTOM REQUEST		
LUTRON VIVE	VRF	WIRELESS CONTROL	12 ft	●	●			
	VDO	OCCUPANCY/PHOTOCELL	12 ft	●	●			
	FCJS	WIRELESS CONTROL	12 ft	●	●			
	FCJS/S/	OCCUPANCY/PHOTOCELL	12 ft	●	●			
MOLEX POE CORESYNC	MLX/INT	OCCUPANCY/PHOTOCELL TEMPERATURE/HUMIDITY	16 ft	●	●			
	MLX		16 ft	●	●	●	CUSTOM REQUEST	CUSTOM REQUEST
NLIGHT WIRED®	NLT/INT	OCCUPANCY/PHOTOCELL	15 ft	●	●			
	NLT		15 ft	●	●			
NLIGHT WIRELESS®	NLTAIR/INT	OCCUPANCY/PHOTOCELL	15 ft	●	●			
	NLTAIR		15 ft (average)	●	●			
VALUE SENSORS	OS/PH/INT	OCCUPANCY/PHOTOCELL	15 ft		●			
	OS/INT/HV	OCCUPANCY/PHOTOCELL	15 ft	●	●	■	■	■
	OS/PH/HV	OCCUPANCY/PHOTOCELL	45 ft	●	●	■	■	■

● - Indicates compatibility ■ - On/off sensor functionality only

*Standard lamping (STD) - LOW/MED/HI



SENSORS (CONT'D)

DRIVER/SENSOR COMPATIBILITY									
	WLNX/INT	WLNX	ENLGT/INT	ENLGT	VRF	VDO	FCJS	FCJS/S/	MLX/INT
V00	●	●	●	●			●	●	
V01	●	●	●	●			●	●	
V05	●	●	●	●			●	●	
P01									
LDE1					●	●	●	●	
TSERIES									
ELDV0									
ELDDW									
DALI					●	●			
DMX									
POE/MOLEX									●
POE/IGOR	Sensor types will depend on the PoE system configuration. Contact ALW for details.								
POE/NULEDS	Sensor types will depend on the PoE system configuration. Contact ALW for details.								
POE/READY	Sensor types will depend on the PoE system configuration. Contact ALW for details.								

- - Indicates compatibility
- ▲ - Fixture can have automated dimming via sensor OR on/off functionality and manual dimming
- - On/off sensor functionality only

DRIVER/SENSOR COMPATIBILITY CONT'D									
	MLX	NLT/INT	NLT	NLTAIR/INT	NLTAIR	OS/PH/INT	OS/INT/HV	OS/PH/HV	NO SENSOR
V00						●	■	▲	●
V01						●	■	▲	●
V05						●	■	▲	●
P01							■	■	●
LDE1									●
TSERIES							■	■	●
ELDV0		●	●	●	●	●	■	▲	●
ELDDW							■	■	●
DALI							■	■	●
DMX							■	■	●
POE/MOLEX	●								●
POE/IGOR	Sensor types will depend on the PoE system configuration. Contact ALW for details.								
POE/NULEDS	Sensor types will depend on the PoE system configuration. Contact ALW for details.								
POE/READY	Sensor types will depend on the PoE system configuration. Contact ALW for details.								



PHOTOMETRICS

OPTIC	POLAR PLOT (CD)	MTG HEIGHT	LIGHT LEVEL (FC)	SPACING CRITERION (SC) ¹⁹ (0°- 180°) (90°- 270°)	MAX INTENSITY (CD)	OUTPUT (LM/FT)
EXT/F		6 ft	22.8	1.24 1.24	784.4	1100
		8 ft	12.3			
		10 ft	7.8			
		12 ft	5.4			
		14 ft	4			
		16 ft	3.1			
EXT/R		6 ft	22.1	1.2 1.2	796.1	1100
		8 ft	12.4			
		10 ft	8			
		12 ft	5.5			
		14 ft	4.1			
		16 ft	3.1			

*Photometric calculations based on HI 4000K 80 CRI fixture combination. Actual results may vary in the field.

For footcandle and output multipliers refer to the [ALW IES File Multipliers Chart](#)

¹⁹Spacing criterion refers to maximum distance luminaires can be spaced to provide uniform illumination on the working plane or surface.
Luminaire spacing = Spacing Criterion (SC) x Mounting Height (MH) (ex. 1.14 (SC) x 10' (MH) = 11.4' Luminaire Spacing).



ADDITIONAL OPTIONS & SPECIFICATIONS

LED PERFORMANCE

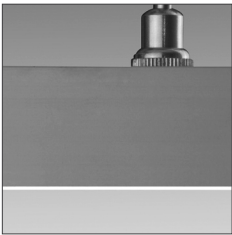
> 54,000 hours at 70% lumen maintenance, LM80 / TM-21

HOUSING

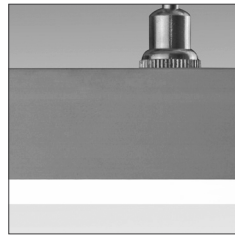
100% recyclable, extruded architectural grade 6061 aluminum with a 0.08" minimum wall thickness.

LENS OPTIONS

Extruded, twin-layered, high-impact acrylic. EXT is white and extra diffuse with minimal- to no-source visibility. Choose from flush or reveal (dropped) lens options.



FLUSH LENS – EXT/F



REVEAL LENS – EXT/R

SAFETY & REGULATORY

Fixtures specified with 90CRI, 2700K, 3000K, 3500K, and 4000K lamping with applicable LED drivers have the ability to conform to California Title 24 JA8 and JA10 Appendices. EldoLED drivers can conform to IEEE P1789 Flicker Standard: IEEE Recommended Practices for Modulating Current in High-Brightness LEDs for Mitigating Health Risks to Viewers .

Contact [ALW customer support](#) today and we can help you with your project requirements.

ETL Listed (U.S. & Canada). Suitable for dry or damp locations.

Conforms to UL std. 1598, Luminaires.

Certified to CSA std. C22.2#250.0:2008 Ed. 3+G1;G2.

WARRANTY

Limited 11-year warranty. Details: alw-inc.com/warranty

OPERATING TEMPERATURE

Luminaire should be installed and operated ONLY in dry environments where the ambient temperature ranges from -4 °F to 122 °F (-20 °C to 50 °C). Luminaire operation in environments outside the listed temperature range voids the warranty AND may damage the product or adversely impact lamp life, lumen output and color consistency.

INTEGRAL DOWNLIGHTS

Optional, aimable accent downlights deliver 800-1500 lumens with a beam spread of 25° or 40°. Hex cell (HEX) and snoot (SNT) accessories are also available.

POWER CABLES

Power cables come standard in a transparent sheathing to match steel aircraft suspension cables. Please contact customer support if custom cables are required for your application. Power cables cannot be swapped in the field as it will void the ETL Safety Listing and Product Warranty.



CONTROLS, SENSORS, & LED DRIVER

ALW lighting fixtures are intended for use with a wide range of sensors, lighting controls, LED drivers, and building management systems. Our component portfolio is continually expanding to adopt to the latest technologies and specification needs. We currently support integration with Lutron, Enlighted, nLight, Cooper Wavelinx, eldoLED, Molex PoE, NuLEDS PoE, Igor PoE, Osram, Philips, and more. If there's a component or system needed that you don't see on the spec sheet please contact [ALW customer support](#) today so we can review your requirements.

WEIGHT

Approximately 3 lbs. per linear foot (not including downlight option). Weight may vary depending on mounting, downlight, and additional options selected.