

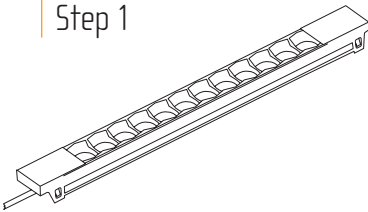


The stand-alone version presents ULTIMA in its most compact form as a system. Its cross section of .39"/10 mm x .51"/13 mm (H x W) makes it an ideal candidate for finesse integrations or confined spaces. ULTIMA embeds the second generation of the NanoRay technology offering 7 different lighting effects from spot to asymmetric with an outstanding control of glare (UGR < 13) and color consistency. Its highest level of integration results in a luminaire sufficiently small to be easily integrated in any architectural structures and blend in seamlessly. Various cabling configurations and mounting possibilities enable full design freedom.

Project name			
Fixture type		Phase	
Specifier		Date	
IC Driver Up to 1200 lm/ft 118 lm/W constant light output	Reel-to-Reel High Quality Solder Free Reels	TJ Away Exceptional Thermal Dissipation	One Bin Only 3 MacAdam up to 94 CRI
NANO RAY Precision Optics	L80/B10 > 60,000 h	Wxxx/ 339	IES LM79/ LM80 Compliant

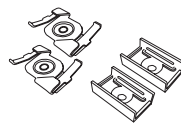
Ordering Process

Step 1



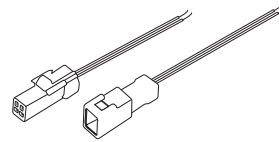
Luminaire (Page 1)

Step 2



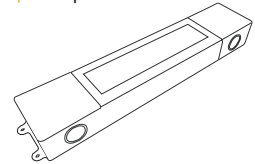
Mounting Accessory Details (Page 4)
(Included with the Luminaire Order)

Step 3



Cables and Connectors (Page 4)
(Optional)

Step 4












Drivers and Controllers (Page 5)

Luminaire Order Code

Family	Type	Mounting	Lumen Package	CCT/CRI	Standard length	Body Color / ^a Louver Color	Optics	Cable/Connector	Ingress
ULTIMA-5	---	---	---	W---	---	---	---	---	IP40
	NANO	CLO - Clips	6-150 lm/ft, 1.8W/ft	822-2200K, 80CRI	290-11 inches	BB-Black/Black	15-15 Optics	DC-Female & Male (4")	
	OPAL	MAG - Magnetic	10-270 lm/ft, 3.1W/ft	927-2700K, 90CRI	540-21 inches	SW-Silver/White	25-25 Optics	MO-Male one side (4")	
		AMC - Adjustable	15-440 lm/ft, 4.6W/ft	930-3000K, 90CRI	790-31 inches	BW-Black/White	40-40 Optics	OO-Open cable one side (6")	
		FCC - Grid Ceiling	25-710 lm/ft, 7.6W/ft ^a	935-3500K, 90CRI	1040-41 inches	SB-Silver/Black	60-60 Optics		
				940-4000K, 90CRI	1290-51 inches		BW-Batwing		
				850-5000K, 80CRI	1540-61 inches		AS-Asymmetrical ^b		
							OL-Opal ^c		
			20-550 lm/ft, 6.1W/ft ^d	IQW-Tunable White ^e					

^a Not suitable for recessed mounting. ^b Not available with Opal and Asymmetrical Optics. ^c BW and SB are not available for Opal type. The second letter indicates the endcap color.

^d Not available with Tunable White (IQW). ^e Only optic option for Opal type.

			6			10			15		20		25*	
			CCT	Lumen/ft	W/ft	Lumen/ft	W/ft	Lumen/ft	W/ft	Lumen/ft	W/ft	Lumen/ft	W/ft	
Static White		W822	2,200 K	140	1.8	260	3.1	430	4.6	-	-	690	7.6	
		W927	2,700 K	150	1.8	260	3.1	430	4.6	-	-	710	7.6	
		W930	3,000 K	150	1.8	270	3.1	440	4.6	-	-	710	7.6	
		W935	3,500 K	150	1.8	270	3.1	450	4.6	-	-	730	7.6	
		W940	4,000 K	150	1.8	280	3.1	450	4.6	-	-	740	7.6	
		W850	5,000 K	210	1.8	340	3.1	530	4.6	-	-	840	7.6	
Tunable White		W822	2,200 K	-	-	-	-	-	-	280	6.1	-	-	
		W850	5,000 K	-	-	-	-	-	-	340	6.1	-	-	
		Total	2,200 K - 5,000 K	-	-	-	-	-	-	620	6.1	-	-	

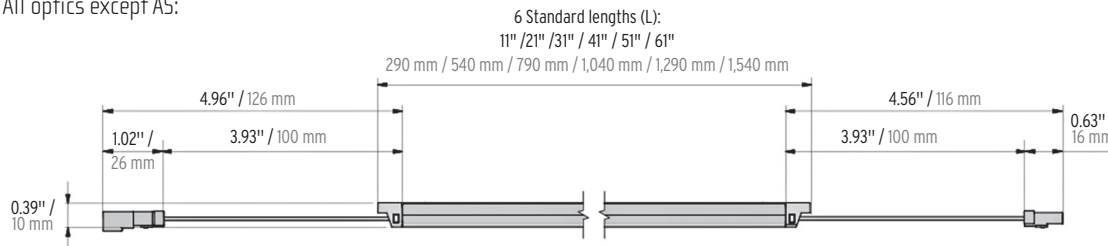
The given data are typical values. Due to tolerances of the production process and the electrical components, values for light output and electrical power can vary up to 10%.

Lumen values are based on 25° optics with white louver. See page 2 for other light loss factors.

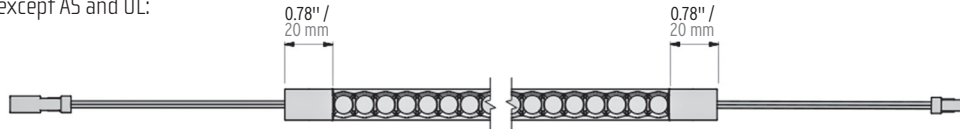
* Only for surface mounting - not suitable for recessed mounting.

Mechanical Details

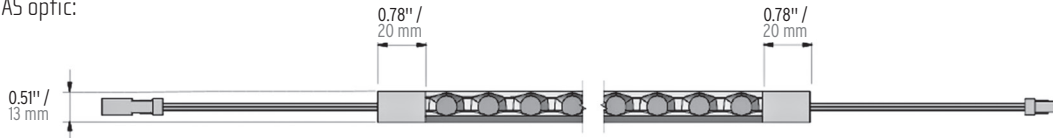
All optics except AS:



All optics except AS and OL:

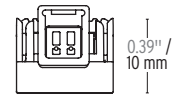


AS optic:



Fixture Profiles

All optics except AS



AS optic

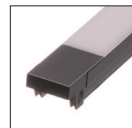


Cable/Connector Options

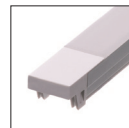
- DC
Male/female for daisy chain
4 inch cable length both sides
- MO
Male one side
4 inch cable length
- OO
Open end one side
6 inch cable length

Fixture Finishes Options*

Opal Optic



BB - Black Profile /
Black Endcap
55% light loss



SW - Silver Profile /
White Endcap
40% light loss

Nano Optic



BB - Black Profile /
Black Louver
6% light loss



SW - Silver Profile /
White Louver
Baseline light level



BW - Black Profile /
White Louver
Baseline light level

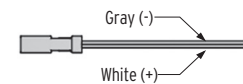


SB - Silver Profile /
Black Louver
6% light loss

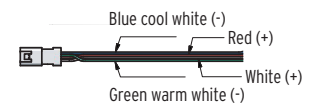
* Refer to ies files for light levels of every variant.

Connector Polarity Details

Static White



Tunable White



Technical Details

	Static White				Tunable White
	6 (1.8 W/ft)	10 (3.1 W/ft)	15 (4.6 W/ft)	25 (7.6 W/ft)	20 (6.1 W/ft)
Max efficacy (lm / W) [®] @ 5000 K	113	112	117	110	102
Max length (ft / m)	5 / 1.54	5 / 1.54	5 / 1.54	5 / 1.54	5 / 1.54
Max serial run length (ft / m)	24.6 / 7.5	16.4 / 5	16.4 / 5	9.8 / 3	9.8 / 3
CRI / R9 (up to) @ 3000 K	95 / 86	95 / 86	95 / 86	95 / 86	85 / 71
Case Temperature T _c -point (T _{cmin} / T _{cmax}) ^{A,B}	-13°F / 176°F	-13°F / 176°F	-13°F / 176°F	-13°F / 176°F	-13°F / 176°F
Ambient temperature (T _a min / T _a max)	-13°F / 122°F	-13°F / 122°F	-13°F / 104°F	-13°F / 104°F	-13°F / 104°F
Storage temperature (T _s min / T _s max)	-22°F / 185°F	-22°F / 185°F	-22°F / 185°F	-22°F / 185°F	-22°F / 185°F
Voltage (23 V _{min} , 25 V _{max})	24	24	24	24	24

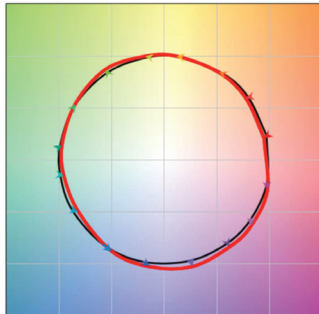
^A The position of the T_c-point is marked on each step of the LED strip. The T_c-point should be measured in thermal equilibrium according to IEC EN 60598-1.

^B The given data are typical values. Due to tolerances of the production process and the electrical components, values for light output and electrical power can vary up to 10%.

Colorimetric Details

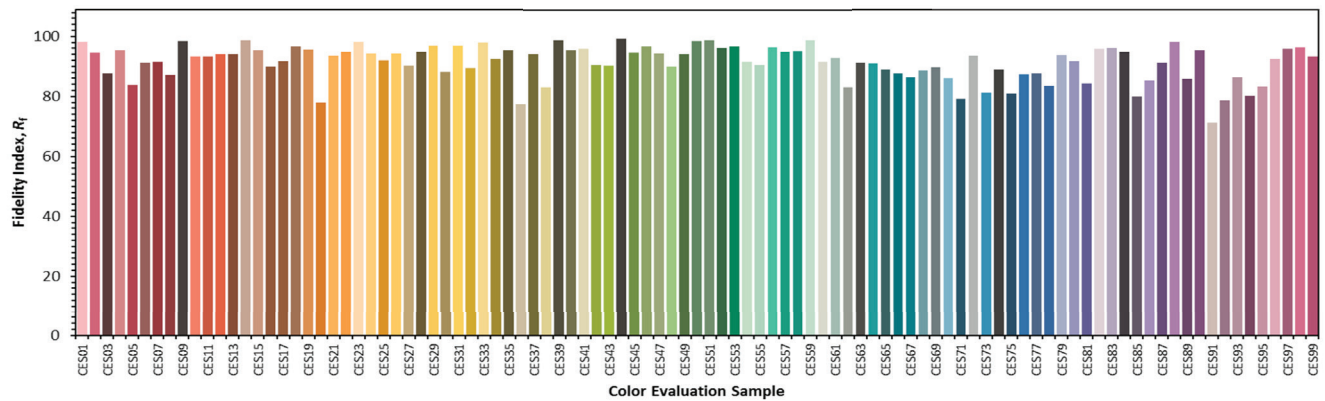
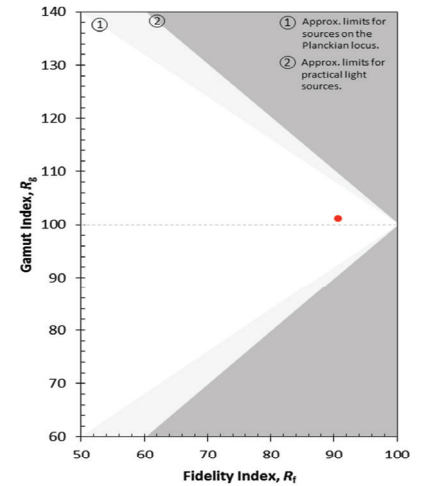
Photometric Code	CCT	CRI	R9	R _f	R _g
W930/339	3000 K	95	86	92	101

Color
Vector
Graphic

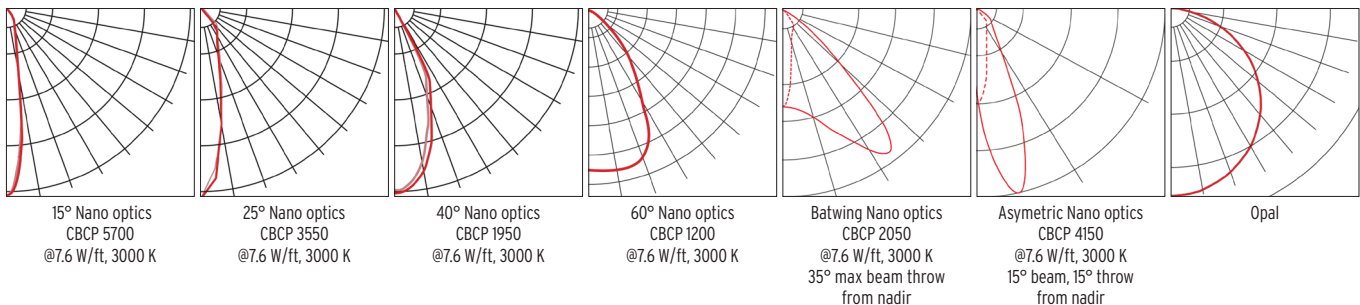


Reference
Illuminant
Test Source

Color
Distortion
Graphic




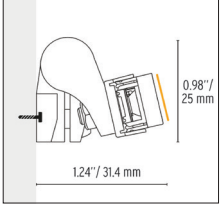
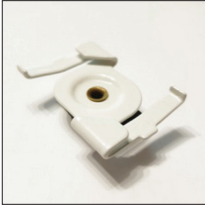
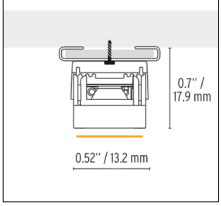
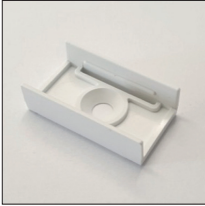
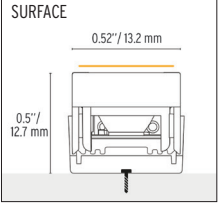
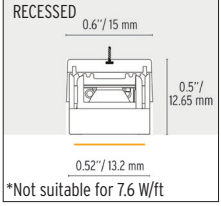
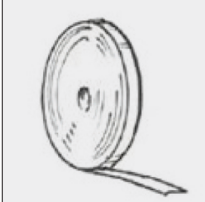
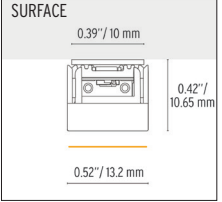
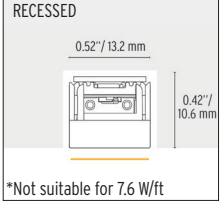
Light Distribution






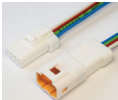
VOLTAGE DROP CHART – ULTIMA-S NANO

Static White – AWG22										Tunable White AWG23	
1.8 W/ft				3.1 W/ft		4.6 W/ft		7.6 W/ft		6.1 W/ft	
Product run Length		max. cable length between driver and the luminaire									
feet	m	feet	m	feet	m	feet	m	feet	m	feet	m
3.3	1	106.0	32.3	63.6	19.4	42.3	12.9	33.5	10.2	31.8	9.7
6.6	2	52.8	16.1	31.8	9.7	21.0	6.4	16.7	5.1	15.7	4.8
9.8	3	35.1	10.7	21.0	6.4	14.1	4.3	11.2	3.4	10.5	3.2
13.1	4	26.2	8	15.7	4.8	10.8	3.2	–	–	–	–
16.4	5	21.0	6.4	12.5	3.8	8.2	2.5	–	–	–	–
19.7	6	17.4	5.3	–	–	–	–	–	–	–	–
23.0	7	15.1	4.6	–	–	–	–	–	–	–	–

Mounting Accessory Details

Item	Description	Dimensions
	Adjustable Mounting Clip Adjustable mounting clip for easy adjustment of the luminaire Black finish only 0° - 180° rotation span 2 pieces are included for lengths: 11", 21", 31" 3 pieces are included for lengths: 41", 51", 61"	
	Grid Ceiling Clip Grid ceiling clip for easy mounting along or across struts of the grid ceiling structure by simply rotating the clip 90° Suitable for 15/16" Grid Systems 3 pieces are included for lengths: 11", 21", 31" 6 pieces are included for lengths: 41", 51", 61"	
	Surface/Recessed Mounting Clip Clips for surface or recessed mounting 3 pieces are included for lengths: 11", 21", 31" 6 pieces are included for lengths: 41", 51", 61" Black or white finish depending on profile color	<div>   </div> <p>*Not suitable for 7.6 W/ft</p>
	Magnetic Mounting - Steel Strip Metal strip with adhesive tape on the backside for easy integration into furniture and almost any other surface 0.4" wide X 100' long *Order separately with magnetic (MAG) option Order no: 18100048 (one reel)	<div>   </div> <p>*Not suitable for 7.6 W/ft</p>


Cables and Connectors

Item	Description	Model	Dimensions	Order Code
	Mini Female Connector IP67 for Static White Use to run cable from the driver to the first fixture of the run or to the next fixture. Female mini connector on one side and open end cable on the other side.	Static White Static White	2 x 22 Awg, 8 in 2 x 22 Awg, 6.5 ft	15000141 15000142
	Mini Extension IP67 for Static White Use to extend the distance between connection points. Female connector on one side and male connector on the other side.	Static White Static White	2 x 22 Awg, 4 in 2 x 22 Awg, 6.5 ft	15000143 15000144
	Mini Female Connector IP67 for Tunable White Use to run cable from the driver to the first fixture of the run or to the next fixture. Female mini connector on one side and open end cable on the other side.	Tunable White Tunable White	4 x 23 Awg, 8 in 4 x 23 Awg, 6.5 ft	15000241 15000202
	Mini Extension IP67 for Tunable White Use to extend the distance between connection points. Female connector on one side and male connector on the other side.	Tunable White Tunable White	4 x 23 Awg, 4 in 4 x 23 Awg, 6.5 ft	15000203 15000204

Drivers

Item	Specifications	Downloads
LED LINEAR™ Non-Dimmable Drivers 	<ul style="list-style-type: none"> • UL 8750 Listed Enclosure - With Built-In Junction Boxes • Universal Input Voltage 120V - 277V • IP65 - For Both Indoor and Outdoor Use • No Minimum Load Requirement • 24V Constant Voltage Output, Class 2 • Available in three wattages 30W, 60W and 96W • Max. Dimensions: 12-1/8" x 2-3/8" x 1-3/8" 	30 W SPEC SHEET 60 W SPEC SHEET 96 W SPEC SHEET INSTALLATION INSTRUCTIONS
LED LINEAR™ 0-10V Dimmable Drivers 	<ul style="list-style-type: none"> • UL 8750 Listed Enclosure - With Built-In Junction Boxes • 0-10V Dimmable - Flicker Free Down to 1% • Universal Input Voltage 120V - 277V • IP65 - For Both Indoor and Outdoor Use • 24V Constant Voltage Output, Class 2, Class P • Available in three wattages 30W, 60W and 96W • Max. Dimensions: 12-1/8" x 2-3/8" x 1-3/8" 	30 W SPEC SHEET 60 W SPEC SHEET 96 W SPEC SHEET INSTALLATION INSTRUCTIONS
LED LINEAR™ ELV/Triac Dimmable Drivers 	<ul style="list-style-type: none"> • UL 8750 Listed Class 2 Enclosure • 24V constant voltage output • Compact size yet high efficiency and performance in dry and damp environments (IP67) • Multiple Inputs: 120V or 277V • Fully dimmable: ELV Dimmers - Reverse or Adaptive Phase Control, Trailing Edge • Available in two wattages 48W and 96W • Multiple Circuits are available up to 4 units (up to 384W) 	48 W SPEC SHEET 96 W SPEC SHEET INSTALLATION INSTRUCTIONS
 PWM Dimmable Drivers 	<ul style="list-style-type: none"> • Universal AC input / Full range (up to 305VAC) • Constant voltage PWM style output • Built-in 3 in 1 dimming function (0-10Vdc or PWM signal or resistance) • Dimming range : 0-100% • Class 2 power unit • Suitable for dry / damp / wet locations • UL Recognized component, 5 years warranty 	40 W SPEC SHEET 60 W SPEC SHEET 90 W SPEC SHEET INSTALLATION INSTRUCTIONS
 Dimmable Drivers 	<ul style="list-style-type: none"> • UL Listed Enclosure • Dimming Range: 100% to 1% and 0.1% (Premiere) • LED lighting turns on to any dimmed level without flashing to full brightness • Operating Voltage: 120V~ to 277V~ at 50/60 Hz • Rated lifetime of 50,000 hours at 40°C (104°F) ambient temperature and maximum loading • For rated warranty, ambient temperature not to exceed 40°C (104°F) • Open-circuit protected output 	HI-LUME SPEC SHEET HI-LUME PREMIERE SPEC SHEET INSTALLATION INSTRUCTIONS
eldoLED DALI/DMX Dimmable Drivers 	<ul style="list-style-type: none"> • Available in linear or rectangular format • 100W, DMX/DALI interface for Static White, Tunable White and RGB/W Applications • 4 control channels • 24V constant voltage, 4 x 24V outputs • Metal or plastic case options 	100 W SPEC SHEET INSTALLATION INSTRUCTIONS

Controllers

Item	Specifications	Downloads
eldoLED Controllers 	<ul style="list-style-type: none"> 180/D DMX Controller for RGB/W and Tunable White Applications 210/D Dali Controller for Static White Applications 211/D-LG 0-10V Logarithmic Dimming Controller 211/D-LN 0-10V Linear Dimming Controller 212/D DMX Controller for Static White and Static Color Applications DimWheel DMX Wall Controller for RGB/W and Tunable White Applications 	180/D SPEC SHEET 210/D SPEC SHEET 211/D-LG SPEC SHEET 211/D-LN SPEC SHEET 212/D SPEC SHEET DIM WHEEL SPEC SHEET

Click for more information

PRODUCT BROCHURE

INSTALLATION

IES FILES

DRIVERS & CONTROLS

LED LINEAR TECHNOLOGY

VOLTAGE DROP CALCULATOR