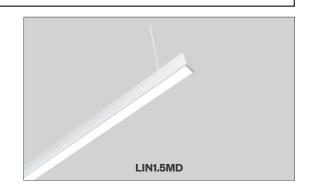
### Linear Direct, Remote Driver



### PROJECT: TYPE:

### **Features**

Linea drives your design scenario, seamlessly. Streamlined and flexible, these architectural LED pendants provide the freedom to create truly dynamic spaces. A synthesis of aesthetics, performance and energy efficiency, the Linea family delivers on its promises. Our tiny new Linea 1.5" pendant proves when it comes to lighting, less really is more. Linea. The power of disciplined design.



### **Product Overview**

Type: Cable Suspended or Surface Mounted, Direct, Remote Driver

Wattage: 5W/ft, 10W/ft (other wattages available see p2)

Color Temp: 2700K, 3000K, 3500K, 4000K

**CRI**: 83 or 90+ typ.

Dimming: 0-10V, 1% dimming (standard)

Lutron LDE1 Hi-lume® 1% Dim Soft-On/Fade-to-Black

DALI dimming, 1% dim

### **Certifications**





### **Fixture Summary**

### **Performance Data**

Wattage per Foot	Delivered Lumens	LPW	Color Temp	CRI
5	1920	105.2	3500K	83
10	3691	101.1	3500K	83

Data is based on 3500K-83120V IES files available on website.

Data is based on 4' fixture with Performance lens.

### Electrical Data

		4'	•	8'				
Wattage		System		System				
per Foot	Voltage	Watts	Amps	Watts	Amps			
5	120V	18.2	0.15	36.5	0.30			
	277V	18.2	0.07	36.5	0.13			
10	120V	36.5	0.30	73.0	0.61			
	277V	36.5	0.13	73.0	0.26			

Electronic multi-volt (120-277VAC), constant current LED driver.

### Standard Patterns

L		Ш		7	Wall to Ceiling	Custom*			
Yes	Yes	Yes	Yes	Yes	No	Yes			

<sup>\*</sup> Submit drawing, consult factory.



Individual Runs: 2' - 8' (whole foot standard).

Runs

Continuous Runs: Available (whole foot standard).

Custom: Made to measure lengths available (nearest 1/8" of field dimensions).

Requires approval drawings. Added cost & lead time.

### Linear Direct, Remote Driver



PROJECT: TYPE:

### **Ordering Information**

LIN1.5MD-A17. 120/277 5 8 9 10 1 7 Model 2 **Optics** 3 Mounting Wattage (per foot) LIN1.5MD-A17<sup>+</sup> PL performance lens (standard) Pendant Mount (mini cable suspension) Surface Mount Standard Optional (Mini Direct, remote driver) SLDW straight blade louver, white MASW10 through ceiling tile or gyp SM surface mount **5** 5W/ft 3\* 3W/ft aluminum, solid blades w/overlay board, white, 10 10 10W/ft 4\* 4W/ft SLDB straight blade louver, black, MASW10SF through ceiling tile or gyp 6 6W/ft solid blades w/overlay 7 7W/ft board, silver foil cord, white canopy, 10' 8 8W/ft SLDS straight blade louver, silver, MASB10 through ceiling tile or gyp solid blades w/overlay 9 9W/ft board, black, 10' **ASY** asymmetric lens MASBIOSF through ceiling tile or gyp \* 4' min. length required GRZ grazer lens (suggest cove board, silver foil cord, black canopy, 10' installation, see pg 4) MASW10T over ceiling tee, white, 10' DRP1 1" drop lens MASW10SFT over ceiling tee, silver foil cord, white canopy, 10' MASB10T over ceiling tee, black, 10' MASB10SFT over ceiling tee, silver foil cord, black canopy, 10' 5 Color Temp Finish Voltage 8 Length 83 CRI 90+ CRI HW high reflectance matte white 120/277 **27** 2700K-83 279 2700K-90+ **BT** black texture Length B Length C Length A **30** 3000K-83 309 3000K-90+ ST silver texture all patterns all patterns - PU 35 3500K-83 359 3500K-90+ For other RAL color, consult factory - PZ - IND - PR (2 lengths of 2) - CON **40** 4000K-83 409 4000K-90+ - CUS

### 9 Configuration

IND¹ individual fixture, 2' to 8' in 1' increments
CON continuous run > than 8', specify to nearest foot
CUS custom made to measure, +/- 1/8" of customer

Standard Patterns (see pg 6 for details)

supplied field dimensions

PLL L left, (2) straights + (1) 90° corner, leg right
PLR L right, (2) straights + (1) 90° corner, leg left
PLL L shape, (3) straight lengths + (2) 90° corner,

**PU** U shape, (3) straight lengths + (2) 90° corners **PR** Rectangle shape, (4) straight lengths + (4) 90°

**PZ** Z shape, (3) straight lengths + (2) 90° corners For custom patterns, submit an EDR on amerlux.com

### 10 Drivers/Controls

**0-10V** 1% analogue dimming, 120-277VAC, dim to off when selected with wireless dimming control **HILUME-H-ECO** Lutron LDE1 Hi-lume® 1% dim Soft-On/Fade-to-Black **DALI** DALI dimming 120-277VAC, 1% dim

<sup>†</sup> The "A" refers to the sequential revision in a year and "XX" refers to the year of update. Updates coincide with improved performance while not changing the overall fixture aesthetic and are reflected in the published performance data. Please contact your Ameriux representative for explanations of changes.

<sup>&</sup>lt;sup>1</sup> Lengths less than 4' may have restrictions based upon wattage, lengths, drivers or other options

### Linear Direct, Remote Driver



### PROJECT: TYPE:

### **Specifications**

### Application

Open office plan, conference rooms, corridors or any indoor space where the higher light levels of a direct ambient lighting system are required. Remote location of the driver allows for a small housing with the full power of Linea 1.5 Direct.

#### Construction

One piece extruded aluminum housing is (11/2" wide X 17/8" high). Die-cast End Caps match fixture body finish. Painted die-formed, cold-rolled steel internal components are protected against rust and corrosion.

#### Optical

All lenses are snap-in, extruded acrylic, with a maximum length of 8'. Fixtures shipped with lenses installed. Amerlux's proprietary acrylic lens provides excellent transmission while effectively concealing source image. All louvers are retained with spring clips attached to louver side rails, for good fit and retention.

**PL** - Performance Lens provides high efficiency with greater lens surface brightness.

**SLDx** - Straight blade Louver Direct has 0.5" high blades 0.493" on center with overlay. Available in (*W*) white aluminum (*light gray, appears white when lit*), (*B*) black or (*S*) silver.

**ASY** - Asymmetric 20° throw lens is backed high diffusion film that eliminates striations.

**GRZ** - Grazer lens for highlighting wall surfaces. Suggest surface mounting and cove installation to avoid high angle brightness. No overlay is used to enhance grazing performance. (see page 4)

DRP1 - 1" Drop lens with illuminated end caps.

### LED

Amerlux's boards and patented connectors with industry recognized LEDs chips enables excellent thermal management and allows Amerlux to offer a 5 year warranty. Our LED binning is within 3 MacAdam ellipse. LED boards are easily replaced in the field with just a Philips screw driver.

Color Temperature Options: 2700K, 3000K, 3500K, 4000K

CRI: 83 typical, 90+ typical

**R9**: 16 @ CRI 83 **R9**: >50 @ CRI 92

Life: 50,000+ hr., > 70% of initial lumens (L70)

### Electrical

### Remote Driver Wiring:

Driver is supplied installed in remote driver box, (one driver per box), with 5' of low voltage plenum rated cable. Fixture supplied with power cord ready to be connected to J-Box (by others) over cable canopy. Amerlux recommends a maximum of 25' between the fixture and the remote driver box. Consult factory with job specific electrical spec if more than 15' is required. Feeds are added as required by specified wattage and driver maximums.

### See page 4 for wiring illustration

Standard Wattage: 5W/ft, 10W/ft.

Optional Wattages: 3W/ft, 4W/ft, 6W/ft, 7W/ft, 8W/ft, 9W/ft. (3W & 4W have a minimum length of 4'). For other wattages consult factory.

This product complies with IEEE C62.41 for surge endurance up to 2.5KV. Amerlux® recommends using additional surge protection with this unit (supplied by others), surge damage is not covered under warranty.

Emergency circuit via remote inverter or auxiliary emergency power supply (by others).

### Finish

All painted surfaces are premium powder coated baked on for maximum durability and color stability.

For special paint colors, supply RAL and/or actual paint chip for factory consultation.

#### Configurations/Lengths

**IND** - Individuals are stand alone fixtures made of single lengths of 2' to 8' (*in 1' increments*). They are supplied with matching painted End Caps and the required mounting hardware. Lengths less than 4' may have restrictions based upon wattage, lengths, drivers or other options.

**CON** - Continuous runs are longer than 8', specified to the nearest whole foot. Continuous runs less than 16' are made of 2 lengths. Continuous runs longer than 16' start with a 8' Beginning of Row (BoR) fitted with an End Cap. The majority of the runs are made up of 8' Middle of Run (MoR) lengths. End of Run (EoR) units are made up of 2' to 8' units to the nearest whole foot or a combination of a last 4' MoR and a 5', 6' or 7' EoR. Factory installed pins and splines simplify fixture alignment. Lengths are quickly joined with "catch and latch" mechanisms or screws and sturdy brackets. Quick connectors simplify field wiring.

**CUS** - Custom made to measure runs are made to nearest 1/8" of customer supplied field measurements. They can be a single custom length or runs configured as described above only EoR's are 2' to 8' cut to the nearest 1/8" exact length or a combination of a last 4' MoR with an EoR cut to exact length to the nearest 1/8".

**PXX** - Standard patterns consist of 90° corners with standard lengths (3' to 8' in 1' increments) or custom lengths. Depending upon complexity of the pattern, drawings may be required. When ordering please give overall lengths.

### See page 7 for layouts.

For custom patterns submit an EDR on amerlux.com.

### Mounting

**LIN1.5MD-A17...MASW10**- Mini Direct pendant mount is only 1.5" wide x 1.875" high. The remote driver box is  $19^{3}/_{4}$ " long and can be located up to 15' from fixture with a 0-10V driver or Lutron driver. 15' of low voltage plenum rated cable supplied (10' off fixture/5' off box). (see page 4)

### Mini Cable Suspension:

Thinner cable, smaller gripper and cable coupler are all scaled down to match the reduced size of the LIN1.5 Mini series. 5" diameter by 0.25" canopy is used for both feed and non-feed Mini Cable Kits. Low Voltalge power feeds are 22 gauge 2 conductor SJT cords supplied in same color as canopy or with optional silver foil clear jacked cords. Amerlux supplies the required feed and non-feed suspension kits based upon length, electrical options and customer requirements. Suspension kit options include: color, length and mounting condition.

**LIN1.5MD-A17...SM** - Direct Surface Mounted - Housing needs to be attached to solid structure above. Mounting holes are pre-drilled at factory. Some fixture disassembly and reassembly required. Mounting hardware by others.

### Certifications

Approved to UL standards for damp locations as tested by CSA Intended for indoor use only

### Warranty

Amerlux's 5 year limited warranty. Please consult Amerlux website for details.

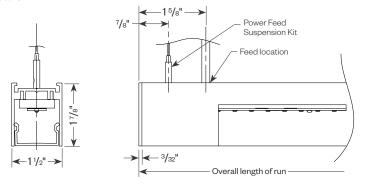
### Linear Direct, Remote Driver



**PROJECT:** TYPE:

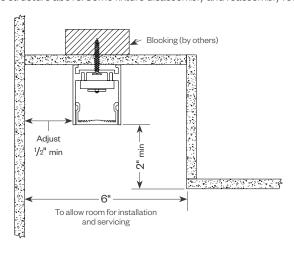
### **Product Details**

### **Pendant**



### **Surface Mount - Grazer**

The Grazer Lens for the Linea 1.5 Mini Direct was created to provide an effective and low cost wall grazing lighting tool. A cove or valance is recommended to block direct glare at mid to high angles. Surface mounting requires the housing to be attached to the structure above. Some fixture disassembly and reassembly required.



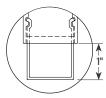
### **Optional Louver/Drop Lens**





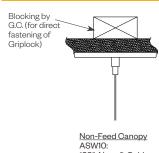


Optional Solid Blade Louver

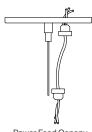


Optional Drop Lens

### **Suspension Detail**

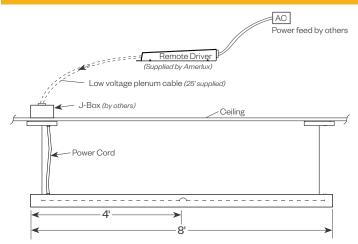


ASW10: 120" Aircraft Cable Ø5" White Canopy

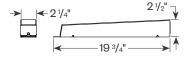


Power Feed Canopy ASW10: 120" Aircraft Cable 10' White Cord 16/3 Ø5" White Canopy

### **Remote Driver**



### **Remote Driver Box**

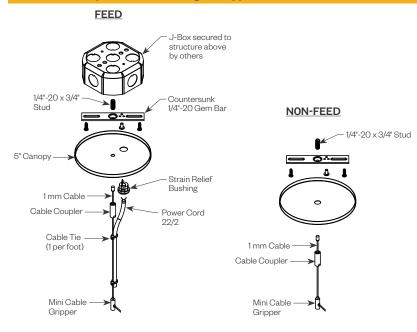


Linear Direct, Remote Driver



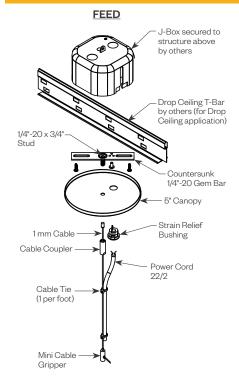
PROJECT: TYPE:

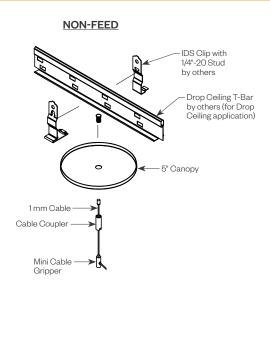
### Cable Kit Suspension - Ceiling or Gypsum Board (MASW10, MASW10SF, MASB10, MASB10SF)



Cat#	Length	Cord/Canopy	Application
MASW10	10'	white/white	ceiling tile/gypsum
MASW10SF	10'	silver foil/white	ceiling tile/gypsum
MASB10	10'	black/black	ceiling tile/gypsum
MASB10SF	10'	silver foil/black	ceiling tile/gypsum
MASW10T	10'	white/white	ceiling tee
MASW10SFT	10'	silver foil/white	ceiling tee
MASB10T	10'	black/black	ceiling tee
MASB10SFT	10'	silver foil/black	ceiling tee

### Tee Grid or Screw Slot (MASW10T, MASW10SFT, MASB10T, MASB10SFT)





### Linear Direct, Remote Driver



PROJECT: TYPE:

### Linea 1.5" Mini Patterns

### **Standard Patterns**

All corners are standard 90°, standard length legs.

Use standard lengths: 4' min to 8' in 1 foot increments.

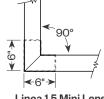
Continuous runs must be the same length in pairs for closed configuration.

### **Custom Patterns**

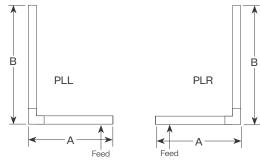
Please provide drawings of your configuration.

Made to Measure: +/- 1/8", consult factory.

PC - custom pattern, please provide drawings and consult factory.



**Linea 1.5 Mini Lens** Mitered Lens

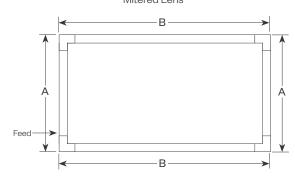


 $\textbf{PLL} - L \ \text{Left, (2) straights} + \textbf{(1)} \ 90^{\circ} \ \text{corner, leg right}$ 

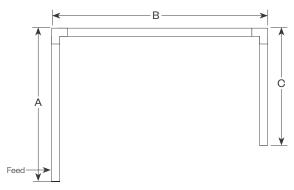
**PLR** - L Right, (2) straights + (1) 90° corner, leg left

Provide overall lengths: A' & B'

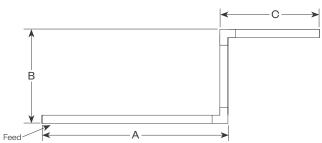
Nomenclature: A-B-PLL A-B-PLF



PR - Closed Rectangle, (4) straight lengths + (4) 90° corners Provide overall lengths: A' & B' Nomenclature: A-B-PR



**PU** - Open U, (3) straight lengths + (2) 90° corners Provide overall lengths: A', B' & C' Nomenclature: A-B-C-PU



**PZ** - Open Z, (3) straight lengths + (2) 90° corners Provide overall lengths: A', B' & C' Nomenclature: A-B-C-PZ

### Linear Direct, Remote Driver



**PROJECT:** TYPE:

### **Performance Data**

Multiplying Factors: (Multiplying Factor is based on 3500K-83 120V IES file on website)

Wattage:	3W	4W	5W	6W	7W	8W	9W	10W
Factor:	0.31	0.42	0.53	0.63	0.72	0.81	0.90	1.0

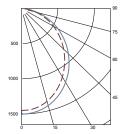
90-180

CCT Factors:							
CRI	2700K	3000K	3500K	4000K			
83	0.92	0.97	1.0	1.02			
90	0.81	0.84	0.86	0.89			

	Louver				
Finish:	SLV	BLK			
Factor:	1.0	0.65			

### LINEA 1.5" MINI PERFORMANCE LENS 10W 3500K 4FT

Total Watts: 37 Total Lumens: 3691 Source: 96 White LED's



### LTL# 14664757.01 ZONAL LUMEN SUMMARY

Zone	Lumens	%Fixt
0-40	1759	47.7
0-60	2984	80.8
0-90	3691	1000

0 Efficacy (lumens/watt) = 101.1 lm/W

0.0

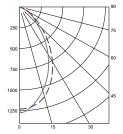
### COEFFICIENTS OF UTILIZATION

RC	80							
RW	70	50	30	10				
RCR								
0	119	119	119	119				
1	109	105	100	97				
2	100	92	85	79				
3	91	81	73	66				
4	83	72	63	57				
5	77	64	55	49				
6	71	58	49	43				
7	66	53	44	38				
8	62	48	40	34				
9	58	44	36	31				
10	54	41	33	28				
Note: Values expressed as % of total lumon output								

Note: Values expressed as % of total lumen output delivered to the task surface.

#### LINEA 1.5" MINI STRAIGHT BLADE LOUVER (SLV) 10W 3500K 4FT

Total Watts: 37 Total Lumens: 1584 Source: 96 White LED's



### LTL# 14664757.05

ZONAL LUMEN SUMMARY							
Zone Lumens %Fixt							
0-40	1129	71.3					
0-60	1502	94.8					
0-90	1584	100.0					
90-180	0	0.0					

Efficacy (lumens/watt) = 43.5 lm/W

### COEFFICIENTS OF UTILIZATION

RC		8	80		
RW	70	50	30	10	
RCR					
0	119	119	119	119	
1	112	109	106	103	
2	105	99	94	89	
3	98	90	84	79	
4	91	82	75	70	
5	86	75	68	63	
6	80	70	62	57	
7	75	64	57	52	
8	71	60	53	48	
9	67	56	49	44	
10	63	52	45	41	

Note: Values expressed as % of total lumen output

delivered to the task surface.

### Linear Direct, Remote Driver



PROJECT: TYPE:

### **Performance Data**

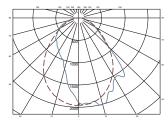
Multiplying Factors: (Multiplying Factor is based on 3500K-80 120V IES file on website)

Wattage:	3W	4W	5W	6W	7W	8W	9W	10W
Factor:	0.31	0.42	0.53	0.63	0.72	0.81	0.90	1.0

CCT Factors:					
CRI	2700K	3000K	3500K	4000K	
83	0.92	0.97	1.0	1.02	
90	0.81	0.84	0.86	0.89	

#### LINEA 1.5" MINI ASYMMETRIC LENS 10W 3500K 4FT

Total Watts: 37 Total Lumens: 4046 Source: 96 White LED's



### LTL# 14664757.02

ZUNALL	ZUNAL LUIVIEN SUIVIIVIART						
Zone	Lumens	%Fixt					
0-40	2048	50.6					
0-60	3358	83.0					
0-90	4046	100.0					
90-180	0	0.0					

Efficacy (lumens/watt) = 110.8 lm/W

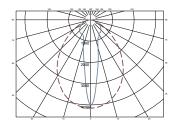
### COEFFICIENTS OF UTILIZATION

RC		8	0	
RW	70	50	30	10
RCR				
0	119	119	119	119
1	110	105	101	97
2	100	92	86	81
3	92	82	74	68
4	85	73	65	58
5	78	66	57	51
6	72	60	51	45
7	67	54	46	40
8	63	50	41	36
9	59	46	38	32
10	55	42	35	30
N=+=- 1 /-				4 4

Note: Values expressed as % of total lumen output delivered to the task surface.

### LINEA 1.5" MINI GRAZER LENS 10W 3500K 4FT

Total Watts: 37 Total Lumens: 4065 Source: 96 White LED's



### LTL# 14664757.04

ZONAL LUMEN SUMMARY					
Zone	Lumens	%Fixt			
0-40	2219	54.6			
0-60	3418	84.1			
0-90	4065	100.0			
90-180	0	0.0			

Efficacy (lumens/watt) = 111.3 lm/W

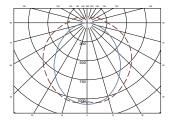
### COEFFICIENTS OF UTILIZATION

RC		8	0	
RW	70	50	30	10
RCR				
0	119	119	119	119
1	110	106	102	98
2	101	94	88	82
3	93	84	76	70
4	86	75	67	61
5	80	68	60	54
6	75	62	54	48
7	70	57	49	44
8	65	53	45	40
9	62	49	42	36
10	58	46	39	34
N=+=-1/=			-4-11	

Note: Values expressed as % of total lumen output delivered to the task surface.

### LINEA 1.5" MINI DROP LENS 10W 3500K 4FT

Total Watts: 37 Total Lumens: 4014 Source: 96 White LED's



LTL#14664757.03 **ZONAL LUMEN SUMMARY** 

Zone	Lumens	%Fixt		
0-40	1339	33.4		
0-60	2397	59.7		
0-90	3427	85.4		
90-180	588	14.6		
Efficacy (lumens/watt) = 109.9 lm/W				

### COEFFICIENTS OF UTILIZATION

	8	0	
70	50	30	10
116	116	116	116
103	98	93	88
93	84	77	70
85	73	65	58
77	65	55	48
71	58	48	41
65	52	42	36
60	47	38	32
56	43	34	28
52	39	31	25
49	36	28	23
	116 103 93 85 77 71 65 60 56	70 50  116 116 103 98 93 84 85 73 77 65 71 58 65 52 60 47 56 43 52 39	116 116 116 116 103 98 93 93 84 77 85 73 65 77 65 55 71 58 48 65 52 42 60 47 38 56 43 34 52 39 31

Note: Values expressed as % of total lumen output delivered to the task surface.

### Linear Direct, Remote Driver



PROJECT: TYPE:

### **Static White - Dimming Compatibility**

Amerlux® Linea® fixtures are compatible with all major dimming protocols prevalent in the United States. Please see below for general compatibilities and wiring diagrams. Amerlux recommends testing your unique dimming configuration as the exact full configuration (*Dimmer, Fixture Quantity, Voltage, etc.*) may affect dimming performance.

### --- NOTE: INFORMATION BELOW IS FOR WIRED DIMMERS ONLY. FOR WIRELESS DIMMERS, CONSULT FACTORY ---

0 10\/\Wining Dia ----

### 0-10V - DIMMING (Standard)

Integrates into a variety of building management and daylighting controls

#### Notes:

- 120V or 277V\*
- · Dims down to 1% light output
- · Requires interface to turn off power to driver
- Consult Dimming manufacturer for installation instructions - DO NOT SHARE NEUTRALS!

0-10V W	riring Diag	ram				1
					Driver	
	0-10V	•	Gray		0-10V (-)	
<sub>o</sub> Line	Dimming	P	urple	1 -	0-10V (+)	V+ Red
Ground	Control		Black		Switched Hot	
Ţ		\	White		Neutral	V- Black
			areen	•	Ground	
Neut	ral	÷	L			

Compatible Dimmers†:					
Wall Box			Central System		
Lutron:	Wattstopper:	Leviton:	Lutron Grafixk Eye with GRX-TV1 Interface		
Diva - DVSTV	ADF-120277	Renoir II			
Maestro - MS-Z101					
Nova-T - NTSTV-DV					

#### **LUTRON LDE1 DIMMING**

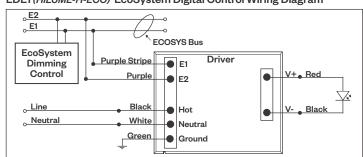
Integrates into Lutron EcoSystem building management

#### Notes

- 120VAC or 277VAC\*
- Dims down to 1% Soft-On/Fade-to-Black
- · EcoSystem Control
- Consult Dimming manufacturer for installation instructions - DO NOT SHARE NEUTRALS!

Compatible Dimmers <sup>†</sup> :					
Lutron ECO System	Central System				
Pow Pak Dimming Modules	Lutron EcoSystem compatible controls				
Energi Savr Node					
Grafik Eye QS/Homeworks					
QS Control Unit					
Quantum Hub					
Homeworks QS/My Room					

### LDE1 (HILUME-H-ECO) EcoSystem Digital Control Wiring Diagram



### **DALI - DALI DIMMING 120V-277V**

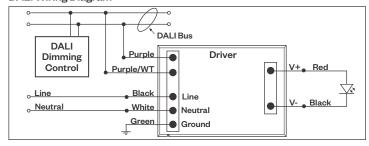
Digital control protocol allows individual fixture control

### Notes:

- 120VAC 277VAC\*
- · Dims down to 1% light output in most cases

Compatible Dimmers <sup>†</sup> :		
Wall Box	Central System	
Leviton CD250 Controller	Dynalite	
	Fifth Light	

### **DALI Wiring Diagram**



### Notes:

- \* Driver is 277VAC dimmable with appropriate dimmer (by others). All provided wiring diagrams show 120VAC wiring colors and method. Please refer to 277VAC dimmer installation instructions for 277VAC wiring diagrams.
- † The absence of a dimmer from the lists above does not imply incompatibility. Please consult factory for compatibility inquiries.