



1" Surface Mount Cylinder



Features

The FINCH family of cylinders with a 1" aperture, features exceptional output, flexibility, and a broad range of configurations to provide discreet quality illumination while integrating into the architecture. It is available in a fixed downlight, adjustable (with 50° tilt), wall mount and even exterior ground mount options. Whether installed on ceilings, walls/mullions or the ground, the FINCH family blends seamlessly into its surroundings.

The FINCH surface downlight cylinder is available in lengths from 3" to 18", up to 1500 lm output and has a choice of beveled front door options for additional shielding. Use alone or in a composition to create a unique design.

Product Overview

Type:	Surface Mount, Direct
Wattage:	6W, 8W, 10W, 12W, 15W, 17W, 20W
Color Temp:	2400K, 2700K, 3000K, 3500K, 4000K
CRI:	80+ & 90+ typ.
Dimming:	0-10V, DALI, TRIAC/ELV, Lutron EcoSystem

PROJECT:

TYPE:

Performance Data

Watts	Lumens	LPW	CCT	CRI
6	643	102.1	3000K	80+
8	787	93.7	3000K	80+
10	927	88.3	3000K	80+
12	1065	83.9	3000K	80+
15	1200	79.9	3000K	80+
17	1331	76.9	3000K	80+
20	1459	73.9	3000K	80+

Data is based on 9" cylinder with 20W, flood optics, 120V, 3000K, 80+ IES files available on website. Consult ordering information and data for other sizes.

Electrical Data

	6W		8W		10W		12W	
	Watts	Amps	Watts	Amps	Watts	Amps	Watts	Amps
120V	6.3	0.054	8.4	0.071	10.5	0.088	12.7	0.107
277V	6.7	0.034	8.6	0.038	10.7	0.044	12.8	0.051
	15W		17W		20W			
	Watts	Amps	Watts	Amps	Watts	Amps		
120V	14.9	0.125	17.3	0.144	19.7	0.164		
277V	15	0.058	17.3	0.065	19.6	0.073		

Electronic constant current LED driver



PROJECT:




TYPE:

To Order, please specify both the light fixture and remote driver.

Fixture Example: FIN9-SMF.12.309.WF.BT.GLD.DB.RC.SOL

Remote Driver Example: FINPW.12.0-10V.MP

1" Surface Mount (with Remote Driver) Ordering Information

1	2	3	4	5	6	7	8	9
1 Model FIN3-SMF 3" FIN6-SMF 6" FIN9-SMF 9" FIN12-SMF 12" FIN18-SMF 18"	2 Wattage 6 6W (643 lm) 8 8W (787 lm) 10 10W (927 lm) 12 12W (1065 lm) 15 15W (1200 lm) 17⁺ 17W (1331 lm) 20⁺⁺ 20W (1459 lm) † Only 6" and up †† Only 9" and up	3 Color Temp and CRI 30 3000K, 80+ 35 3500K, 80+ 40 4000K, 80+ 249 2400K, 90+ 279 2700K, 90+ 309 3000K, 90+ 359 3500K, 90+ 409 4000K, 90+	4 Beam Spreads SP spot 15° FL flood 28° WF wide flood 35° VWF very wide flood 50°	5 Body Finish WT white texture  BT black texture  SLV matte silver  BRZ bronze  DBZ dark bronze  <i>For custom RAL finish, consult factory</i>				
6 Bevel Finish MW matte white  MB matte black  SLV matte silver  BRZ bronze  DBZ dark bronze  <i>For custom RAL finish, consult factory</i> GLD custom gold 	7 Door Style SB standard bevel (1/4" recess) DB deep bevel (5/8" recess)	8 Mounting F flush mount C canopy (Ø5") RC reduced canopy (Ø3-1/2") CDC conduit canopy (Ø4-1/8")	9 Accessories SOL solite lens HEX hexcell louver LS linear spread lens					

Remote Driver Ordering Information

Amerlux offers a mounting plate for each remote driver with accessories for mounting in enclosure by others, or a single remote box for one driver (**RBX**), or a single remote box that can fit two drivers (**RBX2**). Electrical Contractor (EC) is responsible for adherence to all local codes.

FINPW								
1	2	3	4					
1	Model	2	Wattage	3	Drivers/Controls	4	Driver Enclosure	
	FINPW	6	6W (643 lm)		O-10V	0-10V dimming, 1%, 120/277VAC	MP	mounting plate (1 driver)
		8	8W (787 lm)		DALI	DALI dimming, 1%, 120/277VAC	RBX	remote box (1 driver)
		10	10W (927 lm)		LE/TE	TRIAC/ELV dimming, 5%, 120/277VAC	RBX2	remote box (2 drivers)
		12	12W (1065 lm)		HILUME-H-ECO	Lutron LDE1 Hi-lume® 1% Soft-On/ Fade-to-Black, 120/277VAC (10W min)		Note: One wattage & dimming protocol per box.
		15	15W (1200 lm)					
		17	17W (1331 lm)					
		20	20W (1459 lm)					

For enclosure drawings & wiring schematics, see pages 7-10. For Fixture with Integral Driver ordering, see page 3.












PROJECT:
TYPE:

 To Order, please specify both the light fixture and transformer.

Fixture Example: FIN9-SMF-48V.12.309.WF.BT.GLD.DB.RC.0-10V.SOL

Transformer Example: TR-48V100W

1" Surface Mount (with 48V Constant Voltage Integral Driver) Ordering Information

1	2	3	4	5	6	7	8	9	10
1 Model	2 Wattage	3 Color Temp and CRI	4 Beam Spreads	5 Body Finish	6 Bevel Finish	7 Door Style	8 Mounting	9 Drivers/Controls	10 Accessories
FIN6-SMF-48V 6"	6 6W (643 lm)	30 3000K, 80+	SP spot 15°	WT white texture 	MW matte white 	SB standard bevel (1/4" recess)	F flush mount	0-10V 0-10V dimming, 1%	SOL solite lens
FIN9-SMF-48V 9"	8 8W (787 lm)	35 3500K, 80+	FL flood 28°	BT black texture 	MB matte black 		C canopy (Ø5")	DALI DALI dimming, 1%	HEX hexcell louver
FIN12-SMF-48V 12"	10 10W (927 lm)	40 4000K, 80+	WF wide flood 35°	SLV matte silver 	SLV matte silver 		RC reduced canopy (Ø3-1/2")		LS linear spread lens
FIN18-SMF-48V 18"	12 12W (1065 lm)	249 2400K, 90+	VWF very wide flood 50°	BRZ bronze 	BRZ bronze 				
	15 15W (1200 lm)	279 2700K, 90+		DBZ dark bronze 	DBZ dark bronze 		CDC conduit canopy (Ø4-1/8")		
	17+ 17W (1331 lm)	309 3000K, 90+		For custom RAL finish, consult factory					
	20++ 20W (1459 lm)	359 3500K, 90+							
	† Only 6" and up								
	++ Only 9" and up								
		409 4000K, 90+			GLD custom gold 				

Transformer Ordering Information (to power Integral driver)

Amerlux offers 100W 48V DC constant current transformers with enclosure.

TR-48V100W

1
1 Model
TR-48V100W 100W, 48V transformer with enclosure, 120/277V input

For enclosure drawings & wiring schematics, see pages 7-10. For Fixture with Remote Driver ordering, see page 2.

PROJECT:
TYPE:
Specifications
Application

Retail, commercial and hospitality ambient/task lighting

Construction

Extruded aluminum precision machined body, door & heatsink

Optical

TIR optics

 Beam Spreads: Spot 15°, Flood 28°, Wide Flood 35°,
 Very Wide Flood 50°

LED

Color Temp: 2400K, 2700K, 3000K, 3500K, 4000K

CRI: 80+ & 90+ typ.

R9 Values: 11 (83 CRI), 55 (92 CRI)

Binning: 3 MacAdam (SDCM)

Life: 50,000+ hrs, > 70% of initial lumens at 50,000 hrs

Electrical

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 and over voltage damage is not covered under warranty.

Finish

Powder coat paint

Consult factory for custom finishes

Mounting

Surface mount

Certifications

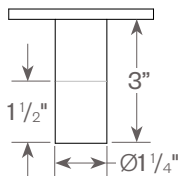
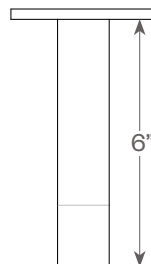
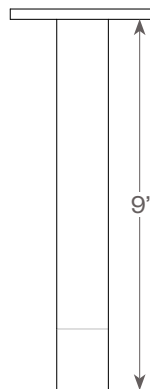
CSA tested to UL standards

Indoor use only

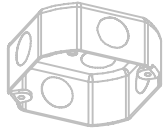
Damp location

Warranty

5 year limited warranty

FIN3-SMF

FIN6-SMF

FIN9-SMF

FIN12-SMF

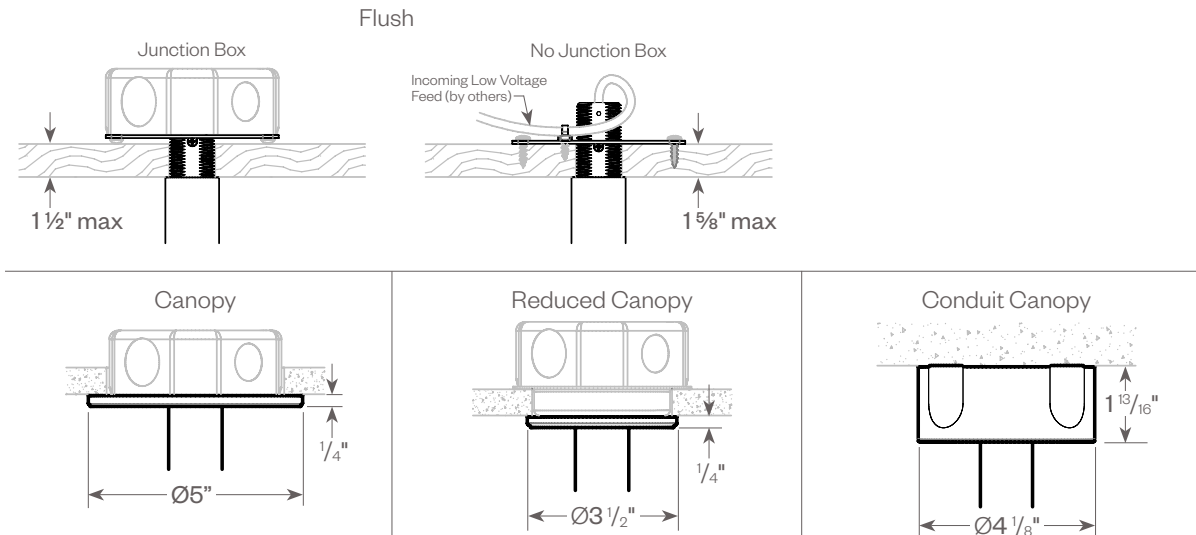
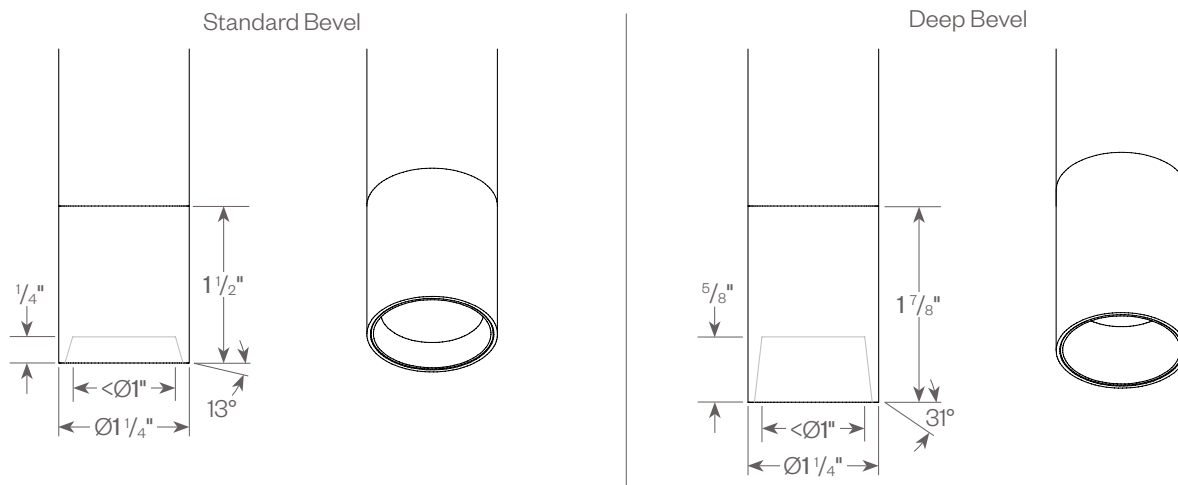
FIN18-SMF


PROJECT:
TYPE:
Junction Box Mounting Requirements


Canopy (C) & Conduit Canopy (CDC) Mounts
Require 4" Octagonal Junction Box (by others)



Reduced Canopy (RC) Mounts also
Require Raised Cover (by others) for
4" Octagonal Junction Box

Mounting Options

Door Styles

Finish Options

Powder coat paint.
Consult factory for custom finishes.



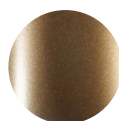
Matte Black



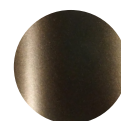
Matte White



Matte Silver



Bronze



Dark Bronze



Black Texture



Custom Gold

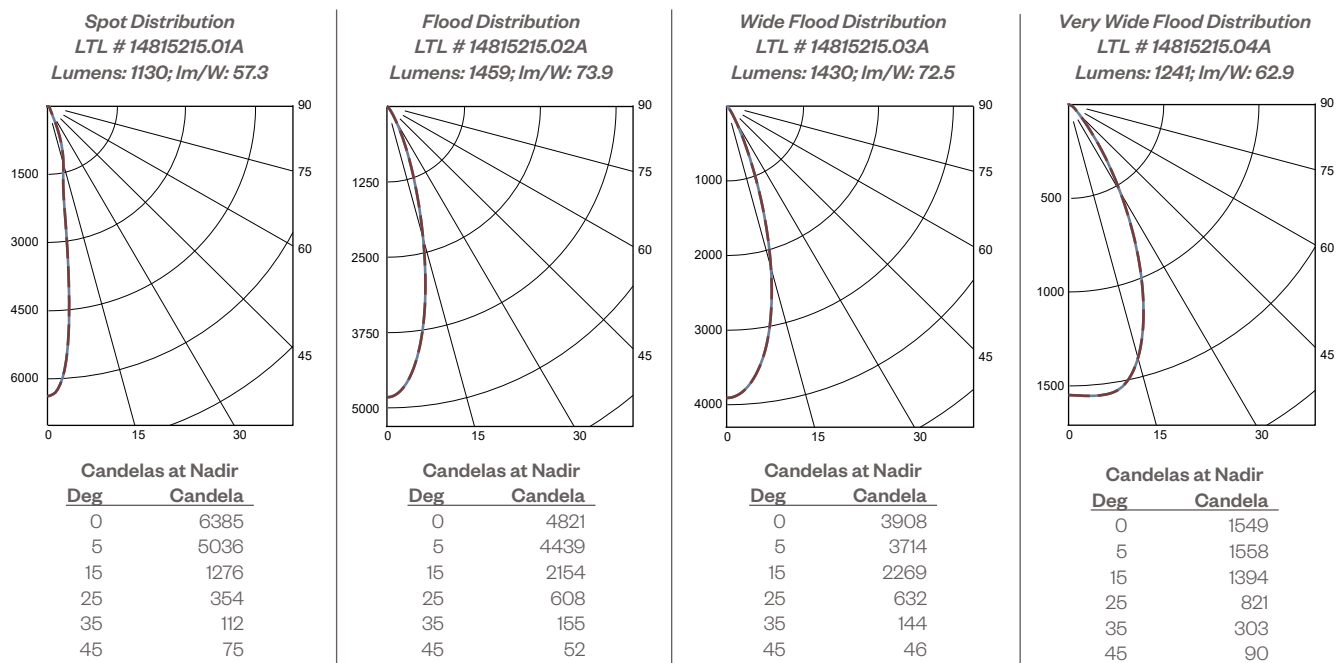
Available for Bevel Finish only

PROJECT:
TYPE:
Fixture Data
MULTIPLYING FACTORS:

Wattage:	6W	8W	10W	12W	15W	17W	20W
Factor:	0.44	0.54	0.64	0.73	0.82	0.91	1.0

CCT:	3000K, 80+	3500K, 80+	4000K, 80+	2400K, 90+	2700K, 90+	3000K, 90+	3500K, 90+	4000K, 90+
Factor:	1.0	1.04	1.06	0.76	0.83	0.88	0.92	0.93

Multiplying Factor is based on 3000K, 80+ 120V IES file on website.

20W, Standard Bevel, 3000K, 80+

Application Data:
Notes and Definitions:

Beam spread is to 50% center beam candlepower (CBCP).

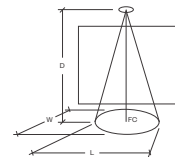
D=Distance to floor or wall.

FC=Footcandles on floor or wall at center beam aiming location.

L=Effective Visual Beam length in feet (50% of maximum footcandle level).


W=Effective Visual Beam width in feet (50% of maximum footcandle level).

CB=Distance across or down to center beam location.



Spot


0° Aiming Angle
Horizontal
Footcandles



D	FC	L	W
5.0'	158	1.9	1.9
7.5'	91	2.5	2.5
10.0'	57	3.0	3.0
12.5'	38	3.5	3.5

Flood


0° Aiming Angle
Horizontal
Footcandles



D	FC	L	W
5.0'	178	2.6	2.6
7.5'	85	3.6	3.6
10.0'	49	4.7	4.7
12.5'	31	5.8	5.8

Wide Flood


0° Aiming Angle
Horizontal
Footcandles



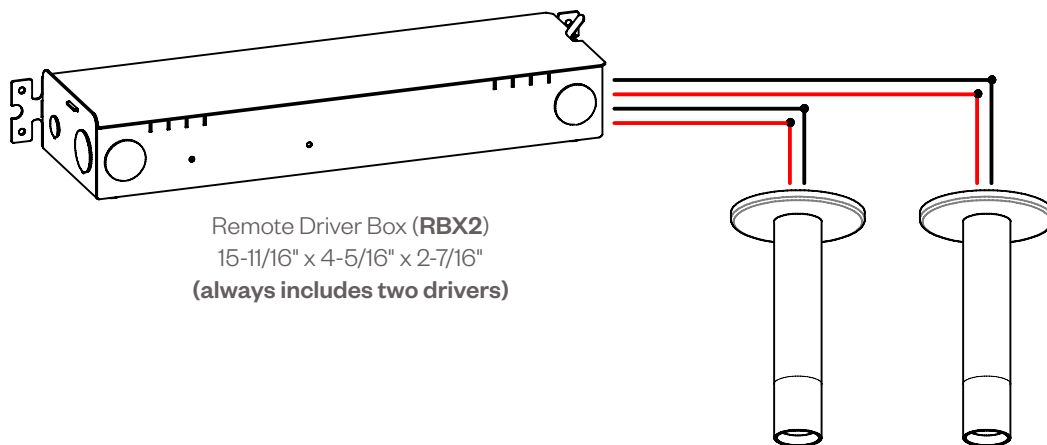
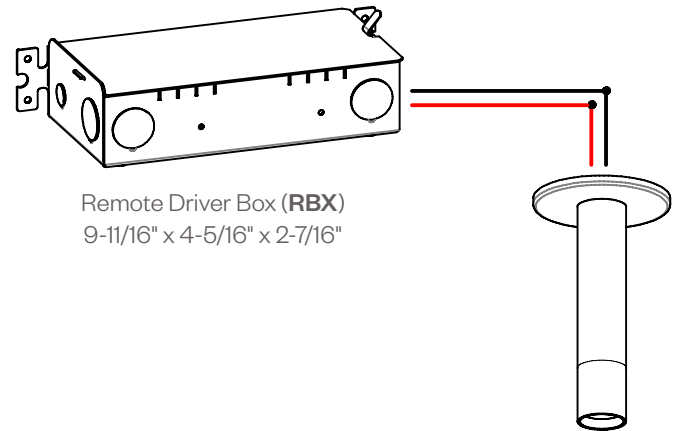
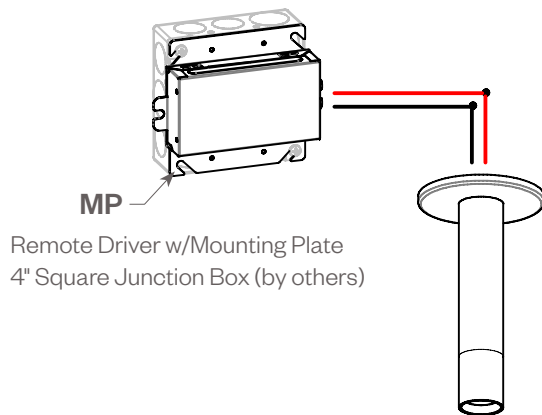
D	FC	L	W
5.0'	138	3.0	3.0
7.5'	66	4.3	4.3
10.0'	38	5.6	5.6
12.5'	25	7.0	7.0

Very Wide Flood

0° Aiming Angle
Horizontal
Footcandles



D	FC	L	W
5.0'	61	4.2	4.2
7.5'	27	6.3	6.3
10.0'	16	8.4	8.4
12.5'	10	10.6	10.6

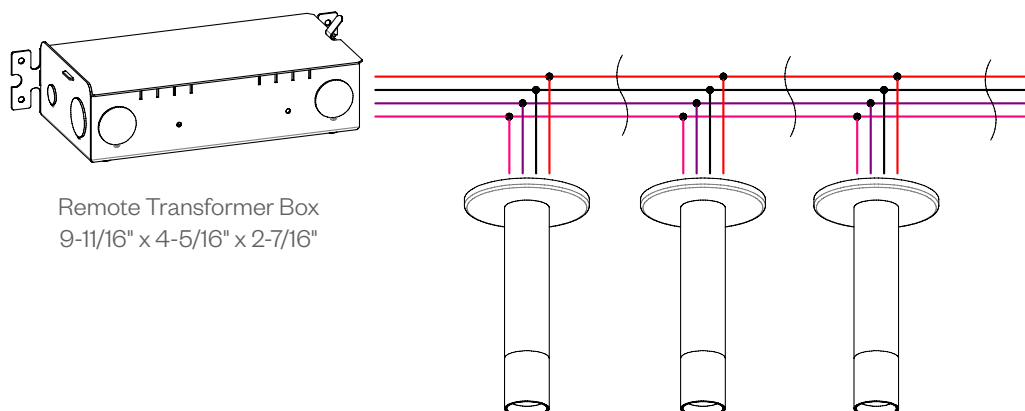
PROJECT:
TYPE:
Power Supply Options for Remote Driver


Please see the example below when choosing the remote driver mounting or enclosure.

With 10 Finch Cylinders, (fixed, adjustable, Wall Direct or Indirect) would be: 10 FINPW-**MP**, or 10 FINPW-**RBX1**, or 5 FINPW-**RBX2**

Power Supply Options for Integral Driver

TR-48V100W 100W, 48V transformer with enclosure, 120/277V input



PROJECT:
TYPE:
DIMMING COMPATIBILITY:

Amerlux® Finch 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.

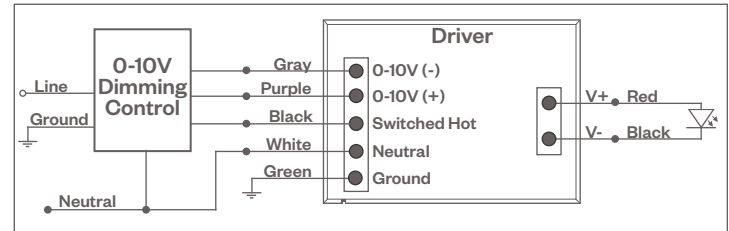
--- NOTE: INFORMATION BELOW IS FOR WIRED DIMMERS ONLY. FOR WIRELESS DIMMERS, CONSULT FACTORY ---

FOR REMOTE DRIVER OPTION
0-10V - DIMMING

Integrates into a variety of building management and daylighting controls

Notes:

- 120VAC or 277VAC
- 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 Wiring Diagram

Compatible Dimmers*:
Wall Box

Lutron "Diva" - DVSTV

Leviton Renoir II 0-10V

Central System

Lutron Grafik Eye with GRX-TVI Interface

DALI DIMMING

Digital control protocol allows individual fixture control

Notes:

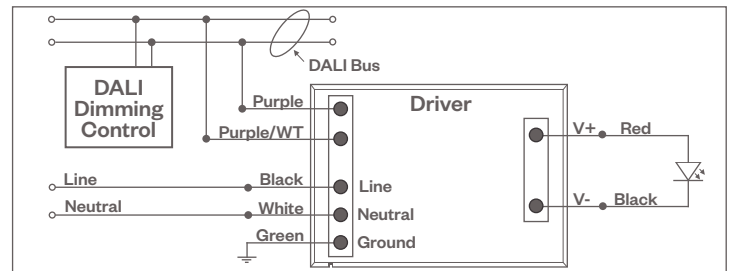
- 120VAC or 277VAC
- Dims down to 1% light output in most cases

Compatible Dimmers*:
Wall Box (3-Wire Fluorescent)

Leviton CD250 Controller

Central System

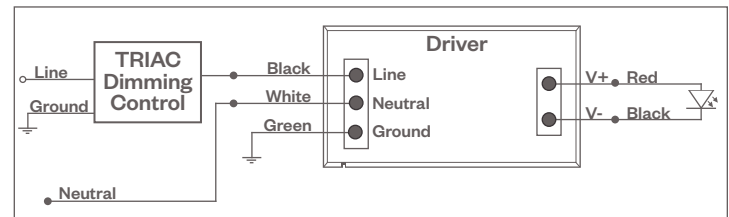
Dynalite
Fifth Light

DALI Wiring Diagram

TRIAC (Forward Phase) DIMMING (Standard)

Utilizes standard TRIAC dimmers that are in wide use in installations across the US. Best for retrofit applications where TRIAC dimmers are installed.

Notes:

- 120VAC or 277VAC*
- Dims down to 5% light output (most cases)
- Consult Dimming manufacturer for installation instructions - DO NOT SHARE NEUTRALS!
- Must meet dimmer Minimum Load Requirements per dimming manufacturer

TRIAC Wiring Diagram

Compatible Dimmers*:
Wall Box (TRIAC 120VAC)

Lutron "Diva"

Lutron "Nova-T"

Lutron "Maestro"

Lutron "Skylark"

Central System

Lutron "GP" Panel

Lutron Grafik Eye QS

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 manufacturer 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.

PROJECT:

TYPE:

DIMMING COMPATIBILITY:

Amerlux® Finch 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 ---

FOR REMOTE DRIVER OPTION

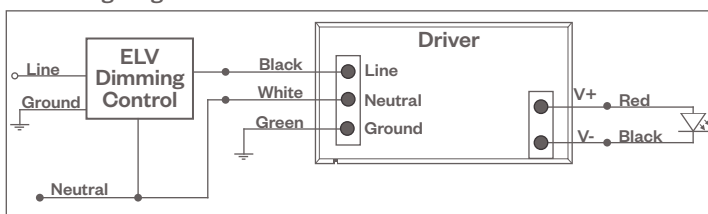
ELV - Electronic Low Voltage (Reverse Phase) DIMMING

Utilizes specialized "ELV" dimmers.

Notes:

- 120VAC or 277VAC*
- Dims down to 5% light output (most cases)
- Consult Dimming manufacturer for installation instructions - DO NOT SHARE NEUTRALS!
- Must meet dimmer Minimum Load Requirements

ELV Wiring Diagram



Compatible Dimmers†:

Wall Box (ELV 120VAC)

Lutron "Diva"
Lutron "Nova-T"
Lutron "Maestro"
Lutron "Skylark"
Leviton "Surslide"
Leviton "Vizio"

Wall Box (ELV 277VAC)

Leviton Revoir II AWSMT-E

Central System

Lutron "GP" Panel with PHPM-PA 120/277VAC
Lutron Grafik Eye QS with PHPM-PA 120/277VAC

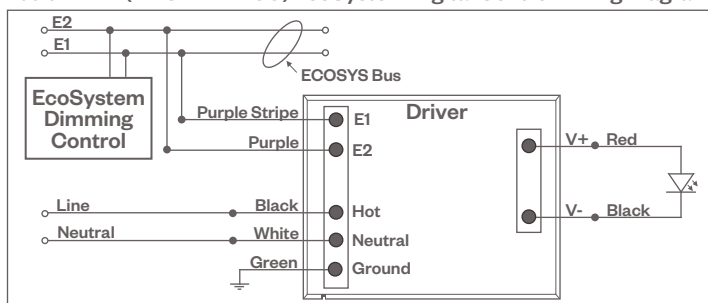
LUTRON LDE1 DIMMING

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!

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



Compatible Dimmers†:

Lutron ECO System

Pow Pak Dimming Modules
Energi Savr Node
Grafik Eye QS/Homeworks
QS Control Unit
Quantum Hub
Homeworks QS/My Room

Central System

Lutron EcoSystem compatible controls

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 manufacturer 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.

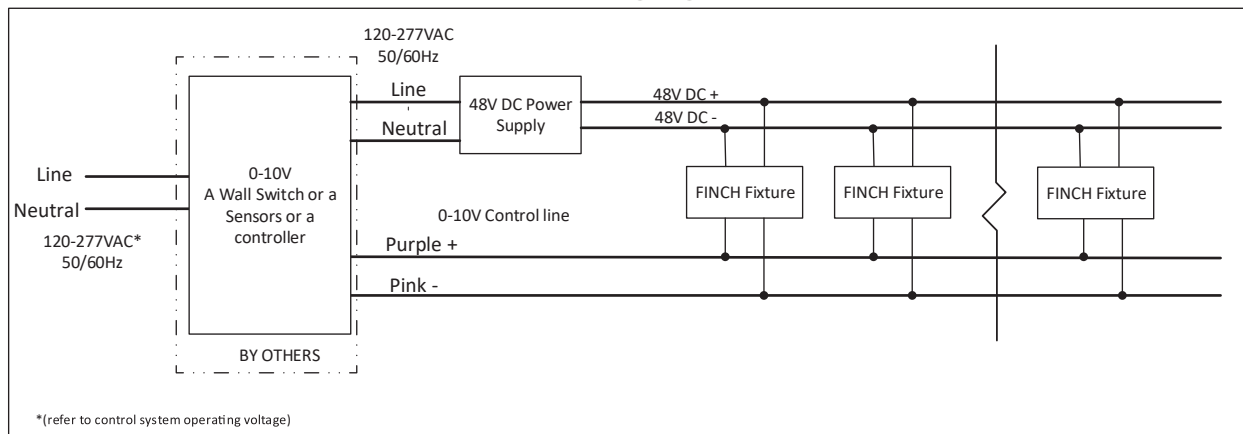
PROJECT:
TYPE:
DIMMING COMPATIBILITY:

Amerlux® Finch 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 ---

FOR INTEGRAL DRIVER OPTION (fed by 48V DC Power Supply/Transformer)

0-10V - DIMMING Integrates into a variety of building management and daylighting controls

0-10V Wiring Diagram

Notes:

- Dims down to 1% light output
- Consult dimming control manufacturer for the operational and installation instructions - DO NOT SHARE NEUTRALS

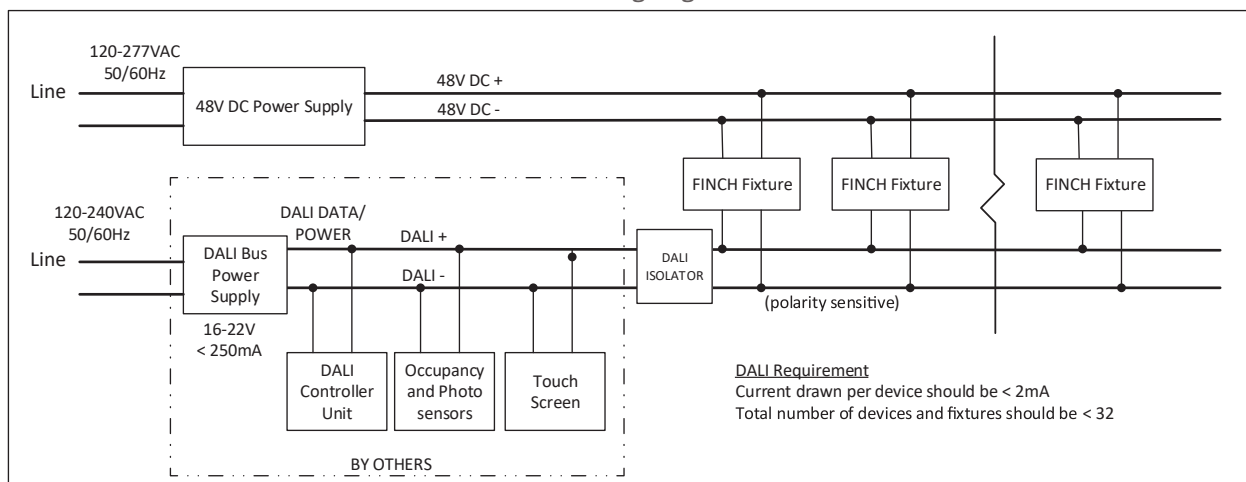
Compatible Dimmers*:
Wall Box

Lutron "Diva"
 Leviton Renoir II 0-10V

Central System

Lutron Grafik Eye with GRX-TVI Interface

DALI DIMMING Digital control protocol allows individual fixture control

DALI Wiring Diagram

Suggested Switches for Wired Connection:

Manufacturer	Model	
Loytec DALI PSU	L-DALI-PWR2-U	DALI Bus Power Supply, 85-240VAC input, 2 channel DALI PSU, 116mA per channel
Loytec Controller	L-DALI-ME204-U	DALI Controller, 4 channel DALI
Loytec Controller	L-DALI-ME201-U	DALI Controller, 1 DALI channel with integrated DALI power supply
B.E.G	PP-DALI-PS	DALI Bus Power Supply, 120-277VAC input, 100mA bus power