

1" Surface Mount Cylinder
with 48V Integral Driver



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 6" 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
- ORI: 80+ & 90+ typ.
- Dimming: 0-10V, DALI

PROJECT:

TYPE:

Performance Data

Watts	Lumens	LPW	CCT	ORI
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 optic, standard bevel, 3000K, 80+, 120V 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 transformer.

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

Transformer Example: TR-48V100W

STEP 1: 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			
FIN6-SMF-48V 6"	6 6W (643 lm)	30 3000K, 80+		SP spot 15°		WT white texture <input type="radio"/>			
FIN9-SMF-48V 9"	8 8W (787 lm)	35 3500K, 80+		FL flood 28°		BT black texture <input type="radio"/>			
FIN12-SMF-48V 12"	10 10W (927 lm)	40 4000K, 80+		WF wide flood 35°		SLV matte silver <input type="radio"/>			
FIN18-SMF-48V 18"	12 12W (1065 lm)	249 2400K, 90+		VWF very wide flood 50°		BRZ bronze <input type="radio"/>			
	15 15W (1200 lm)	279 2700K, 90+				DBZ dark bronze <input type="radio"/>			
	17 17W (1331 lm)	309 3000K, 90+				<i>For custom RAL finish, consult factory</i>			
	20 ^{††} 20W (1459 lm)	359 3500K, 90+				<i>consult factory</i>			
	^{††} Only 9" and up	409 4000K, 90+							
6 Bevel/Glow Finish		7 Door Style		8 Mounting					
MW matte white <input type="radio"/>		SB standard bevel (1/4" recess)		F flush mount					
MB matte black <input type="radio"/>		DB deep bevel (5/8" recess)		C canopy (Ø5")					
SLV matte silver <input type="radio"/>		GLOW frosted glow lens (1/2" drop)		RC reduced canopy (Ø3-1/2")					
BRZ bronze <input type="radio"/>				CDC conduit canopy (Ø4-1/8")					
DBZ dark bronze <input type="radio"/>									
GLD gold <input type="radio"/>									
<i>For custom RAL finish, consult factory. Omit from nomenclature when ordering direct GLOW door style.</i>									
9 Drivers/Controls		10 Accessories							
0-10V 0-10V dimming, 1%		SOL solite lens							
DALI DALI dimming, 1%		HEX hexcell louver							
		LS linear spread lens							

STEP 2: 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 drawing & wiring schematics, see pages 6-7. 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

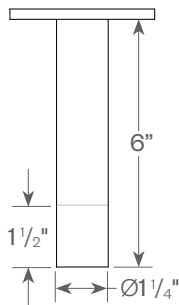
Certifications

CSA tested to UL standards
Indoor use only
Damp location

Warranty

5 year limited warranty

FIN6-SMF



FIN9-SMF



FIN12-SMF



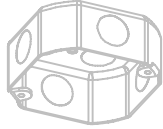
FIN18-SMF



PROJECT:

TYPE:

Junction Box Mounting Requirements

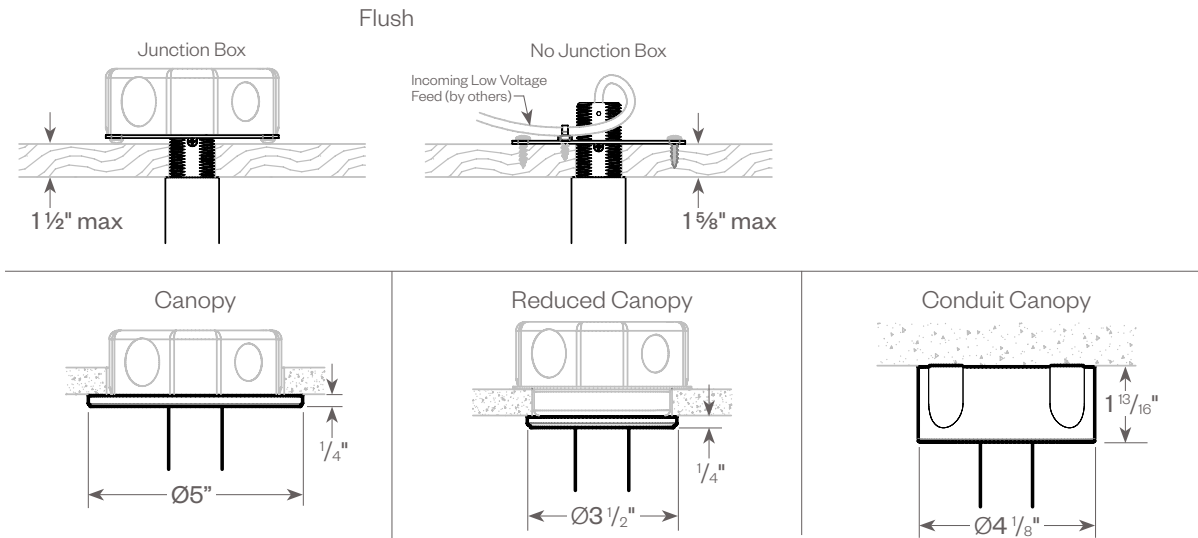


Canopy (C) & Conduit Canopy (CDC) Mounts
Require 4" Octagonal Junction Box (by others)

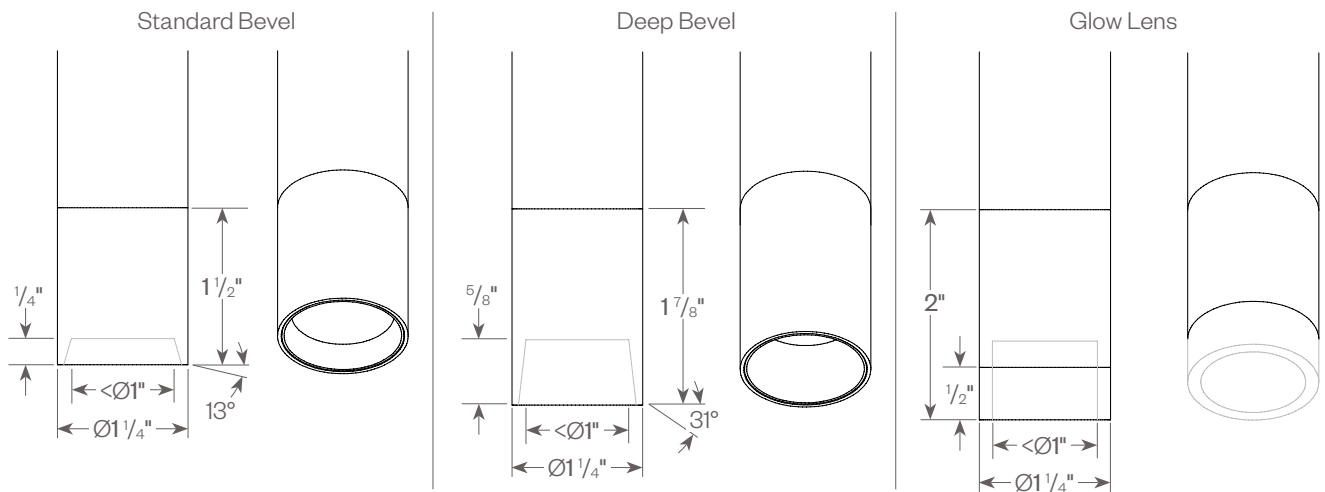


Reduced Canopy (RC) Mounts also
Require Raised Cover (by others) for
4" Octagonal Junction Box

Mounting Options



Door Styles



Finish Options

Powder coat paint. Consult factory for custom finishes.



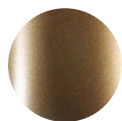
Matte Black



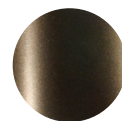
Matte White



Matte Silver



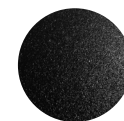
Bronze



Dark Bronze



White Texture



Black Texture



Gold

Available for
Bevel Finish only

PROJECT:

TYPE:

Performance Data

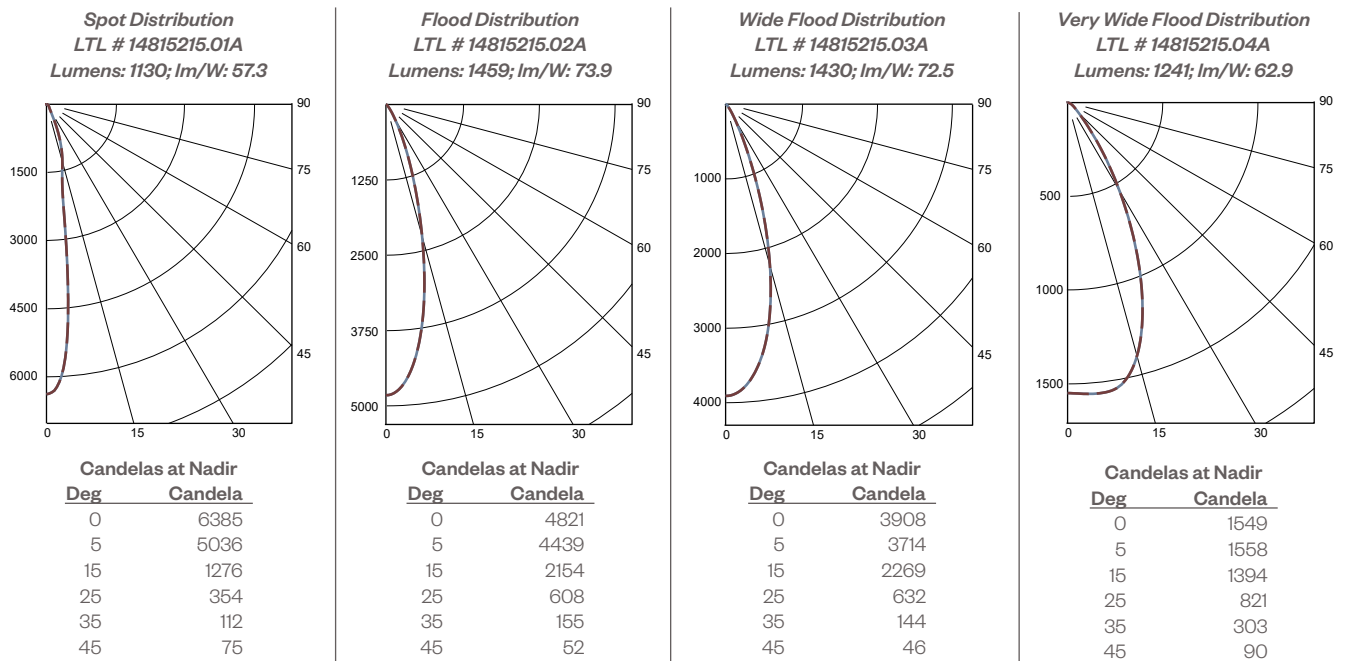
MULTIPLYING FACTORS:

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.

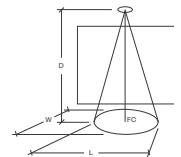
20W, Standard Bevel, 3000K, 80+



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

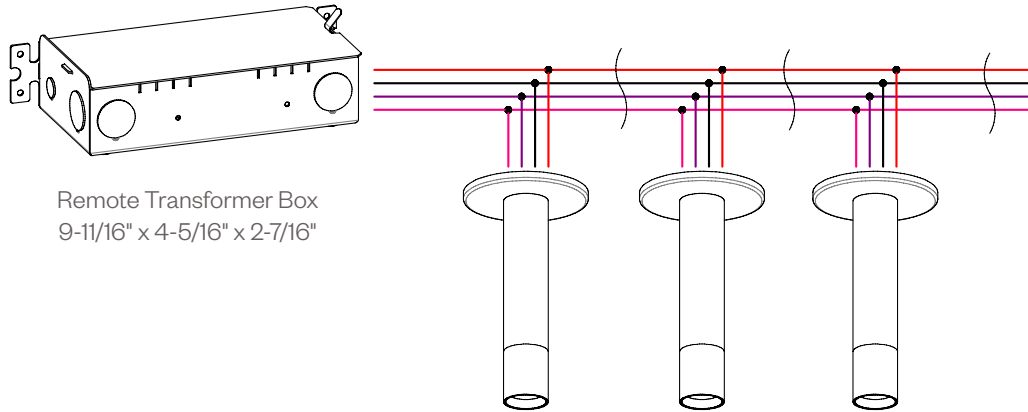
D	FC	L	W
5.0'	61	4.2	4.2
7.5'	27	6.3	6.3
10.0'	16	8.4	8.4
12.5'	10	10.6	10.6

PROJECT:

TYPE:

Power Supply Options for Integral Driver

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



Remote Transformer Box
9-11/16" x 4-5/16" x 2-7/16"

PROJECT:

TYPE:

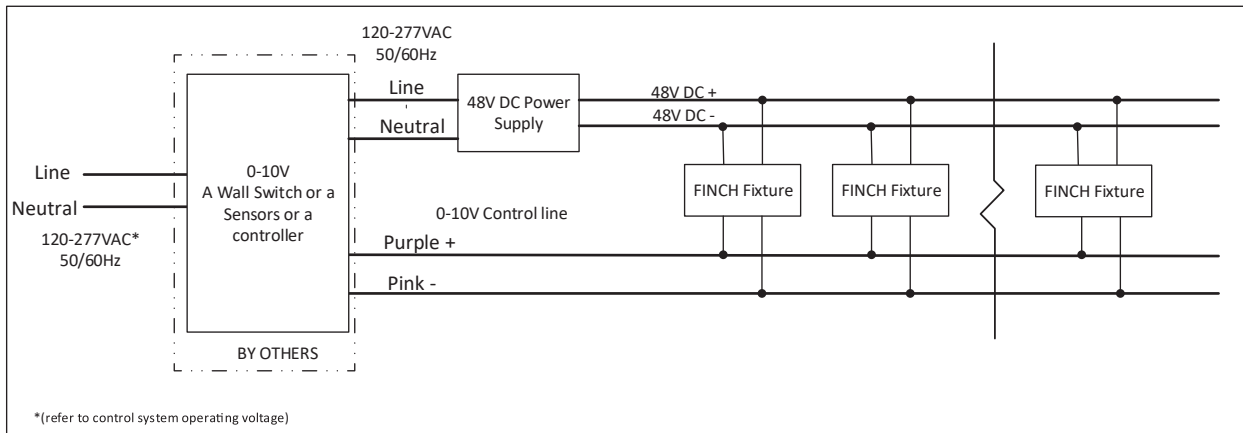
Dimming Compatibility

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 ---

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

0-10V Wiring Diagram



Notes:

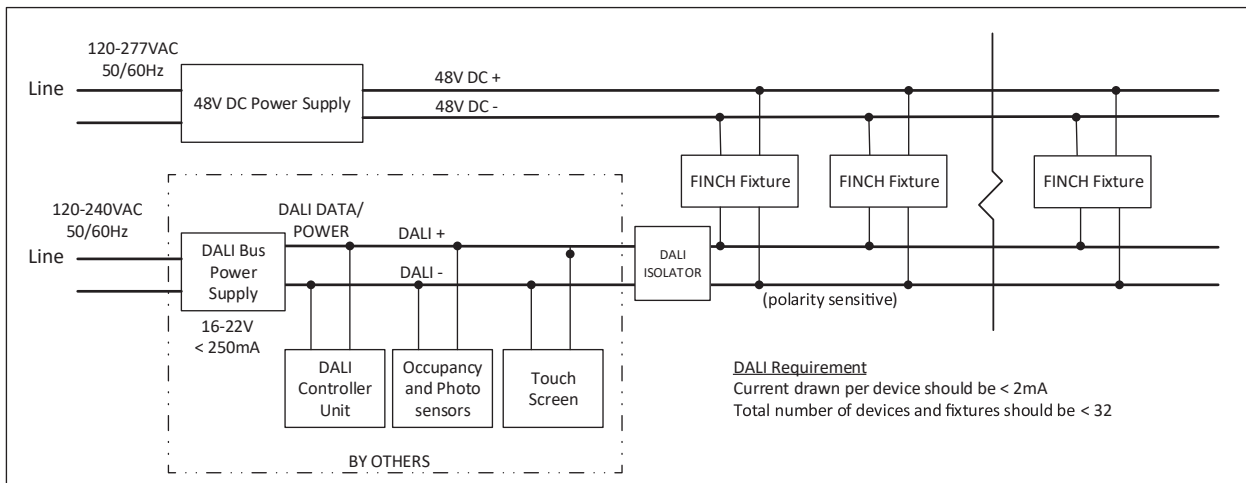
- Dims down to 1% light output
- Consult dimming control manufacturer for the operational and installation instructions - DO NOT SHARE NEUTRALS

Compatible Dimmers*:

Wall Box	Central System
Lutron "Diva" Leviton Renoir II 0-10V	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