

**SIGMA 2**



Round Deep Regressed, 1000 Lumens, 13 Watts  
Recessed Downlighting

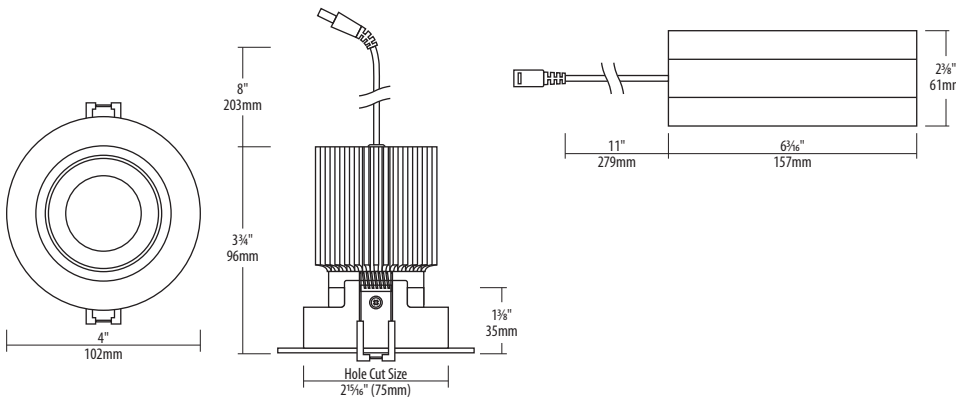
Job Information	
Project Name	
Type	
Location	
Quantity	
Date	

**Description**

The SIGMA 2 deep regressed model was specifically designed for low-glare and quieter ceilings. It is available in both round and square, black and white trims, and a choice of reflector options to compliment your project setting.

**Technical Drawings**

**Mounting: Remodel**



**FIXTURE SPECIFICATIONS**

Aperture	2 5/8" (67mm)
Application	Recessed
Approved Location	Wet
Certification	cETLus
CRI	90
Dimming	Yes
Energy Star	Yes
Hole Cut Size	2 1/8" (75mm)
Max. Ceiling Thickness	1 1/2"
Power Factor	>0.9
Power Supply Type	Constant Current
Lumen Maintenance	70% @ 50,000 Hrs
THD	<20%
TM-30 Annex E	P2 / V- / F3

Delivered Lumens Per Head	Option	Lumens/Watt	Driver Wattage
986	A	77	13

**Ordering Guide**

S230	Trim Color	Trimless Option	Baffle Color / Style	Source Lumens Per Head <sup>1</sup>	Color Temp.	Beam Angle	Lens Options	Driver Options	Voltage	Mounting	Shipping
	<b>B</b> : Black <b>W</b> : White	<b>S</b> : No adapter <b>T</b> : Trimless Adapter Included <b>1</b> : Trimless Adapter in 1/2" drywall <sup>5</sup> <b>5</b> : Trimless Adapter in 3/8" drywall <sup>5</sup>	<b>C</b> : Copper <b>G</b> : Gold <b>P</b> : Specular <b>S</b> : Semi-Specular <b>W</b> : High Gloss White <b>X</b> : Onyx	<b>A</b> : 1000 lm (13W, IC Rated) <b>40</b> : 4000 K <b>50</b> : 5000 K	<b>27</b> : 2700 K <b>30</b> : 3000 K <b>35</b> : 3500 K <b>40</b> : 4000 K <b>50</b> : 5000 K	<b>M</b> : Medium <b>S</b> : Spot <b>N</b> : Narrow	<b>C</b> : Clear protective lens	<b>T</b> : TRIAC, ELV, 120V Input <sup>6</sup> & 347V Input <sup>2</sup> <b>C</b> : TRIAC, ELV, 0-10V, 120-277V <b>B</b> : RATED -40°C, 0-10V, 120-277 & 347V Input <sup>2</sup> <b>D</b> : DALI, Rated -40°C, 120-277V & 347V Input <sup>2</sup> <b>M</b> : DMX, 120-277V Input <sup>2,4</sup> <b>E</b> : Emergency Backup, 0-10V, 120-277V Input <sup>2,4</sup> <b>L</b> : Lutron EcoSystem, 120-277V Input <sup>4</sup> <b>Q</b> : Casambi Enabled Driver, 120-277V Input <sup>2,4</sup>	<b>X</b> : 120-277V <b>1</b> : 120V <sup>3</sup> <b>3</b> : 347V	<b>RM</b> : Remodel <b>NC</b> : New Construction <b>AR</b> : Architectural C-Channel Brackets	<b>1</b> : Ship Complete <b>2</b> : Ship Rough-in First

Wall Wash	Select from above	Select from above	<b>B</b> : Black Wall Wash <b>M</b> : Semi-Specular Wall Wash <b>H</b> : White Wall Wash with Semi-Specular Baffle	<b>B</b> : 415 lm (9W, IC Rated)	Select from above	<b>M</b> : Medium	Select from above	Select from above	Select from above	Select from above	Select from above
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**Notes:**

<sup>1</sup> Delivered lumens provided are based on 3000 K with wide reflector.  
<sup>2</sup> Above ceiling access or remote mount required.  
<sup>3</sup> Driver option "T" only.

<sup>4</sup> Not available in 347V.  
<sup>5</sup> Adapter ships separately. <sup>6</sup> Not available with Wall Wash Baffles.  
Quick Ship option is available on orders of 100 pieces or less, and will ship within 7 business

days. Options must be selected from Quick Ship section to qualify.  
For additional options please consult your A-Line representative. All trademarks are the property of their respective owners.

Due to our continued efforts to improve our products, product specifications are subject to change without notice.

## Features

### Beam Angle

Multi-faceted reflector available in spot (18°), narrow (24°) or medium (36°) beam angles.

### Baffle

A standard cone baffle or wall wash baffle is available.

### LED Characteristics

Available with high efficiency LED chip that maintains high lumens per watt with a typical 90 CRI.

### LED Optics

Integrated clear protective lens.

### Dimming

Multiple dimming options are available. 100~10% dimming with TRIAC/ELV, 100~1% dimming with 0-10V, and dim to off with compatible devices. Compatible with OnCloud dimmer. See LED Driver Options for details. Consult factory for compatible dimmers.

### Thermal Performance

Extruded aluminum heat sink ensures optimal heat dissipation and LED life.

### LED Driver

The LED driver is remote mounted to allow for a lower operating temperature of the LED, longer life, and serviceable separate from the fixture. Includes an 18" plenum rated FT6 wire with DC 2.1 connector from the driver to fixture. Inrush current for all drivers is compliant with NEMA 410. See LED Driver Options for more specific details.

### Hanger Bars – New Construction

Rigid hanger bars extend up to 25" (635mm). Score lines on the hanger bars allow for tool-less shortening down to 12" (305mm). Built-in line-up foot allows for accurate housing height during installation. Integrated T-bar clips easily snap onto T-bars.

### Hanger Bars – Architectural C-Channel

Architectural frame bracket accepts C-channel and EMT conduit. Vertically adjustable.

### Trimless Option

Trimless adapter provides a flush and seamless ceiling mount. Trimless adapter is also available prefabricated in level 5 drywall for ease of installation.

### Shipping

Fixtures can be shipped complete or with rough-in components first, and the remainder once requested.

### Environment

Suitable for use in wet locations. With trimless adapter, suitable for use in damp locations.

### Warranty

5-Year warranty.

### QuickShip Made-To-Order

Made-To-Order products ship within seven business days of an order being released.

ONLINE PRODUCT DETAILS AND DOCUMENTATION



## LED Driver Options

**(T) TRIAC** : Dimming for 120V only, 100~10% dimming.

**(C) TRIAC/ELV/0-10V** : TRIAC/ELV dimming for 120V only, 100~10% dimming. 1% Dimming over 0-10V is optional, but required for 277V & 347V dimming.

**(B) Rated -40** : Low temperature driver operation. Dimming to 1% over 0-10V.

**(D) DALI** : DALI soft dimming to 1%. Dim-to-off with standby power <0.3W. Rated to -40.

**(M) DMX** : DMX/RDM soft dimming to 0.1%. Dim-to-off with standby power <0.3W.

**(E) Emergency Backup** : Integrated emergency battery with switchable output of 5W for 180 minutes, or 10W for 90 minutes of operation during an outage. Dimming to 1% over 0-10V.

**(L) Lutron EcoSystem** : Suitable for integration into a planned or existing EcoSystem® lighting control solution. Dimming down to 1% with compatible controls.

**(Q) Casambi Enabled** : Casambi wireless module included. Wireless dimming to 1% provided over 0-10V signal from module.

## Accessories



### P-3010

75mm round pre-mounting plate for Sigma 2 fixtures.



### ALB-27

27" Linear hanger bar, 2-pack.



### LC-CRTL-DIM-1

Smart Wi-Fi dimmer, 150W, 120V.  
\* Compatible with TRIAC Driver.

## Trimless



### P-4500

115mm round pre-mounting plate for Sigma 2 fixtures.



### S2-ZCR-4

102mm Sigma 2 round trimless adapter.



### S2-PDW1R-4

Trimless adapter in 1/2" drywall.

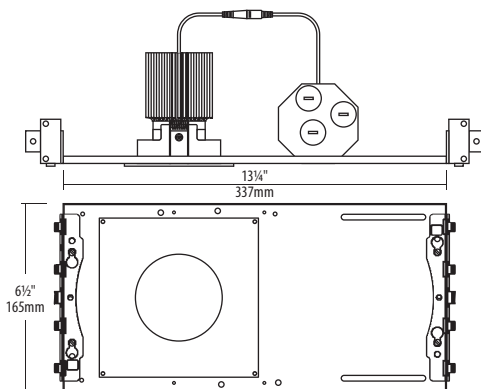


### S2-PDW5R-4

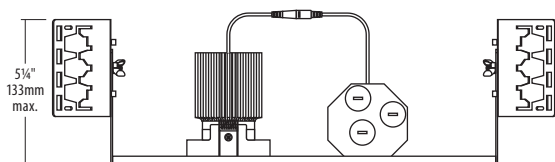
Trimless adapter in 5/8" drywall.

## Technical Drawings

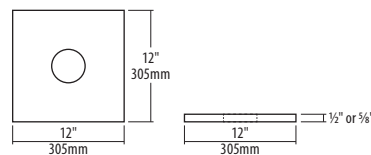
### New Construction



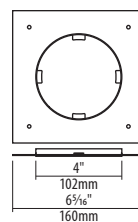
### Architectural



### Mounting: Trimless Adapter in Drywall

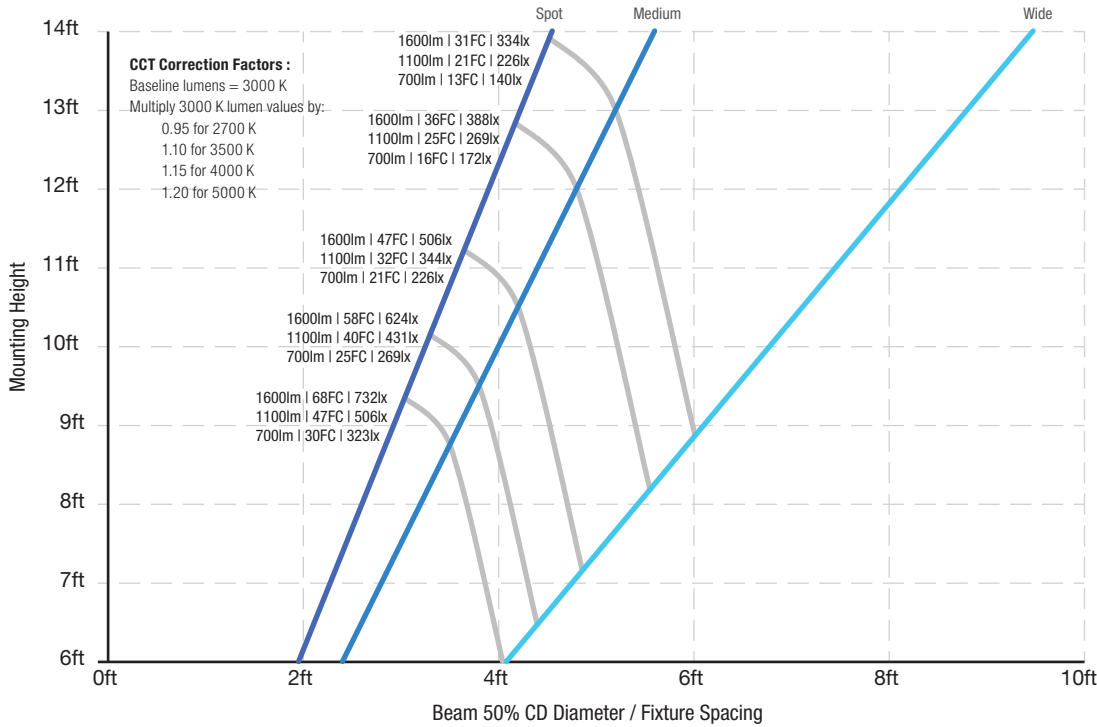


### Mounting: Trimless Adapter



## Luminaire Budgetary Diagram

Mounting Height vs. Fixture Spacing  
Sample reference with 90 CRI at 3000 K CCT



To use Liteline's Budgetary Diagram:

1. Determine mounting height above work surface for application on Y axis.
2. Determine appropriate spacing by comparing beam cone size on X axis.
3. Select appropriate beam angle and lumen package from slope line at intersection point.

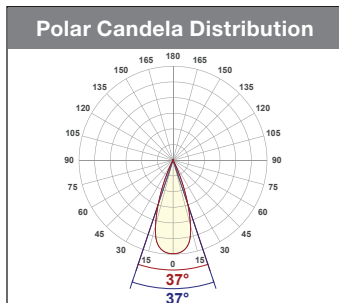
## Photometry

**Note :** All photometric data is based on 3000 K CCT, medium beam spread, white trim and clear protective lens.

### CCT Correction Factors :

Baseline lumens = 3000 K  
Multiply 3000 K lumen values by:  
0.95 for 2700 K  
1.10 for 3500 K  
1.15 for 4000 K  
1.20 for 5000 K

**S230Wx-A30MC-xx-xxx :** SIGMA 2, 13W, medium beam spread, clear protective lens



Beam Details				
D	Lux	FC	L	W
4'	1657	154	2.7'	2.7'
8'	414	38	5.4'	5.4'
12'	184	17	8'	8'
16'	104	10	10.7'	10.7'
20'	66	6	13.4'	13.4'

Zonal Lumen Summary		
Zone	Lumens	% Luminaire
0-30	583	91.23%
0-40	866	92.62%
0-60	885	94.65%
60-90	14.4	1.54%
70-100	13.2	1.41%
90-120	12.0	1.28%
0-90	899	96.15%
90-180	36.1	3.86%
0-180	935	100%

**S230Wx-B30MC-xx-xxx :** SIGMA 2, 9W, medium beam spread, clear protective lens

