



# **SLD** Surface LED Downlight Luminaire



Halo SLD Series Surface LED Downlight luminaires incorporate WaveStream™ LED technology to create an ultra-low profile, surface-mounting luminaire with the performance and look of traditional downlights. The SLD Series 4" and 6" luminaires are designed for installation in many 3-1/2" and 4" electrical junction boxes, and may be retrofit in 4", 5", or 6" aperture IC and Non-IC recessed housings. A dedicated LED wiring connector meets high-efficacy code requirements when in recessed downlight housings and prevents substitution of lower efficacy sources. Perfect for residential or commercial installations and ideal for closets, storage areas, attics and basements. For closets, compliant with NFPA® 70, NEC® Section 410.16 (A)(3) and 410.16 (C)(5). The SLD Series offers unparalleled design freedom with mainstream value.



**Innovation** you can rely on<sup>™</sup>

#### **Features**

- 4" and 6" ultra-low profile surface mounting
- WaveStream™ LED Technology
  - Downlight cone-of-light performance
  - AccuAim™ optics for directional control
- 4" SLD4 and 6" SLD6 600 Series
  - Lumens: up to 800
  - Wattage: 12.2W (13.2W SLD6 90CRI)
  - Voltage: 120V, 50/60 Hz
- 6" SLD6 1200 Series
  - Lumens: up to 1215
  - Wattage: 14.8W
  - Voltage: 120V, 50/60 Hz
- 2700K, 3000K, 3500K, and 4000K CCT
- 80 CRI and 90 CRI options
- Dimmable to 5% with many 120V leading-edge and trailing-edge phase control dimmers
- Installs in many 3-1/2" and 4" ceiling junction boxes
- Retrofits 4", 5", or 6" recessed downlight housings
- · cULus Listed for Halo housings
- · UL Classified for other housings
- · Damp Location Listed for walls
- · Wet Location Listed for showers and outdoor protected ceilings
- Plug-in LED connector for easy installation
  - Supply wire adapter connection, for junction box wiring\*
  - Screwbase adapter for recessed housing retrofit\*\*





- \*LED connector on SLD meets CA Title 24
- \*\* Retrofit only not for CA

# Compliances

90 CRI

80 CRI



Can be used to comply with California Title 24 High Efficacy requirements.













Refer to ENERGY STAR® Certified Products List.

# SLD4 4" LED Surface Downlight Luminaire



### SLD4 Designer Trims (Order Separately)



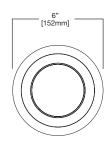


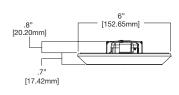


SLD4TRMSN Satin Nickel

SLD4TRMTBZ Tuscan Bronze

SLD4TRMWH White (Paintable)





SLD4 Energy Data	80 CRI	90 CRI
Lumens (4000K)	800	710
Input Voltage	120V	120V
Input Frequency	50/60 Hz	50/60 Hz
Input Current	0.10 A	0.10 A
Input Power	12.2 W	12 W
Efficiency (4000K)	66 lm/W	59 lm/W
THD	≤ 20%	≤ 20%
Power Factor	≥ 0.90	≥ 0.90
T Ambient	-30 - +40°C	-30 - +40°C
Sound Rating	Class A	Class A





<sup>\*</sup> Based on average six hours use per day.

Replacement lamp savings: \$95

Savings based on \$0.155 per kilowatt hour, average six hours use per day, 50,000 hours of lamp usage, and 60W PAR16 Halogen lamp lumen equivalent.

<sup>&</sup>lt;sup>△</sup> Savings are over the life of the Halo SLD4 luminaire. Energy savings: \$367

# SLD6 6" LED Surface Downlight Luminaire



### SLD6 Designer Trims (Order Separately)







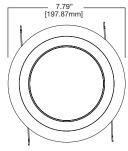
SLD6TRMWH

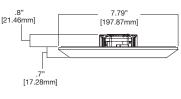
SLD6TRMSN

Satin Nickel

SLD6TRMTBZ Tuscan Bronze

White (Paintable)





	600 9	Series	1200	Series
	000 0	ociies	1200	Delles
SLD6 Energy Data	80 CRI	90 CRI	80 CRI	90 CRI
Lumens (4000K)	800	780	1215	1000
Input Voltage	120V	120V	120V	120V
Input Frequency	50/60 Hz	50/60 Hz	50/60 Hz	50/60 Hz
Input Current	0.10 A	0.11 A	0.12 A	0.12 A
Input Power	12.2 W	13.2 W	14.8 W	14.8 W
Efficiency (4000K)	66 lm/W	59 lm/W	82 lm/W	68 lm/W
THD	≤ 20%	≤ 20%	≤ 20%	≤ 20%
Power Factor	≥ 0.90	≥ 0.90	≥ 0.90	≥ 0.90
T Ambient	-30 - +40°C	-30 - +40°C	-30 - +40°C	-30 - +40°C
Sound Rating	Class A	Class A	Class A	Class A





- \* Based on average six hours use per day.
- \*\* Savings are over the life of the Halo SLD6-600 Series luminaire. Energy savings: \$406

Replacement lamp savings: \$77

Savings based on \$0.155 per kilowatt hour, average six hours use per day, 50,000 hours of lamp usage, and 65W BR30 lamp lumen equivalent.

# **SLD Designer Trim Rings**



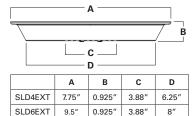
### **Junction Box Accessories**

### Spacer Extension Ring

The spacer extension ring adds 15/16" depth when the SLD driver cannot fit into a junction box due to excess wire fill or other obstruction. The spacer extension ring is also a problem solver for installations with shallow pancake boxes or plaster rings.

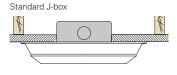


4" Surface LED Space Ring

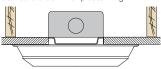




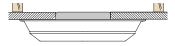
**SLD6EXT** 6" Surface LED Spacer Ring



Standard J-box with plaster ring



Shallow J-box (pancake)



# **Surface Box Adapter**

The surface box adapter allows the user to install the SLD to a junction box that is mounted flat on a ceiling or beam surface (not recessed in the ceiling).



#### SLD4RAD

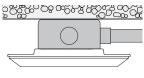
4" SLD Round Surface J-box Adapter For 4" round and octagon junction boxes.



#### SLD6RAD

6" SLD Round Surface J-box Adapter For 4" round, octagon, and square junction boxes.

(\*use SLD6SADPLT for square J-box)

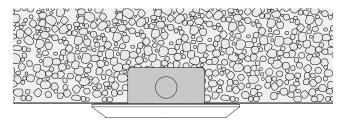




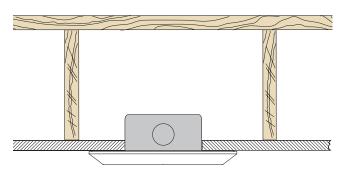
\*SLD6SADPLT 6" SLD Square Surface J-box Adapter Plate (use with SLD6RAD)

# **Mounting Applications** Junction Box

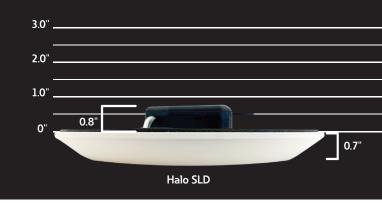
### Concrete



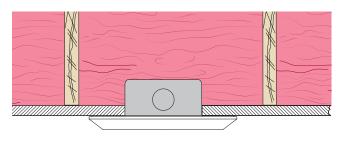
### **Framing**



# Shallow plenum? No problem.

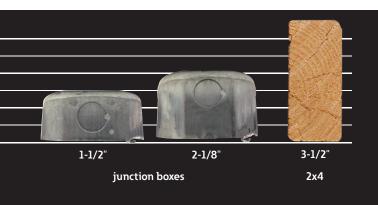


### Insulation - batting or spray foam

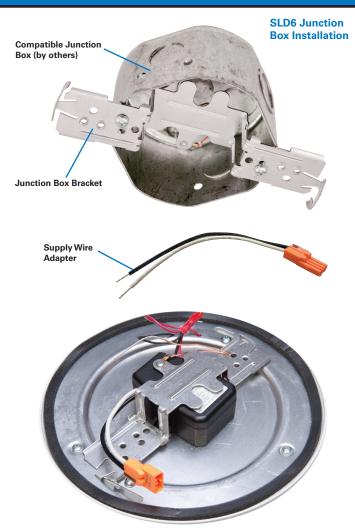


Junction box mounting applications are generalized for illustrative concept only. These are not for construction or specification. Refer to appropriate professional and code authority for specific box and installation requirements.

The perfect solution where there is no plenum space for a recessed downlight.



# Junction Box Mounting Ceiling or Wall

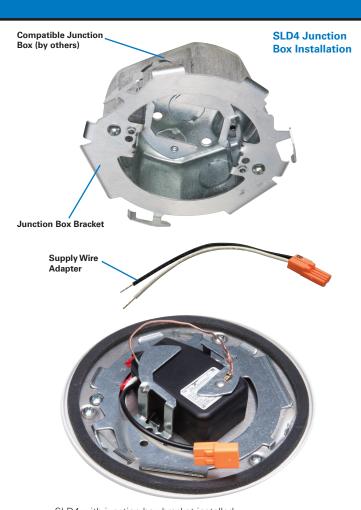


SLD6 with junction box bracket installed.

### **Junction Box Mounting Summary**

- 1. Install junction box bracket.
- Unplug supply wire adapter from SLD. Connect black and white wires from the supply wire adapter to house wiring (black to black and white to white).
- 3. Locate the supply wire adapter behind the junction box bracket.
- Plug matching orange LED connector from supply wire adapter to SLD.
- 5. Align two bracket tabs with slots on back of SLD fixture.
- 6. Turn clockwise to lock in place.

Note that this is only a summary. Read and follow the instructions included with the product for full details.



### SLD4 with junction box bracket installed.

# Slot-N-Lock™



# **Compatible Junction Boxes\***

			SLD4	SLD6	SLD4RAD adapter	SLD6RAD adapter
	200	Octagon - steel light fixture	/ fan box			
		4" x 4" x 2-1/8"	1	1	1	1
		4" x 4" x 1-1/2"	1	1	1	1
	D	Square - steel deep box				
	3	4" x 4" x 2-1/8"		1		<b>*</b>
		4" x 4" x 1-1/2"		1		1
1	1	Round - new work fixture bo	ox (plastic)			
		4" diameter x 2-3/16"	1	1	1	<b>*</b>
		3-1/2" diameter x 2-3/4"	1	1	1	
Control of the Contro		Round - old work fixture box	κ (plastic)			
	I	4-1/4" flange x 2-5/8", 3-1/2" I.D.	1	1	1	
6.76		Round - new work fix	kture box (p	olastic) wit	h bar hang	er
		4" diameter x 2-3/16"	1	1	1	1
00	2	Round surface mount				
6		4" diameter x 1-1/2"	Δ	Δ	1	1
		TP316 - Eaton's Crouse-Hind	ls junction	box for no	n-metallic	cable
	1	4" x 4" x 2-1/8"	1	1		
	1-4	TP317 - Eaton's Crouse-Hind	ls junction	box for me	tal clad cal	ole
7	100	4" x 4" x 2-1/8"	Δ	Δ		

### △ when used with SLD4RAD (SLD4) or SLD6RAD (SLD6)

<sup>\*</sup>This is a representative list of compatible junction boxes only. Information contained in this literature about other manufacturers' products is from published information made available by the manufacturer and is deemed to be reliable, but has not been verified. Eaton makes no specific recommendation on product selection and there are no warranties of performance or compatibility implied. Installer must determine that site conditions are suitable to allow proper installation of the SLD mounting bracket in the box.

# **Recessed Housing Mounting**

### Retrofits 4", 5", or 6" recessed housings.

- 1. Install screwbase adapter to fixture socket. (LED housings skip Step 1)
- 2. Attach torsion springs or friction clips to SLD following the instructions included with the SLD.
- 3. Install SLD into recessed can.

Note that this is only a summary. Read the instructions included with the product for full details.



# **SLD4 Series Friction Clip Installation**





4-inch friction clip

### SLD6 Series Friction Clip Installation









5-inch friction clip position

### SLD6 Series Torsion Spring Installation

clip position









6-inch torsion spring position

5-inch torsion spring position

# **Ordering Information**

#### 4" SLD4

Sample Number: SLD405927WH + SLD4TRMSN

Junction Box Installation: Order junction box separately, as supplied by others, to

complete installation.

Recessed Installation: Order Halo recessed housing separately to complete installation.

Standard Models	Color Rendering Index (CRI)	Color Temperature (CCT)	Finish	*Non CA Product
<b>SLD405</b> = 4" Surface LED Downlight, 120V with recessed retrofit and junction box hardware kits	<b>8</b> = 80 CRI <b>9</b> = 90 CRI	<b>27</b> = 2700K <b>30</b> = 3000K <b>35</b> = 3500K <b>40</b> = 4000K	<b>WH</b> = White	
*California non – E26 Models				

SLD405927WH-CA SLD405930WH-CA SLD405935WH-CA SLD405940WH-CA

"JB" Models	Color Rendering Index (CRI)	Color Temperature (CCT)	Finish	JB
<b>SLD405</b> = 4" Surface LED Downlight, 120V with junction box hardware kit only	<b>8</b> = 80 CRI <b>9</b> = 90 CRI	<b>27</b> = 2700K <b>30</b> = 3000K <b>35</b> = 3500K <b>40</b> = 4000K	WH= White	<b>JB</b> = Junction Box Kit

#### Accessories (Order Separately)

Designer Trims: fit over the SLD4 for a designer finish, 6" O.D.

SLD4TRMSN= 4" SLD Satin Nickel Trim Ring SLD4TRMTBZ= 4" SLD Tuscan Bronze Trim Ring SLD4TRMWH= 4" SLD White Paintable Trim Ring

J-box Spacer Extension Ring: add 15/16" depth when SLD driver cannot fit into installed

junction box, 7.75" O.D.

SLD4EXT= 4" Surface LED J-box Extender

RAD Adapters; when junction box is mounted flat on a ceiling or beam surface SLD4RAD= 4" SLD Round Surface J-box Adapter (compatible with 4" round and octagon junction boxes)

#### Spare Parts

SLD4ACCKIT= 4" Accessory Parts Replacement Kit (screwbase adapter, and friction blades) SLD4BRKT= 4" Junction Box Bracket and Screws



#### 6" SLD6 - 600 Series

Sample Number: SLD606927WH + SLD6TRMSN

Junction Box Installation: Order junction box separately, as supplied by others, to complete

installation.

Recessed Installation: Order Halo recessed housing separately to complete installation.

Standard Models	Color Rendering Index (CRI)	Color Temperature (CCT)	Finish	*Non CA Product
SLD606= 6" Surface LED Downlight, 120V, 600 Series with recessed retrofit and junction box hardware kits	<b>8</b> = 80 CRI <b>9</b> = 90 CRI	<b>27</b> = 2700K <b>30</b> = 3000K <b>35</b> = 3500K <b>40</b> = 4000K	WH= White	
*California non - E26 Models				

SLD606927WH-CA SI D606930WH-CA SLD606935WH-CA SLD606940WH-CA

"JB" Models	Color Rendering Index (CRI)	Color Temperature (CCT)	Finish	JB
<b>SLD606</b> = 6° Surface LED Downlight, 120V, 600 Series with junction box hardware kit only	<b>8</b> = 80 CRI <b>9</b> = 90 CRI	<b>27</b> = 2700K <b>30</b> = 3000K <b>35</b> = 3500K <b>40</b> = 4000K	<b>WH</b> = White	<b>JB</b> = Junction Box Kit

#### Accessories (Order Separately)

Designer Trims: fit over the SLD6 for a designer finish, 7.79" O.D.

SLD6TRMSN= 6" SLD Satin Nickel Trim Ring SLD6TRMTBZ= 6" SLD Tuscan Bronze Trim Ring

SLD6TRMWH= 6" SLD White Paintable Trim Ring

J-box Spacer Extension Ring: add 15/16" depth when SLD driver cannot fit into installed junction box, 9.5" O.D.

SLD6EXT= 6" Surface LED J-box Extender

RAD Adapters: when junction box is mounted flat on a ceiling or beam surface SLDGRAD= 6" SLD Round Surface J-box Adapter (compatible with 4" round, octagon, and

square junction boxes)

SLD6SADPLT = 6" SLD Square Surface J-box Adapter Plate (use with SLD6RAD)

Spare Parts

SLD6ACCKIT= 6" Accessory Parts Replacement Kit (screwbase adapter, torsion springs, friction blades)

SLD6BRKT= 6" Junction Box Bracket and Screws



# **Ordering Information**

#### 6" SLD6 - 1200 Series

Sample Number: SLD612927WH + SLD6TRMSN

Junction Box Installation: Order junction box separately, as supplied by others, to complete

installation

**Recessed Installation:** Order Halo recessed housing separately to complete installation.

Models	Color Rendering Index (CRI)	Color Temperature (CCT)	Finish	
SLD612= 6" Surface	8= 80 CRI	<b>27</b> = 2700K	WH= White	
LED Downlight, 120V,	9= 90 CRI	<b>30</b> = 3000K		
1200 Series with		<b>35</b> = 3500K		
recessed retrofit and		<b>40</b> = 4000K		
junction box hardware kits				

#### Accessories (Order Separately)

Designer Trims: fit over the SLD6 for a designer finish, 7.79" O.D.

SLD6TRMSN= 6" SLD Satin Nickel Trim Ring SLD6TRMTBZ= 6" SLD Tuscan Bronze Trim Ring SLD6TRMWH= 6" SLD White Paintable Trim Ring

<u>J-box Spacer Extension Ring:</u> add 15/16" depth when SLD driver cannot fit into installed junction box, 9.5" O.D.

SLD6EXT= 6" Surface LED J-box Extender

RAD Adapters: when junction box is mounted flat on a ceiling or beam surface

SLD6RAD = 6" SLD Round Surface J-box Adapter (compatible with 4" round, octagon, and square junction boxes)

SLD6SADPLT = 6" SLD Square Surface J-box Adapter Plate (use with SLD6RAD)

#### Spare Parts

SLD6ACCKIT= 6" Accessory Parts Replacement Kit (screwbase adapter, torsion springs,

friction blades)

SLD6BRKT= 6" Junction Box Bracket and Screws

# **Housing Compatibility**

### 4" Housings - Halo and All-Pro UL Listed Compatibility

Recessed Can Size	Catalog Number				
	Compatible Halo LED Housings with LED Luminaire High-efficacy Compliant Connector (Meets CATitle 24 requirements)				
4"	H995ICAT, H995RICAT				
Compatible Halo	ncandescent E26 Screwbase Housings				
4"	H99ICAT, H99TAT, H99RTAT				
Compatible All-Pr	o Incandescent E26 Screwbase Housings				
4"	EI400ATSB, ET400ATSB, ET400RATSB				
-	Halo and All-Pro UL Listed Compatibility  Catalog Number				
6" Housings - Recessed Can Size Compatible Halo	Halo and All-Pro UL Listed Compatibility				
6" Housings - Recessed Can Size Compatible Halo	Halo and All-Pro UL Listed Compatibility  Catalog Number  LED Housings with LED Luminaire High-efficacy				
6" Housings - Recessed Can Size Compatible Halo Compliant Conne	Halo and All-Pro UL Listed Compatibility  Catalog Number  LED Housings with LED Luminaire High-efficacy ctor (Meets CATitle 24 requirements)				
6" Housings - Recessed Can Size Compatible Halo Compliant Conne	Halo and All-Pro UL Listed Compatibility  Catalog Number  LED Housings with LED Luminaire High-efficacy ctor (Meets CATitle 24 requirements)  H550ICAT, H550RICAT  H750ICAT, H750RICAT, H750T, H750RINTD010, H750TCP, H2750ICAT				

### Compatible Halo Incandescent E26 Screwbase Housings

5"	H5ICAT, H5RICAT, H5T, H5RT, H5TM, H25ICAT
6"	H7ICAT, H7RICAT, H7ICT, H7RICT, H7ICATNB, H7ICTNB, H7T, H7RT, H7TNB, H7TCP, H7UICT, H7UICAT, H27ICAT, H27RICAT, H27ICT, H27RICT, H27T, H27RT

### Compatible All-Pro Incandescent E26 Screwbase Housings

5"	EI500AT, EI500RAT, ET500, ET500R
6"	EI700AT, EI700RAT, EI700, EI700R, EI700ATNB, EI700NB, EI700U, EI700UAT, ET700, ET700R, EI2700AT, EI2700, EI2700R, ET2700, ET2700R

The SLD Series surface LED downlight luminaire is cULus Listed or UL Classified for use with any 4" (SLD4) or 5"/6" (SLD6) diameter recessed housings constructed of steel or aluminum with an internal volume that exceeds 62.3 in<sup>3</sup> (SLD4) or 107.9 in<sup>3</sup> (SLD6) in addition to those noted above.

# **Replacement Parts Kits**



#### SLD4ACCKIT

SLD4 Retrofit Kit

SLD4 screwbase adapter, friction blades, ground wire, mounting screws, wire nuts



#### SLD4BRKT

SLD4 Junction box mounting bracket and mounting screws

### \*non CA only



#### SLD6ACCKIT

SLD6 Retrofit Kit

SLD6 screwbase adapter, friction blades, torsion springs, ground wire, mounting screws, wire nuts





#### SLD6BRKT

SLD6 Junction box mounting bracket and mounting screws





# **Lighting Control Solutions**

Eaton dimmers offer versatile options to set the mood and reduce energy consumption. These compatible LED dimmers are ideal for both residential and light commercial applications and are compatible with decorator (screwless) style devices and wallplates. Refer to www.eaton.com for additional information.







Dimmer Features	Smart (AAL06P)	<b>Decorator</b> (DAL06P)
Rapid Start feature	Selectable ON or OFF	Fully adjustable
Adjustable high-end trim	•	
Adjustable low-end trim	•	•
Wiring configurations	Single-pole or multi-location	Single-pole or three-way
Color change kits	•	•





Dimmer Features	Slide (SAL06P)	<b>Toggle</b> (TAL06P)
Rapid Start feature	Fixed ON	Fully adjustable
Adjustable high-end trim		
Adjustable low-end trim	•	•
Wiring configurations	Single-pole or three-way	Single-pole or three-way
Color change kits		

Note: The Rapid Start feature is used to ensure the right amount of power boost during start-up. When a dimmer with Rapid Start is turned on from a low dimmer setting, the LED lighting may exhibit a momentary flash. Designated dimmer models offer an adjustment of the Rapid Start feature. The user may wish to adjust this setting to reduce the boost and resulting momentary flash. If this capability is desired, the user should select dimmer models noted as "fully adjustable" or "selectable ON or OFF."

# **Product and Photometric Data**

- Downlight cone-of-light distribution
- Maximum spacing criteria
- · Optimized design for general downlighting
- Exceeds 83% of light between 0-60° cone-of-light zone
- ENERGY STAR® and California Title 24 zonal and efficacy requirements

### SLD4

Cat No.	CRI	ССТ	Lumens	Power (W)	LPW
SLD405827WH (JB)	80	2700	720	12.2	59
SLD405830WH (JB)	80	3000	750	12.2	61
SLD405835WH (JB)	80	3500	780	12.2	64
SLD405840WH (JB)	80	4000	800	12.2	66
SLD405927WH (JB)	90	2700	650	12	54
SLD405930WH (JB)	90	3000	670	12	56
SLD405935WH (JB)	90	3500	690	12	58
SLD405940WH (JB)	90	4000	710	12	59

SLD405830WH						
Luminair	750					
Input	12.2					
LER (	LER (LPW)					
	0-180	1.4				
Spacing Criteria	90-270	1.4				
Ontena	Diagonal	1.5				
Beam angl	Beam angle (degrees)					
Field angle	Field angle (degrees)					
Zonal lumen	Lumens	% Lumens				
		i				
0-30	212	28%				
0-30 0-40	212 357	28% 48%				
0-40	357	48%				



### SLD6 - 600 Series

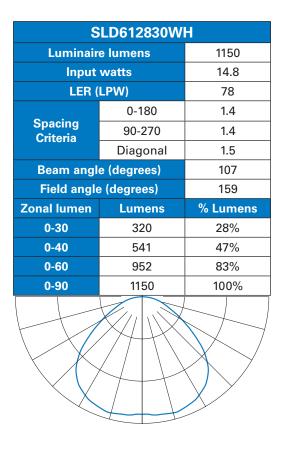
Cat No.	CRI	ССТ	Lumens	Power (W)	LPW
SLD606827WH (JB)	80	2700	727	12.2	60
SLD606830WH (JB)	80	3000	760	12.2	62
SLD606835WH (JB)	80	3500	780	12.2	64
SLD606840WH (JB)	80	4000	800	12.2	66
SLD606927WH (JB)	90	2700	710	13.2	54
SLD606930WH (JB)	90	3000	735	13.2	56
SLD606935WH (JB)	90	3500	760	13.2	58
SLD606940WH (JB)	90	4000	780	13.2	59

SLD606830WH						
Luminair	760					
Input	Input watts					
LER (	LER (LPW)					
0	0-180		1.5			
Spacing Criteria	90-270		1.5			
Oncomu	Diag	onal	1.5			
Beam angl	e (degre	ees)	103			
Field angle	Field angle (degrees)					
Zonal lumen	Lumens		% Lumens			
0-30	215		28%			
0-40	364		48%			
0-60	631		83%			
0-90	760		100%			

# **Product and Photometric Data**

SLD6 - 1200 Series

Cat No.	CRI	CCT	Lumens	Power (W)	LPW
SLD612827WH	80	2700	1100	14.8	74
SLD612830WH	80	3000	1150	14.8	78
SLD612835WH	80	3500	1200	14.8	81
SLD612840WH	80	4000	1215	14.8	82
SLD612927WH	90	2700	880	14.8	59
SLD612930WH	90	3000	925	14.8	63
SLD612935WH	90	3500	965	14.8	65
SLD612940WH	90	4000	1000	14.8	68





#### Eaton

1121 Highway 74 South Peachtree City, GA 30269 P: 770-486-4800 www.eaton.com/lighting

Canada Sales 5925 McLaughlin Road Mississauga, Ontario L5R 1B8

P: 905-501-3000 F: 905-501-3172

### Our Lighting Product Lines

Ametrix AtLite Corelite Ephesus Fail-Safe HALO

**HALO** Commercial

io IRiS Lumark Lumière

Invue

McGraw-Edison

MWS Neo-Ray Portfolio

Metalux

RSA Shaper

Streetworks Sure-Lites

### **Our Controls Product Lines**

Fifth Light Technology Greengate iLight (International Only) iLumin Zero 88

### Connected Lighting Systems

Distributed Low-Voltage Power HALO Home iLumen Plus LumaWatt Pro WaveLinx

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