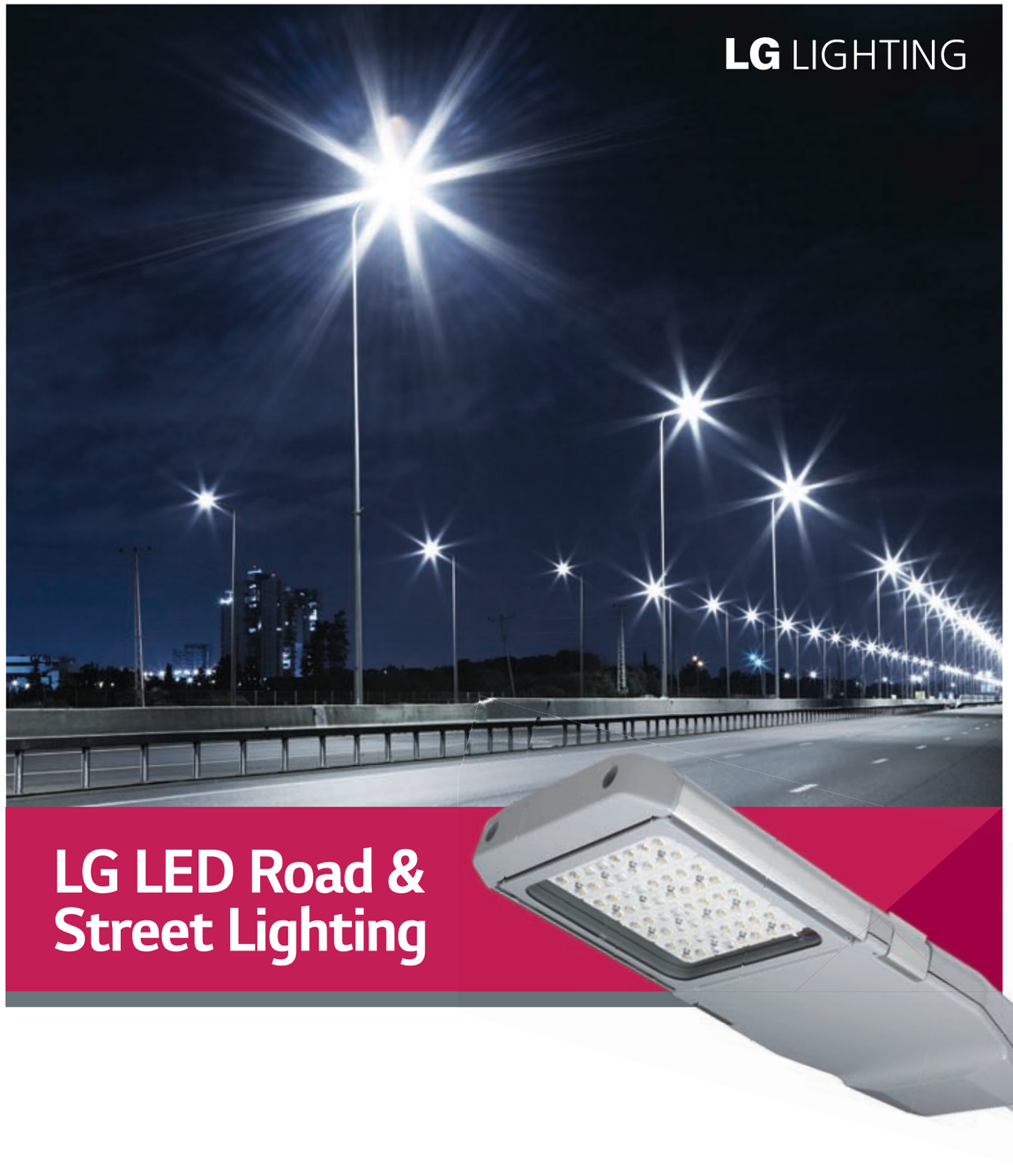
LG
Life's Good

LG LIGHTING



LG LED Road & Street Lighting

LG
Life's Good

For More Pleasant and Safer Nighttime Travel

Street lighting, which lights up living environment and roads, is linked closely to the safety of drivers and pedestrians. That's why the function of the lighting itself is most important. LG LED Road & Street Lighting has been designed to properly blend in with neighboring street furniture as well as to mainly function as lighting itself by applying the utmost simple design.

Make citizens' nighttime movement safe and pleasant. LG LED Road & Street Lighting improves the visual environment of drivers and pedestrians, secures their safety, and helps to create a pleasant and smooth traffic flow. The value of the street lighting LG Electronics is seeking is properly well-harmonized street lighting that offers quantity and quality of light and energy efficiency.

Energy Efficiency, Better Payback

LG LED Road & Street Lighting saves up to 55% on energy costs and greatly reduces maintenance costs with a longer lifespan compared to traditional street lights (Metal halide).

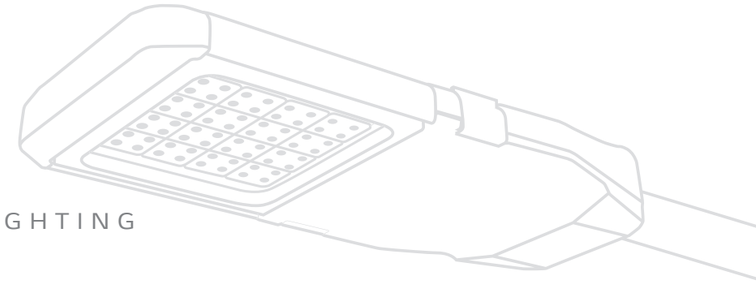
Optimized Lighting Solution

This is a customized lighting solution providing optimal brightness and light distribution to the applications by applying a modular design. Get maximum energy efficiency by lighting a target area with just enough light at the lowest energy consumption possible.

Customer-Focused Design

This is lighting with a modern, sleek design upgrading the dignity of the city view. What will truly make LG LED Road & Street Lighting stand out is that it has been optimally designed to meet the full range of outdoor lighting challenges. In addition, the modular design makes the installation and maintenance easier.

Energy Efficiency, Better Payback



LED ROAD & STREET LIGHTING

The Best Alternative to Traditional Street Lights

It saves up to 55% on energy and replaces traditional street lights without sacrificing performance through the optimization technique of LED package, thermal management, optical management.

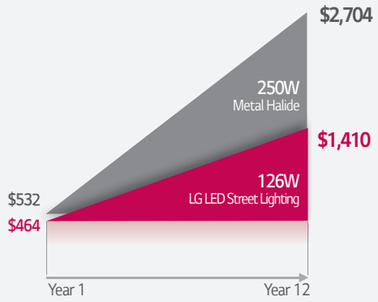
Metal Halide	Energy Savings	LG LED Street Lighting
 150W Metal Halide	52%	72W LED 
 250W Metal Halide	50%	126W LED 
 400W Metal Halide	55%	180W LED 

Pays for Itself, Then Starts Paying You

While other communities are still paying for costly replacing their conventional street lights, LG LED Road & Street Lighting will have returned your investment in lower operating expenses. A lower total cost of ownership will allow you to be flexible with your operating or capital expenses.

Total Cost of Ownership

	Metal Halide 250W	LG LED Street Lighting 126W
Consumption	250W	126W
Annual Electric Cost	$182	$92
Duration	10,000 hours	50,000 hours
Total Cost Over 12 years	$2,704	$1,410

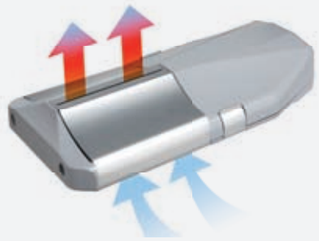


* Based on 12 hrs operation per day, electricity cost $0.16/kwh.
* Calculation result may differ by the operating conditions and product lifetime.

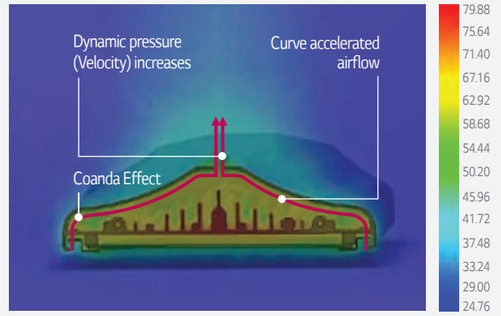
Long-lasting Performance Without Degradation

The efficacy and lifespan of LED is depending on the heat emission performance of the lighting. LG Electronics' unique convection technology allows airflow to efficiently cool all LED modules and keeps them at low temperature so that it can ensure the long lifespan of 100,000 hours with LM80 and great efficacy of up to 130lm/W.

Fluid Dynamic Features



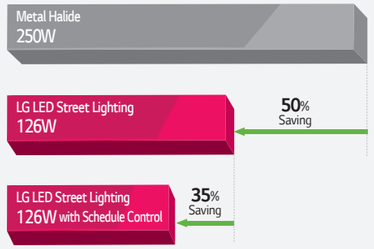
Temperature Spectrum Simulation



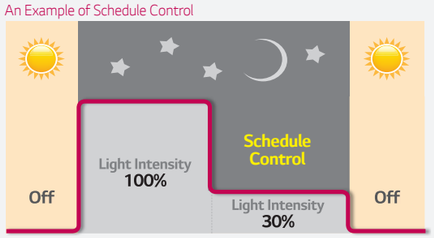
Maximize Energy Efficiency with Intelligent Controls

Combined with wired control options, you can also control light intensity. Not only do you save up 50% on energy by just replacing the traditional street lighting(metal halide) 250W with LG LED Road & Street Lighting 126W, you can also save about 35% more when it is combined with control options. After midnight, for example, when traffic decreases, lower the light intensity. LG LED Road & Street Lighting can contribute to energy saving and reducing the emission of greenhouse gases while maintaining its original function of lighting and safety within the road environment.

Annual Energy Consumption Comparison



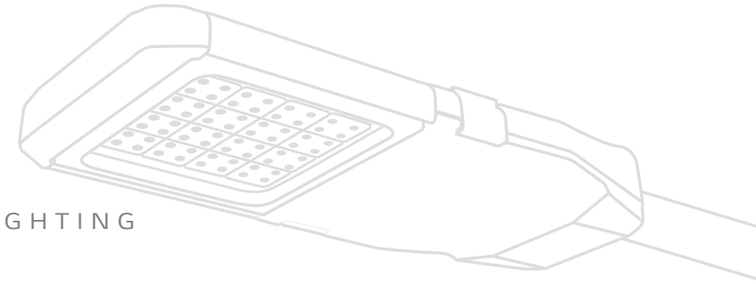
An Example of Schedule Control



[Before midnight] operating at 100% light intensity for 6 hrs
[After midnight] operating at 30% light intensity until sunrise

* Based on 12 hrs operation per day yearly.
* Calculation result may differ by the operating conditions.

Optimized Lighting Solution

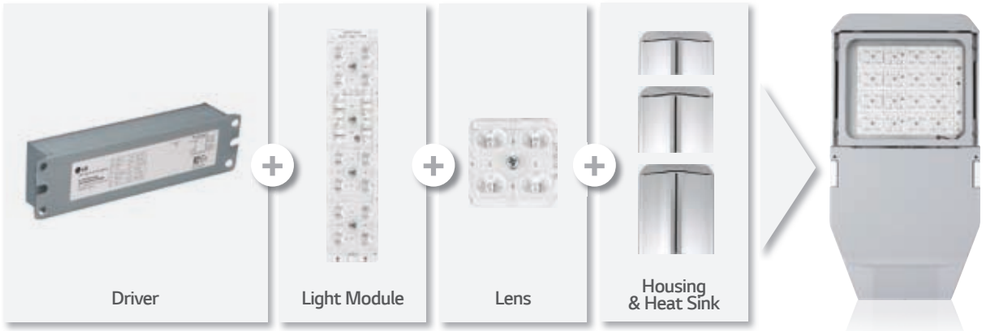


LED ROAD & STREET LIGHTING

Right Amount of Light in The Right Place

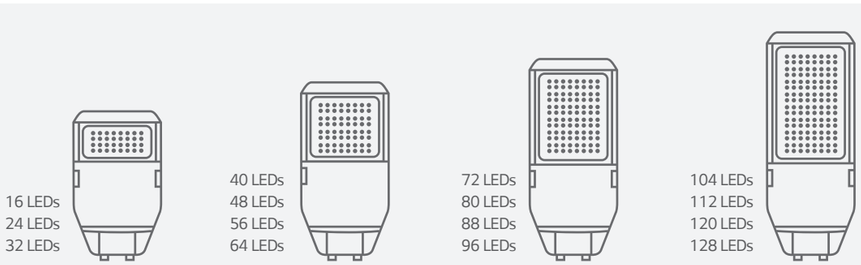
Use the right amount of light in the right place. This is the simplest and most effective way to save energy costs and ensure security at night. With a modular design, LG LED Road & Street Lighting can deal with various conditions required by the usage environment such as road lane, road width and the level of curve, vehicle speed, etc. In addition, it is suitable for a wide range of applications from suburban streets and urban traffic routes to highways.

Modular Design



LED Configurations

LG LED Road & Street Lighting has several standard LED configurations available, providing a broad range of lighting solutions.



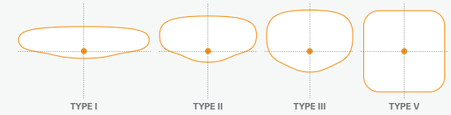
Easy Upgrades

You can easily upgrade your luminaire and retain the complete luminaire housing. This upgrades energy efficiency of the lighting for the future as well as greatly reduces the number of components to be replaced.

Efficiently Deliver Light Where You Need It

LED's directional light can be easily captured and controlled with precise optical lenses while significant light from traditional street lights is lost or uncontrolled. LG LED Road & Street Lighting provides optimized light according to road conditions with the different combination of the lenses.

Optical Distribution

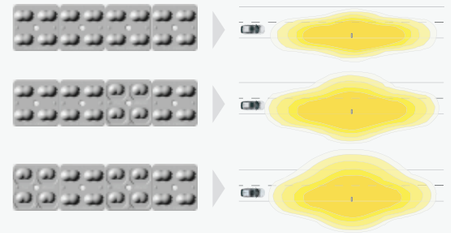


With the combination of two optical lenses by their arrangement or direction, it can create multiple light distributions.

Optical Lenses

In other words, IESNA Type I distribution can create various wave forms, which can flexibly correspond to all applications.

An Example of Various Light Distributions of Type I



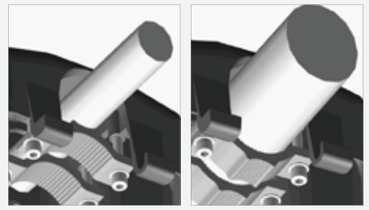
* Detailed light distributions will be available on DIALux web site : http://www.dial.de/DIAL/

Easy Installation Without Replacing the Pole

LG LED Road & Street Lighting is designed to be compatible with various pole diameters and arm angle so that it can be easily installed without replacaing the existing poles.

Adjust Tilt +/- 5 Degrees

Accommodates Different Arm Diameters (Ø34~63)



Customer-Focused Design

Tool-less Entry

It is possible to access the electrical compartment without additional tools. It makes the installation and maintenance quick and easy, saving time and money.

NEMA Receptacle (Option)

A NEMA receptacle can be added to allow the installation of a photocell control in the field.

Tempered Glass Cover

Tempered glass is three times mechanically stronger(IK08) than normal glass. It crumbles into small granular chunks instead of splintering into jagged shards when broken. The granular chunks are less likely to cause injury, which ensures enhanced safety.

IP66 Rating

IP66-rated housing protects the LEDs from degradation caused by environmental pollutants such as rain, ice, snow, dust, sand, etc.

Long-lasting Protection with Rugged Finish

Die-cast aluminum housing and polyester powder-coating finish provide long-lasting protection.

Surge Protection (Standard)

Integral surge protector with 10kV resistance prevents power damage caused by static electric spark such as lightning.

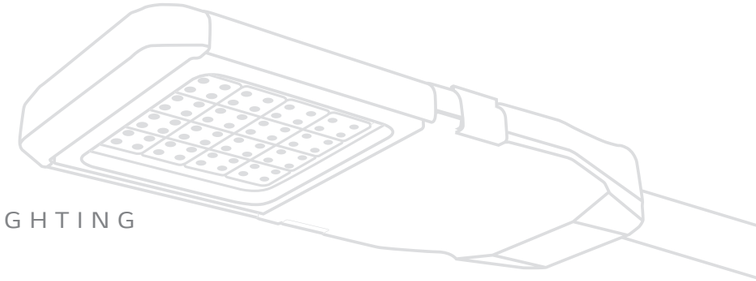
Preventing the Deposition of Foreign Substance

Unlike other LED street lights, channel of heat sink doesn't come into view but is covered with housing. This prevents dust, leaves, birds' droppings from getting stacked on the top of luminaire.

3G Vibration Rating

3G vibration rated to ensure strength of construction and longevity in application.
(Certified to ANSI C136.31-2001, 3G bridge and overpass vibration standards)

Product Specification



LED ROAD & STREET LIGHTING

Model Code for Entire Product Offering

S	70	57	0	T1	7	A	A
Product Family	System Wattage	LED Color Temp	Mounting	Optical Code	Function	Driver Platform	Color Rendering Index
S : Street Light	70 : 72W 11 : 108W 13 : 126W 15 : 145W 18 : 180W 20 : 198W 22 : 216W 24 : 237W 25 : 253W 27 : 272W 29 : 288W	40 : 4000K 57 : 5700K	0 : Direct Arm	T1 : Type1 T2 : Type2 T3 : Type3 T5 : Type5	3 : 350mA (Non-Dimming) 5 : 530mA (0-10V Dimming) 7 : 700mA (0-10V Dimming) A : 700mA (Non-Dimming) B : 530mA (Non-Dimming)	A : 75W B : 150W C : 75W +150W D : 150W +150W	A : CRI > 70 B : CRI > 75

* Standard 5700K CCT and nominal > 70 CRI * Consult factory for additional information
* System wattage based on standard(700mA) model

General Information

Color Rendering Index	Operating Temperature	Main Voltage	Control System Input	Optical Cover	IK Code	Power Factor	IP Grade
>70 (Optional : > 75)	-40°C < Ta < 50°C	120-277V/50-60Hz	0-10V	Glass, flat	IK 08	>0.9	IP 66

Performance Table

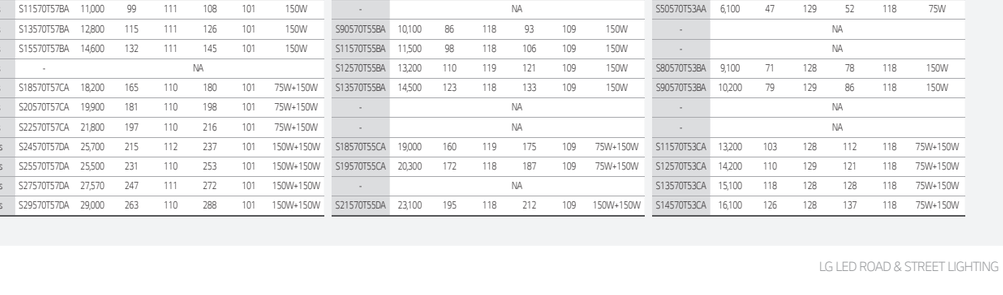
5700K/Type1	Standard : 700mA							Green1 : 530mA							Green2 : 350mA						
Number of LEDs	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform
32LEDs	S70570T17AA	8,000	66	122	72	110	75W	S50570T15AA	6,300	48	132	52	120	75W	S30570T13AA	4,300	30	143	33	130	75W
40LEDs	-				NA			S70570T15AA	8,000	61	131	67	120	75W	S57570T13AA	5,600	40	142	43	130	75W
48LEDs	S11570T17BA	12,000	99	121	108	110	150W	-				NA			S50570T13AA	6,700	47	141	52	130	75W
56LEDs	S13570T17BA	14,000	115	121	126	110	150W	S90570T15BA	11,100	86	130	93	120	150W	-				NA		
64LEDs	S15570T17BA	15,900	132	121	145	110	150W	S11570T15BA	12,700	98	130	106	120	150W	-				NA		
72LEDs	-				NA			S12570T15BA	14,500	110	131	121	120	150W	S80570T13BA	10,100	71	142	78	130	150W
80LEDs	S18570T17CA	20,000	165	121	180	110	75W+150W	S13570T15BA	16,000	123	131	133	120	150W	S90570T13BA	11,200	79	142	86	130	150W
88LEDs	S20570T17CA	22,000	181	121	198	110	75W+150W	-				NA			-				NA		
96LEDs	S22570T17CA	24,000	197	122	216	110	75W+150W	-				NA			-				NA		
104LEDs	S24570T17DA	26,500	215	123	237	110	150W+150W	S18570T15CA	21,000	160	132	175	120	75W+150W	S11570T13CA	14,600	103	142	112	130	75W+150W
112LEDs	S25570T17DA	28,000	231	121	253	110	150W+150W	S19570T15CA	22,500	172	131	187	120	75W+150W	S12570T13CA	15,700	110	142	121	130	75W+150W
120LEDs	S27570T17DA	30,200	247	122	272	110	150W+150W	-				NA			S13570T13CA	16,700	118	141	128	130	75W+150W
128LEDs	S29570T17DA	32,200	263	122	288	110	150W+150W	S21570T15DA	25,500	195	130	212	120	150W+150W	S14570T13CA	17,800	126	141	137	130	75W+150W

5700K/Type2	Standard : 700mA							Green1 : 530mA							Green2 : 350mA						
Number Of LEDs	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform
32LEDs	S70570T27AA	7,600	66	116	72	105	75W	S50570T25AA	6,000	48	125	52	115	75W	S30570T23AA	4,150	30	138	33	126	75W
40LEDs	-				NA			S70570T25AA	7,900	61	130	67	118	75W	S57570T23AA	5,500	40	139	43	128	75W
48LEDs	S11570T27BA	11,900	99	120	108	110	150W	-				NA			S50570T23AA	6,600	47	139	52	128	75W
56LEDs	S13570T27BA	13,900	115	120	126	110	150W	S90570T25BA	11,000	86	128	93	118	150W	-				NA		
64LEDs	S15570T27BA	15,800	132	120	145	110	150W	S11570T25BA	12,500	98	128	106	118	150W	-				NA		
72LEDs	-				NA			S12570T25BA	14,300	110	129	121	118	150W	S80570T23BA	10,000	71	140	78	128	150W
80LEDs	S18570T27CA	20,000	165	121	180	110	75W+150W	S13570T25BA	15,700	123	128	133	118	150W	S90570T23BA	11,050	79	139	86	128	150W
88LEDs	S20570T27CA	21,900	181	121	198	110	75W+150W	-				NA			-				NA		
96LEDs	S22570T27CA	23,800	197	121	216	110	75W+150W	-				NA			-				NA		
104LEDs	S24570T27DA	26,000	215	121	237	110	150W+150W	S18570T25CA	20,600	160	129	175	118	75W+150W	S11570T23CA	14,300	103	139	112	128	75W+150W
112LEDs	S25570T27DA	28,000	231	121	253	110	150W+150W	S19570T25CA	22,100	172	129	187	118	75W+150W	S12570T23CA	15,570	110	139	121	128	75W+150W
120LEDs	S27570T27DA	29,900	247	121	272	110	150W+150W	-				NA			S13570T23CA	16,500	118	140	128	128	75W+150W
128LEDs	S29570T27DA	31,700	263	120	288	110	150W+150W	S21570T25DA	25,100	195	128	212	118	150W+150W	S14570T23CA	17,500	126	139	137	128	75W+150W

* Specifications are subject to change without notice.

Product Dimensions

A Type	B Type	C Type	D Type
Size L580 X W340 X H110 mm	**Size** L682 X W340 X H110 mm	**Size** L784 X W340 X H110 mm	**Size** L886 X W340 X H110 mm
Weight 8.5kg	**Weight** 10kg	**Weight** 13Kg	**Weight** 14.5kg
EPA 0.77sq.ft. (0.064 sq.m)	**EPA** 0.90sq.ft. (0.075 sq.m)	**EPA** 1.03sq.ft. (0.086 sq.m)	**EPA** 1.17sq.ft. (0.097 sq.m)



* EPA(Effective Projected Area) : Fixture Only

5700K/Type3	Standard : 700mA							Green1 : 530mA							Green2 : 350mA						
Number Of LEDs	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform
32LEDs	S70570T37AA	7,400	66	113	72	102	75W	S50570T35AA	5,850	48	122	52	112	75W	S30570T33AA	4,100	30	137	33	124	75W
40LEDs	-				NA			S70570T35AA	7,800	61	128	67	117	75W	S57570T33AA	5,450	40	138	43	127	75W
48LEDs	S11570T37BA	11,750	99	119	108	108	150W	-				NA			S50570T33AA	6,550	47	138	52	127	75W
56LEDs	S13570T37BA	13,600	115	118	126	108	150W	S90570T35BA	10,800	86	126	93	117	150W	-				NA		
64LEDs	S15570T37BA	15,600	132	118	145	108	150W	S11570T35BA	12,570	98	127	106	117	150W	-				NA		
72LEDs	-				NA			S12570T35BA	14,100	110	128	121	117	150W	S80570T33BA	9,850	71	138	78	127	150W
80LEDs	S18570T37CA	19,500	165	118	180	108	75W+150W	S13570T35BA	15,500	123	126	133	117	150W	S90570T33BA	11,000	79	139	86	127	150W
88LEDs	S20570T37CA	21,600	181	119	198	108	75W+150W	-				NA			-				NA		
96LEDs	S22570T37CA	23,570	197	118	216	108	75W+150W	-				NA			-				NA		
104LEDs	S24570T37DA	25,700	215	120	237	108	150W+150W	S18570T35CA	20,570	160	128	175	117	75W+150W	S11570T33CA	14,200	103	138	112	127	75W+150W
112LEDs	S25570T37DA	27,700	231	120	253	108	150W+150W	S19570T35CA	21,900	172	128	187	117	75W+150W	S12570T33CA	15,300	110	138	121	127	75W+150W
120LEDs	S27570T37DA	29,500	247	119	272	108	150W+150W	-				NA			S13570T33CA	16,300	118	138	128	127	75W+150W
128LEDs	S29570T37DA	31,300	263	119	288	108	150W+150W	S21570T35DA	24,700	195	126	212	117	150W+150W	S14570T33CA	17,570	126	138	137	127	75W+150W

5700K/Type5	Standard : 700mA							Green1 : 530mA							Green2 : 350mA						
Number Of LEDs	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform	Model Code	Typical Delivered Lumens (lm)	Typical Lamp Wattage (W)	Typical Lamp Efficiency (lm/W)	Typical System Wattage (W)	Typical System Efficacy (lm/W)	Driver Platform
32LEDs	S70570T57AA	7,100	66	108	72	98	75W	S50570T55AA	5,600	48	117	52	107	75W	S30570T53AA	3,850	30	128	33	117	75W
40LEDs	-				NA			S70570T55AA	7,250	61	119	67	109	75W	S57570T53AA	5,100	40	129	43	118	75W
48LEDs	S11570T57BA	11,000	99	111	108	101	150W	-				NA			S50570T53AA	6,100	47	129	52	118	75W
56LEDs	S13570T57BA	12,800	115	111	126	101	150W	S90570T55BA	10,100	86	118	93	109	150W	-				NA		
64LEDs	S15570T57BA	14,600	132	111	145	101	150W	S11570T55BA	11,500	98	118	106	109	150W	-				NA		
72LEDs	-				NA			S12570T55BA	13,200	110	119	121	109	150W	S80570T53BA	9,100	71	128	78	118	150W
80LEDs	S18570T57CA	18,200	165	110	180	101	75W+150W	S13570T55BA	14,500	123	118	133	109	150W	S90570T53BA	10,200	79	129	86	118	150W
88LEDs	S20570T57CA	19,900	181	110	198	101	75W+150W	-				NA			-				NA		
96LEDs	S22570T57CA	21,800	197	110	216	101	75W+150W	-				NA			-				NA		
104LEDs	S24570T57DA	25,700	215	112	237	101	150W+150W	S18570T55CA	19,000	160	119	175	109	75W+150W	S11570T53CA	13,200	103	128	112	118	75W+150W
112LEDs	S25570T57DA	25,500	231	110	253	101	150W+150W	S19570T55CA	20,300	172	118	187	109	75W+150W	S12570T53CA	14,200	110	129	121	118	75W+150W
120LEDs	S27570T57DA	27,570	247	111	272	101	150W+150W	-				NA			S13570T53CA	15,100	118	128	128	118	75W+150W
128LEDs	S29570T57DA	29,000	263	110	288	101	150W+150W	S21570T55DA	23,100	195	118	212	109	150W+150W	S14570T53CA	16,100	126	128	137	118	75W+150W