



Client:	
Order #:	
Project:	
Type:	



FEATURES

- Wide variety of options for both power and CCT selections to meet your application requirements more easily.
- Four optical distributions to put the light where you need it most without wasted light and energy.
- Available control options for both dusk to dawn operation and Bi-level occupancy to save energy while still meeting security and safety lighting levels.
- 134,000 hours to reach a 70% lumen maintenance ensures that this long lasting fixture will operate for years maintenance free.
- Dark Sky compliant options available.

CONSTRUCTION & ELECTRICAL

- Rugged Die Cast one piece aluminum housing.
- TAA assembly options available.
- Flexible mounting options to suit your project.
- Low profile, 3G rated design reduces wind loading requirements.
- Universal 120-277VAC 50/60 Hz or 347-480VAC Input voltage options.
- 0-10V Dimming (10%-100%) Driver
- Standard Surge Protection
 - 10KV - (120-277VAC)
 - 20KV - (347-480VAC)
- Power Factor > 0.9
- THD < 20%

PERFORMANCE DATA

EFFICACY

134 - 164 Lumens per Watt (LPW)

CCT/CRI

30K, 40K, 50K, 70+ CRI

RATED LIFE

>100,000 Hours (L70)

LUMEN OUTPUT

Lumen Output Ranges from 6,500 to 60,000 Lumens

OPERATING TEMPS

-40°C to +45°C Ambient (40°C for 400W)

WARRANTY

5 year Standard
10 Year Extended
10 Year Extended with Labor

ORDERING INFORMATION

SPARTAN / _____ / _____ / _____ / _____ / _____ / _____ / _____ / _____ / _____ / _____ / _____ / _____ / _____ / _____

SERIES SIZE WATTAGE CCT OPTICAL VOLTAGE DRIVER FINISH PHOTOCELL CONTROLS MOUNTING SHIELDING BUY WARRANTY
DISTR. FEATURES ACCESSORIES AMERICA

FIXTURE SERIES	
SPARTAN	LED Area Lighter
SIZE	
16	16 Inch Nominal Length (100WS, 140WS, 180WS)
25	25 Inch Nominal Length (250WS, 300WS, 400WS)
WATTAGE	
100WS	40W, 60W, 80W, 100W Select. (6,560 - 15,800 lm)
140WS	60W, 90W, 120W, 140W Select. (9,600 - 23,000 lm)
180WS	72W, 108W, 144W, 180W Select. (10,800 - 27,000 lm)
300WS	120W, 180W, 240W, 300W Select. (18,500 - 45,000 lm)
400WS	300W, 320W, 360W, 400W Select. (46,500 - 60,500 lm) <small>(only 40K and 50K CCT Select)</small>
CCT	
CS	70+ CRI, 30K, 40K, 50K CCT Select.
OPTICAL DISTRIBUTION	
T2	Type II Distribution (Road and Pathways)
T3	Type III Forward Throw Distribution
T4	Type IV Forward Throw Distribution (Min. Backlight)
T5	Type V General Area Distribution

VOLTAGE	
UNV	Universal 120-277VAC
UHV	Universal High 347-480VAC
DRIVER FEATURES	
10V	0-10V Dimming
12A	12V Aux Power & 0-10V Dimming
FINISH	
BZ	Bronze Powder Coat Finish (Standard)
CU	Custom Powder Coat Finish (Contact Factory)
PHOTOCELL	
PC	120-277 VAC Photocell - 3 Pin NEMA - ON/OFF
PC4	480 VAC Photocell - 3 Pin NEMA - ON/OFF
PC7	120-277 VAC Photocell - 7 Pin NEMA - ON/DIM/OFF
CONTROLS	
SRP	Sensor Ready Plug'n'Play Port
MP	Motion PIR Occ. Plug'n'Play
MPBA	Motion PIR Occ. Plug'n'Play, Bluetooth App Control
MWP	Motion Sensor, Microwave Occ., Plug'n'Play
MWPBA	Motion Sensor, Microwave Occ., Plug'n'Play, Bluetooth App Control
MDLD	Motion PIR Occ. & Daylight Harv., Direct Mount Line Voltage

MOUNTING ACCESSORIES	
APB	Arm Pole Bracket, Fits 4 In. and 5 In. Square and Round Poles
AAPB	Adjustable Arm Pole Bracket, Fits 4 IN and 5 IN Square and Round Poles (No PC)
SPF	Slip Fitter for 2 - 3/8 In Tenon
WMB	Wall Mount Bracket
YKM	Yoke Mount
SHIELDING	
BLGS	Back Light Glare Shield
FVGS	Full Visor Glare Shield
BLAS	Back Light Adjustable Control Shield (25in. fixture needs 2pcs)
BUY AMERICA	
-	Standard Production and Assembly
TAA	Trade America Act Compliant (CoO: Cambodia)
WARRANTY	
-	5 Year Warranty (Standard)
10Y	10 Year Warranty
10YL	10 Year Warranty with Labor



MOUNTING ACCESSORIES



APB - Arm Pole Bracket
Fits both 4 and 5 Inch Round and Square Poles simplifying project specifications.



SPF - Slip Fitter for 2 3/8 In Tenon
Allows for angle adjustment and installation onto horizontal 2 3/8 O.D. pole top tenon adapters.



WMB - Wall Mount Bracket
Wall mount is easy to install for direct wall mounting with 1/2 In conduit wiring or standard J Box mounting.

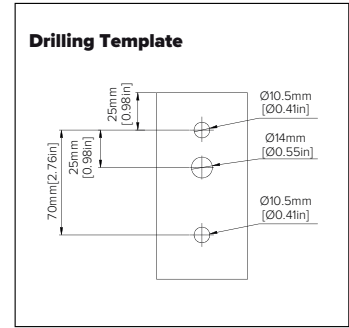
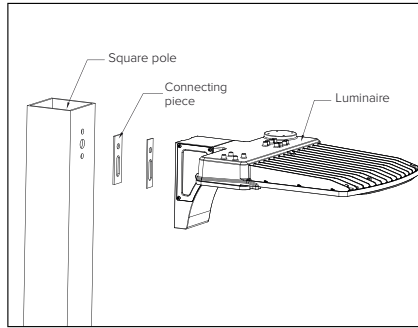
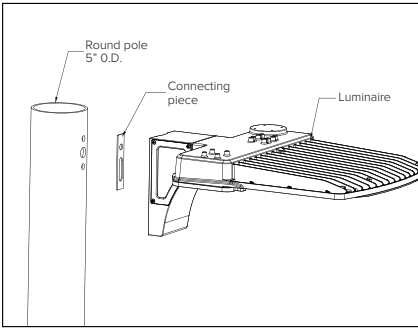


YKM - Yoke Mount
Die cast aluminum yoke mount easily adapts to many surfaces and with angle adjustment for fixture aiming.



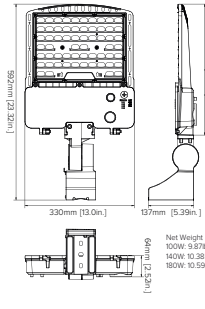
AAPB - Adjustable Arm Bracket
Versatile adjustable mounting arm fit both 4 and 5 Inch Round and Square poles great for retrofitting existing parking lot and area lights. (NO PC)

APB/AAPB - MOUNTING DIAGRAMS

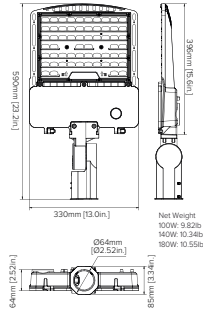


DIMENSION
unit: inch/mm

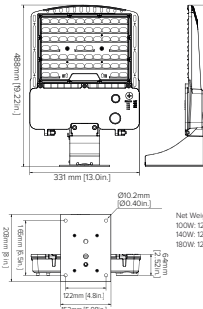
100W/140W/180W (Adjustable Square Mount)



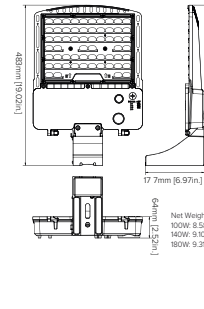
100W/140W/180W (Slipfitter Mount)



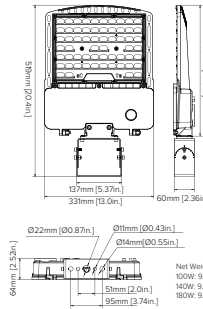
100W/140W/180W (Wall Mount)



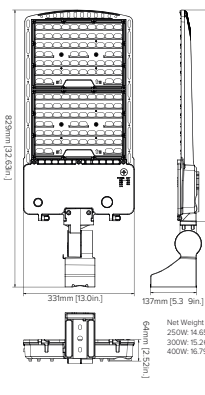
100W/140W/180W (Pole Mount)



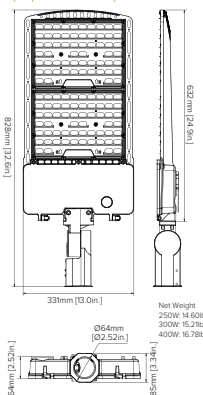
100W/140W/180W (Yoke Mount)



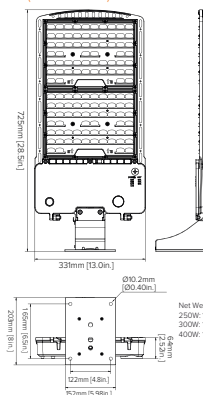
300W/400W (Adjustable Square Mount)



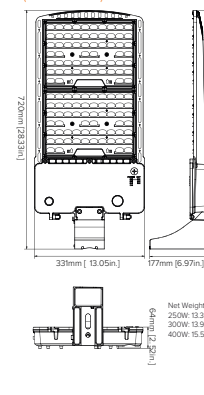
300W/400W (Slipfitter Mount)



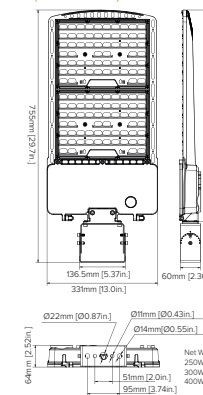
300W/400W (Wall Mount)



300W/400W (Pole Mount)



300W/400W (Yoke Mount)



STRUCTURAL DESIGN

Housing
The one-piece die-cast housing with corrosion-resistant coating protection and the modular design extend the life of the luminaire while making it easy to maintain.

Photometry
Optional Type II, Type III, Type IV and Type V Photometry as per applications.

Photocell
Dusk to dawn controls can be utilized via optional NEMA twist-lock photocell.

CCT & POWER Adjustable
Offer four selectable lumen output (40%/60%/80%/100%), and three selectable CCTs (30K/40K/50K)

Occupancy Sensor
Optional occupancy sensor allows for security and energy saving.

Mounting
Optional for square, round pole mount, Slipfitter, wall mount, yoke mount. All mounting brackets are simple to operate, which can realize single operation and reduce labor costs.

POWER SELECTABLE
- +

CCT SELECTABLE
- +

POWER	CCT
LV1	5KK
LV2	4KK
LV3	3KK
LV4	

ACCESSORIES(Optional)

Spartan series features a backlight control which provides reduced pixilation and increased visual comfort without compromising performance. External Glare Shield: sold separately or as an accessory.

<p>Black Light Glare Shield</p>		<p>Full Visor Glare Shield</p>	
<p>Plug-and-Play PIR Sensor PIR sensor: MSP Bluetooth PIR sensor: MSP</p>	<p>Plug-and-Play Microwave Sensor Microwave sensor: MSM Bluetooth microwave sensor: MSM</p>	<p>120-277V PIR Sensor PIR sensor: MSP Bluetooth PIR sensor: MSP</p>	<p>NEMA Photocell 3 pin NEMA Type: MS-PSUNVB1 3 pin NEMA Type(480V): JL-207F 7 pin NEMA Type: JL-241C</p>
<p>Back Light Control Shield</p>			

ADDITIONAL MOUNTING ACCESSORIES

POLE BRACKET • For mounting one fixture on an existing pole			
	<p>4" Square Pole Mount with 2-3/8" O.D. Tenon No. 4SQ-SP-D Finish: Dark Bronze USE: For use with square, non-tapered steel and aluminum poles. Furnished with four 5/16" hex head stainless-steel bolts. Vertical tenon measures 2-3/8" O.D., and is made of steel tubing. Fixtures mounted to this bracket can be adjusted both vertically and horizontally.</p>		<p>4" Round Pole Mount with 2-3/8" O.D. Tenon NO. 4SQR-SP-D Finish: Dark Bronze USE: For use with Round, non-tapered steel and aluminum poles. Furnished with three 3/8" hex head stainless-steel bolts. Vertical tenon measures 2-3/8" O.D., and is made of steel tubing. Fixtures mounted to this bracket can be adjusted both vertically and horizontally.</p>
	<p>5" Square Pole Mount with 2-3/8" O.D. Tenon No. 5SQ-SP-D Finish: Dark Bronze USE: For use with square, non-tapered steel and aluminum poles. Furnished with four 5/16" hex head stainless-steel bolts. Vertical tenon measures 2-3/8" O.D., and is made of steel tubing. Fixtures mounted to this bracket can be adjusted both vertically and horizontally.</p>		<p>5" Round Pole Mount with 2-3/8" O.D. Tenon NO. 5SQR-SP-D Finish: Dark Bronze USE: For use with Round, non-tapered steel and aluminum poles. Furnished with three 3/8" hex head stainless-steel bolts. Vertical tenon measures 2-3/8" O.D., and is made of steel tubing. Fixtures mounted to this bracket can be adjusted both vertically and horizontally.</p>
	<p>Pole Bracket Accessories -Angle-Adjustment Adapter NO. SQA-ALDA Finish: Dark Bronze USE: Durable brackets are engineered to provide versatile mounting options. These arms are made from rugged die-cast aluminum. They allow optimal positioning of the light fixture to maximize the lighting effectiveness vertically and horizontally.</p>		<p>Pole Bracket accessories - Tenon & Yoke Adaptor NO. SP-TR-D Finish: Dark Bronze USE: The 2-3/8" OD Tenon Mount Adaptor for Yoke Fixtures is designed to mount MESTER light fixtures that are equipped with a yoke mount onto a 2-3/8" OD tenon. It may be utilized with the Mester Flood Light Series of light fixtures.</p>
	<p>Horizontal Wall or Square or Round pole mount with 2-3/8" Tenon Bracket NO. SQ/R-SP-D Finish: Dark Bronze USE: This tenon bracket can be installed onto a wall , square pole, round pole. Provides wiring access and abuilt-in 2-3/8" O.D. tenon to mount a fixture with our adjustable slipfitter. Suggested 3/8" diameter bolts for mounting.</p>		<p>Adjustable Arm Mount Kit NO. SQADAL08-A Finish: Dark Bronze Description: Adjustable pole mount kit, suitable for 4" & 5" square or round pole</p>
WALL BRACKET • Attaches to any flat surface • Provides wiring access		Mid-Pole tenon Bracket	
	<p>90° Wall Mount Bracket with 2-3/8" O.D. Tenon NO. WM-SP-D Finish: Dark Bronze USE: The 90° wall mount bracket with 2-3/8" tenon attaches an MESTER floodlight to almost any surface: wall, roof, or wood pole. Provides wiring access and abuilt-in 2-3/8" O.D. tenon to mount a fixture with our adjustable slipfitter. Suggested 3/8" diameter bolts for mounting. Mounting holes are spaced 3-1/4" apart.</p>		<p>2-3/8" OD Horizontal Tenon Mid-Pole Bracket NO. SQ-SP-D Finish: Dark Bronze USE: 2-3/8" OD Horizontal Tenon Mid-Pole Bracket is designed to mount light fixture that is equipped with an adjustable slipfitter onto a 2-3/8" OD horizontal tenon</p>
Round External Mount Horizontal Tenon • To mount 2/3/4 fixtures on a existing pole			
	<p>Double 90° Horizontal Tenon Adaptor NO. R60-SP2-90-D Finish: Dark Bronze USE: The Bracket is designed to mount over 2-3/8" (60mm) O.D. vertical tenon. Two fixtures can be mounted to the Round External Mount Horizontal Tenon and adjusted horizontally</p>		<p>Triple 120° Horizontal Tenon Adaptor NO. R60-SP3-120-D Finish: Dark Bronze USE: The Bracket is designed to mount over 2-3/8" (60mm) O.D. vertical tenon. Three fixtures can be mounted to the Round External Mount Horizontal Tenon and adjusted horizontally</p>
	<p>Double 180° Horizontal Tenon Adaptor NO. R60-SP2-180-D Finish: Dark Bronze USE: The Bracket is designed to mount over 2-3/8" (60mm) O.D. vertical tenon. Two fixtures can be mounted to the Round External Mount Horizontal Tenon and adjusted horizontally</p>		<p>Quad 90° Horizontal Tenon Adaptor NO. R60-SP4-90-D Finish: Dark Bronze USE: The Bracket is designed to mount over 2-3/8" (60mm) O.D. vertical tenon. Four fixtures can be mounted to the Round External Mount Horizontal Tenon and adjusted horizontally</p>
	<p>Triple 90° Horizontal Tenon Adaptor NO. R60-SP3-90-D Finish: Dark Bronze USE: The Bracket is designed to mount over 2-3/8" (60mm) O.D. vertical tenon. Three fixtures can be mounted to the Round External Mount Horizontal Tenon and adjusted horizontally</p>		

PERFORMANCE DATA

SPARTAN 100W									
SETTING	SYSTEM WATTS	DIST.TYPE	CRI	3000K		4000K		5000K	
				LUMENS	LPW	LUMENS	LPW	LUMENS	LPW
100%	100W	2	70	14500lm	145 lm/W	15800lm	158 lm/W	15000lm	150 lm/W
		3	70	14500lm	145 lm/W	15800lm	158 lm/W	15000lm	150 lm/W
		4	70	14500lm	145 lm/W	15800lm	158 lm/W	15000lm	150 lm/W
		5	70	15100lm	151 lm/W	16000lm	160 lm/W	15600lm	156 lm/W
80%	80W	2	70	12000lm	150 lm/W	13000lm	163 lm/W	12500lm	156 lm/W
		3	70	12000lm	150 lm/W	13000lm	163 lm/W	12500lm	156 lm/W
		4	70	12000lm	150 lm/W	13000lm	163 lm/W	12500lm	156 lm/W
		5	70	12500lm	156 lm/W	13300lm	166 lm/W	12800lm	160 lm/W
60%	60W	2	70	9300lm	155 lm/W	10000lm	167 lm/W	9600lm	160 lm/W
		3	70	9300lm	155 lm/W	10000lm	167 lm/W	9600lm	160 lm/W
		4	70	9300lm	155 lm/W	10000lm	167 lm/W	9600lm	160 lm/W
		5	70	9600lm	160 lm/W	10200lm	170 lm/W	9850lm	164 lm/W
40%	40W	2	70	6400lm	160 lm/W	6800lm	170 lm/W	6560lm	164 lm/W
		3	70	6400lm	160 lm/W	6800lm	170 lm/W	6560lm	164 lm/W
		4	70	6400lm	160 lm/W	6800lm	170 lm/W	6560lm	164 lm/W
		5	70	6560lm	164 lm/W	7000lm	175 lm/W	6700lm	168 lm/W

SPARTAN 140W									
SETTING	SYSTEM WATTS	DIST.TYPE	CRI	3000K		4000K		5000K	
				LUMENS	LPW	LUMENS	LPW	LUMENS	LPW
100%	140W	2	70	20000lm	147 lm/W	23000lm	164 lm/W	21000lm	150 lm/W
		3	70	20000lm	147 lm/W	23000lm	164 lm/W	21000lm	150 lm/W
		4	70	20000lm	147 lm/W	23000lm	164 lm/W	21000lm	150 lm/W
		5	70	21000lm	150 lm/W	23500lm	168 lm/W	21500lm	154 lm/W
80%	120W	2	70	18000lm	150 lm/W	20000lm	167 lm/W	18500lm	154 lm/W
		3	70	18000lm	150 lm/W	20000lm	167 lm/W	18500lm	154 lm/W
		4	70	18000lm	150 lm/W	20000lm	167 lm/W	18500lm	154 lm/W
		5	70	18500lm	154 lm/W	20500lm	171 lm/W	19000lm	158 lm/W
60%	90W	2	70	13800lm	153 lm/W	15200lm	169 lm/W	14200lm	158 lm/W
		3	70	13800lm	153 lm/W	15200lm	169 lm/W	14200lm	158 lm/W
		4	70	13800lm	153 lm/W	15200lm	169 lm/W	14200lm	158 lm/W
		5	70	14000lm	156 lm/W	15600lm	172 lm/W	14500lm	161 lm/W
40%	60W	2	70	9400lm	157 lm/W	10300lm	172 lm/W	9700lm	162 lm/W
		3	70	9400lm	157 lm/W	10300lm	172 lm/W	9700lm	162 lm/W
		4	70	9400lm	157 lm/W	10300lm	172 lm/W	9700lm	162 lm/W
		5	70	9600lm	160 lm/W	10500lm	175 lm/W	10000lm	167 lm/W

SPARTAN 180W									
SETTING	SYSTEM WATTS	DIST.TYPE	CRI	3000K		4000K		5000K	
				LUMENS	LPW	LUMENS	LPW	LUMENS	LPW
100%	180W	2	70	24800lm	138 lm/W	27000lm	150 lm/W	25200lm	140 lm/W
		3	70	24800lm	138 lm/W	27000lm	150 lm/W	25200lm	140 lm/W
		4	70	24800lm	138 lm/W	27000lm	150 lm/W	25200lm	140 lm/W
		5	70	25500lm	142 lm/W	28000lm	156 lm/W	26000lm	144 lm/W
80%	144W	2	70	20200lm	140 lm/W	22000lm	153 lm/W	20600lm	143 lm/W
		3	70	20200lm	140 lm/W	22000lm	153 lm/W	20600lm	143 lm/W
		4	70	20200lm	140 lm/W	22000lm	153 lm/W	20600lm	143 lm/W
		5	70	20800lm	144 lm/W	22800lm	158 lm/W	21000lm	146 lm/W
60%	108W	2	70	15300lm	142 lm/W	16800lm	156 lm/W	15700lm	145 lm/W
		3	70	15300lm	142 lm/W	16800lm	156 lm/W	15700lm	145 lm/W
		4	70	15300lm	142 lm/W	16800lm	156 lm/W	15700lm	145 lm/W
		5	70	15800lm	146 lm/W	17300lm	160 lm/W	16200lm	150 lm/W
40%	72W	2	70	10500lm	146 lm/W	11500lm	160 lm/W	10800lm	150 lm/W
		3	70	10500lm	146 lm/W	11500lm	160 lm/W	10800lm	150 lm/W
		4	70	10500lm	146 lm/W	11500lm	160 lm/W	10800lm	150 lm/W
		5	70	10800lm	150 lm/W	11800lm	164 lm/W	11000lm	153 lm/W

SPARTAN 300W									
SETTING	SYSTEM WATTS	DIST.TYPE	CRI	3000K		4000K		5000K	
				LUMENS	LPW	LUMENS	LPW	LUMENS	LPW
100%	300W	2	70	41000lm	137 lm/W	45000lm	150 lm/W	42000lm	140 lm/W
		3	70	41000lm	137 lm/W	45000lm	150 lm/W	42000lm	140 lm/W
		4	70	41000lm	137 lm/W	45000lm	150 lm/W	42000lm	140 lm/W
		5	70	42500lm	142 lm/W	46000lm	153 lm/W	43500lm	145 lm/W
80%	240W	2	70	33600lm	140 lm/W	37000lm	154 lm/W	34500lm	144 lm/W
		3	70	33600lm	140 lm/W	37000lm	154 lm/W	34500lm	144 lm/W
		4	70	33600lm	140 lm/W	37000lm	154 lm/W	34500lm	144 lm/W
		5	70	34500lm	144 lm/W	38000lm	158 lm/W	35500lm	148 lm/W
60%	180W	2	70	26000lm	144 lm/W	28600lm	159 lm/W	26600lm	148 lm/W
		3	70	26000lm	144 lm/W	28600lm	159 lm/W	26600lm	148 lm/W
		4	70	26000lm	144 lm/W	28600lm	159 lm/W	26600lm	148 lm/W
		5	70	26600lm	148 lm/W	29700lm	165 lm/W	27500lm	153 lm/W
40%	120W	2	70	18000lm	150 lm/W	20000lm	167 lm/W	18500lm	154 lm/W
		3	70	18000lm	150 lm/W	20000lm	167 lm/W	18500lm	154 lm/W
		4	70	18000lm	150 lm/W	20000lm	167 lm/W	18500lm	154 lm/W
		5	70	18500lm	154 lm/W	20800lm	173 lm/W	19000lm	158 lm/W

SPARTAN 400W							
SETTING	SYSTEM WATTS	DIST.TYPE	CRI	4000K		5000K	
				LUMENS	LPW	LUMENS	LPW
LV1	400W	2	70	60500lm	151 lm/W	60000lm	150 lm/W
		3	70	60500lm	151 lm/W	60000lm	150 lm/W
		4	70	60500lm	151 lm/W	60000lm	150 lm/W
		5	70	61000lm	153 lm/W	60800lm	152 lm/W
LV2	360W	2	70	56000lm	156 lm/W	55000lm	153 lm/W
		3	70	56000lm	156 lm/W	55000lm	153 lm/W
		4	70	56000lm	156 lm/W	55000lm	153 lm/W
		5	70	56500lm	157 lm/W	55500lm	154 lm/W
LV3	320W	2	70	51000lm	159 lm/W	50000lm	156 lm/W
		3	70	51000lm	159 lm/W	50000lm	156 lm/W
		4	70	51000lm	159 lm/W	50000lm	156 lm/W
		5	70	51500lm	161 lm/W	50500lm	159 lm/W
LV4	300W	2	70	47000lm	162 lm/W	46000lm	159 lm/W
		3	70	47000lm	162 lm/W	46000lm	159 lm/W
		4	70	47000lm	162 lm/W	46000lm	159 lm/W
		5	70	47500lm	164 lm/W	46500lm	160 lm/W

BUG @5000K

SYSTEM WATTS	VOLTAGE	DIST.TYPE	B	U	G
100W	120-277V/347-480V	2	3	0	3
		3	3	0	3
		4	3	0	2
		5	4	0	2
140W	120-277V/347-480V	2	3	0	3
		3	3	0	3
		4	3	0	3
180W	120-277V/347-480V	5	4	0	2
		2	3	0	3
		3	3	0	3
300W	120-277V/347-480V	4	3	0	3
		2	5	0	4
		3	4	0	4
400W	120-277V/347-480V	4	4	0	4
		5	5	0	4
		2	5	0	4
		3	5	0	5
		4	5	0	5
		5	5	0	4

ELECTRICAL DATA

Number Of Drivers	Driver Current (mA)	Nominal Power (W)	INPUT VOLTAGE (V)	CURRENT (Amps)
1	850	100	120	0.83
		100	208	0.48
		100	240	0.42
		100	277	0.36
	2520	100	347	0.29
		100	480	0.21
1	1200	140	120	1.17
		140	208	0.67
		140	240	0.58
		140	277	0.51
		140	347	0.40
		140	480	0.29
1	960	180	120	1.50
		180	208	0.87
		180	240	0.75
		180	277	0.65
		180	347	0.52
		180	480	0.38
1	1500	300	120	2.50
		300	208	1.44
		300	240	1.25
		300	277	1.08
		300	347	0.86
		300	480	0.63
1	1460	400	120	3.33
		400	208	1.92
		400	240	1.67
		400	277	1.44
		400	347	1.15
		400	480	0.83