



PRODUCT SPECIFICATION AND CATALOG

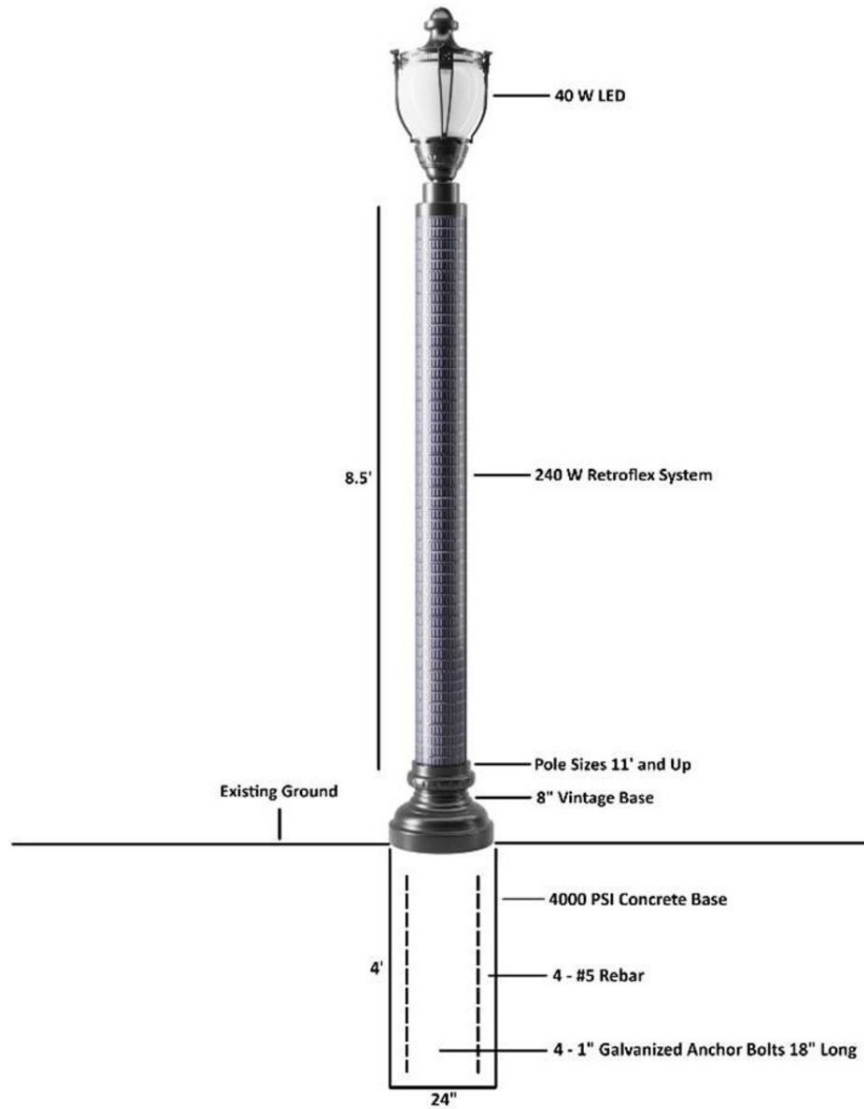


TABLE OF CONTENT

▪ RS 240 / RS260 / RS320 SINGLE HEAD	PG 5-9
▪ RS 400 DOUBLE HEAD MODEL	PG 10
▪ RW240 / RW260 / RW320 / RW400	PG 12-16
▪ RW540 / RW620 / RW700	PG 17-19
▪ RW480 / RW520 / RW780 DOUBLE HEAD	PG 20-22
▪ LUMINAIRES	PG 23
▪ RESIDENTIAL AND COMMERCIAL BASES	PG 24
▪ GOBO A LUMINAIRE SPECIFICATION	PG 25
▪ GOBO F LUMINIARE SPECIFICATION	PG 26
▪ GOBO L LUMINAIRE SPECIFICATION	PG 27
▪ GOBO T LUMINAIRE SPECIFICATION	PG 28
▪ GAMA T LUMINAIRE SPECIFICATION	PG 29
▪ GAMA L LUMINAIRE SPECIFICATION	PG 30
▪ SMART POLES (RWSMC, RWS, RWSM)	PG 31-33
▪ SMART POLE OPERATIONS AND ECONOMICS	PG 34
▪ WIRELESS LIGHTING MONITORING AND CONTROLS	PG 35-36
▪ CLEARWORLD PaaS	PG 37
▪ CLEARWORLD DASHBOARD	PG 38-39
▪ CLEARWORLD PRODUCT SPECS	PG 40-45
▪ SMART APPLICATION – ENVIRONMENTAL SENSORS PRICING	PG 46
▪ SMART APPLICATIONS CAMERAS AND WIFI PRICING	PG 47
▪ SMART APPLICATION TIER PRICING	PG 48

RS 240 / 260 / 320 / 400 MODELS

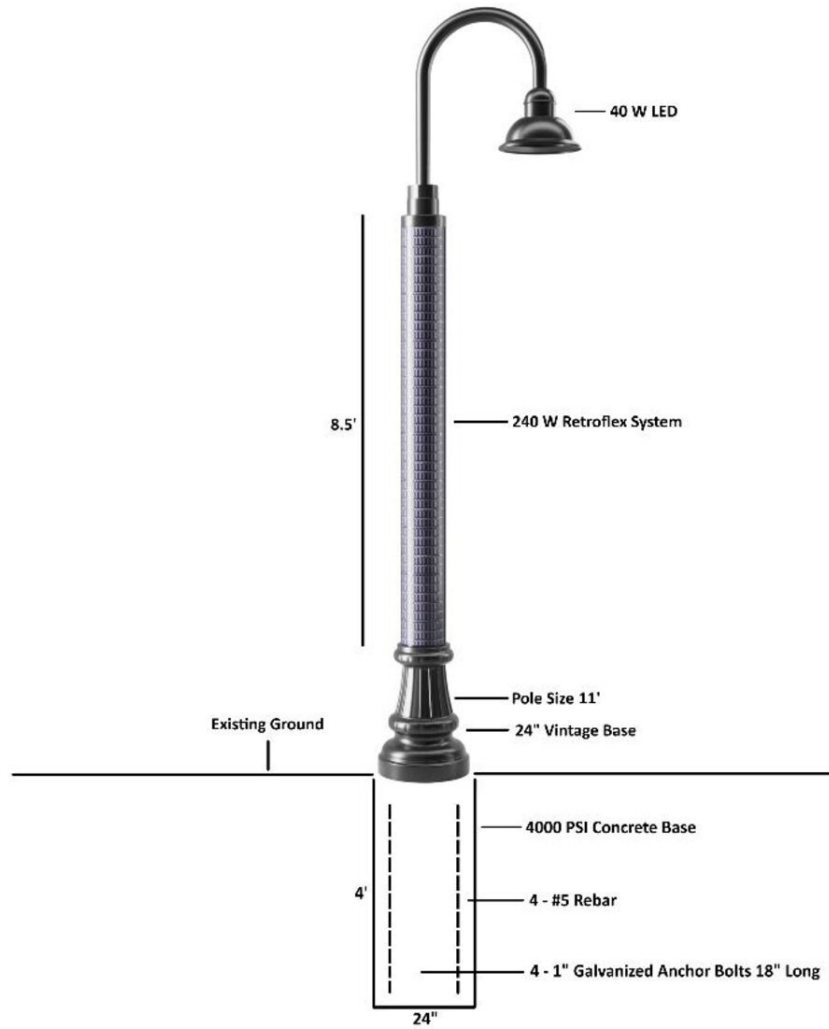
RS240 SINGLE HEAD ACORN GLOBE WITH CAGE AND HAT



SPECIFICATIONS RS2402460

SOLAR ARRAY	240W (8'.6" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W
BATTERY	24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	7.55

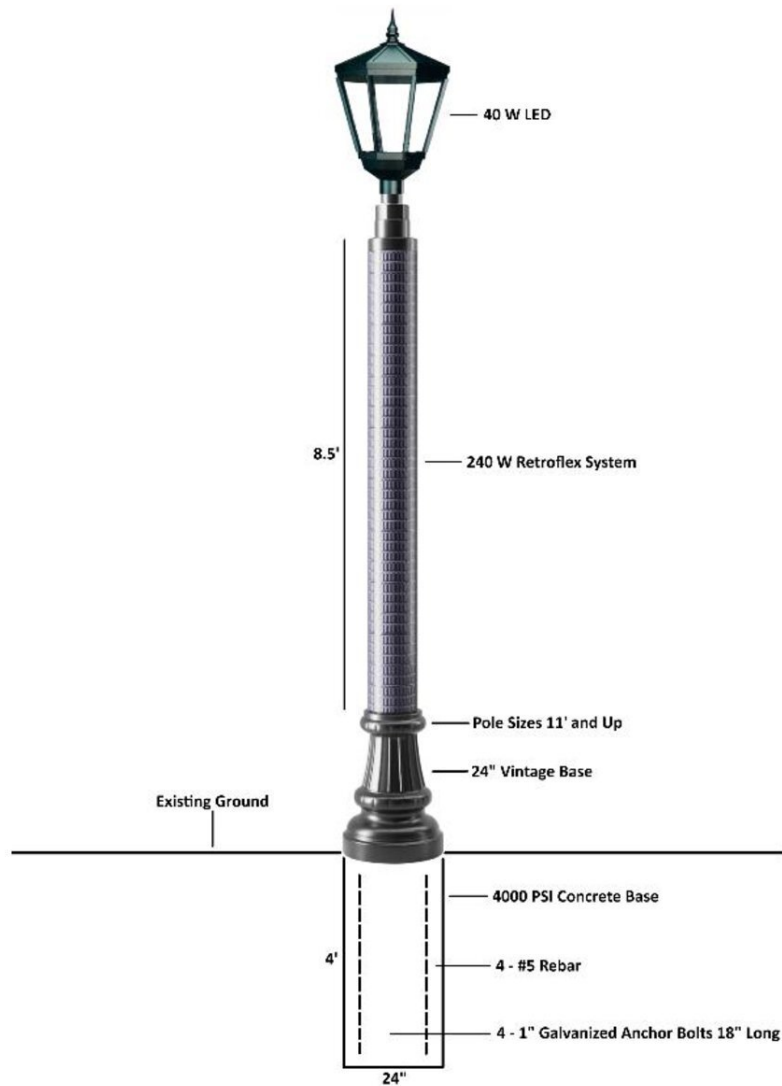
RS240 SINGLE HEAD HOOK ARM



SPECIFICATIONS RS2402460

SOLAR ARRAY	240W (8'.6" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W
BATTERY	24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	7.55

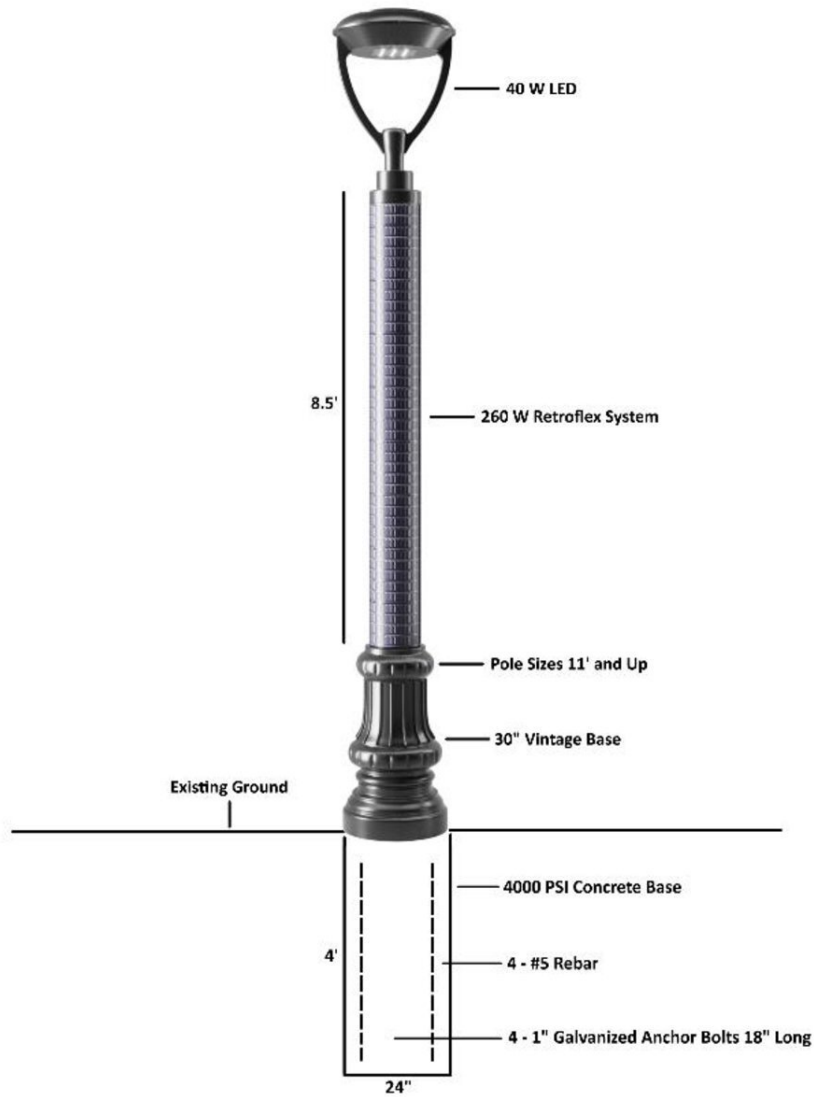
RS240 SINGLE LANTERN HEAD



SPECIFICATIONS RS2402460

SOLAR ARRAY	240W (8'.6" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W
BATTERY	24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	7.55

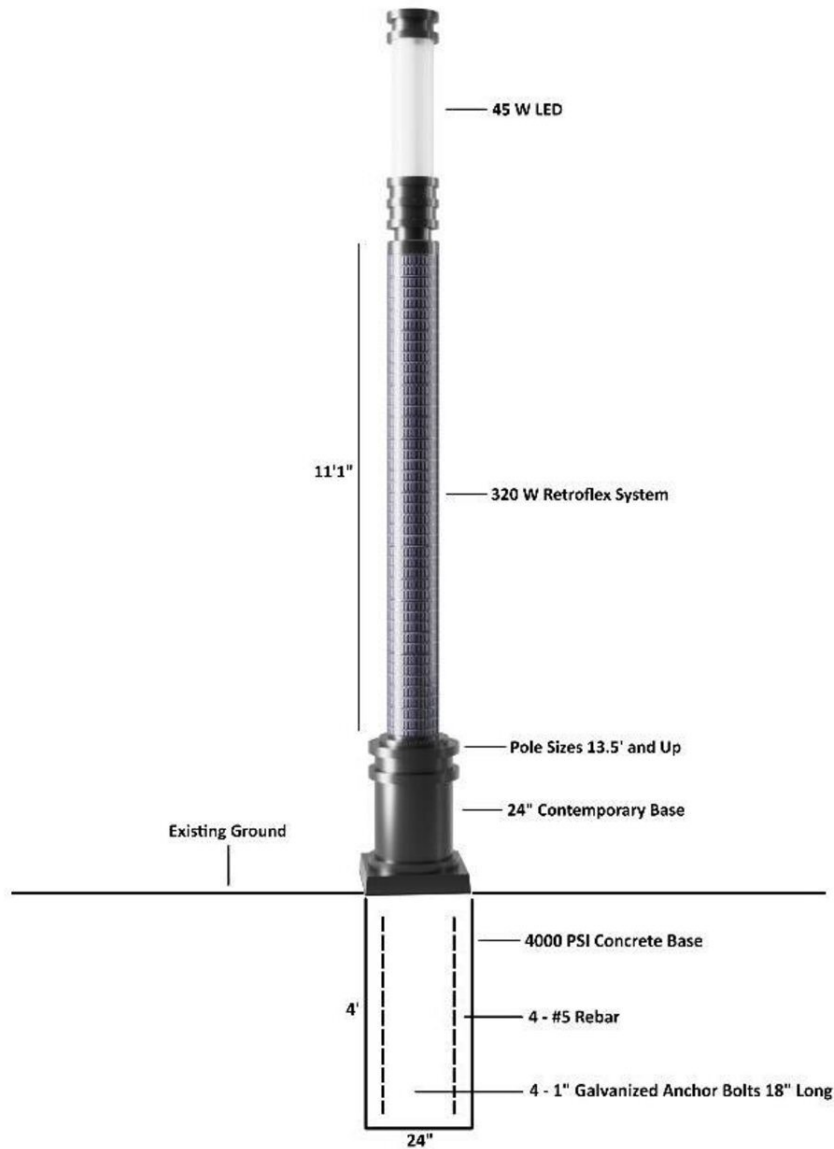
RS260 SINGLE BILBOA HEAD



SPECIFICATIONS RS2602460	
---------------------------------	--

SOLAR ARRAY	260W (8'.6" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W
BATTERY	24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	7.55

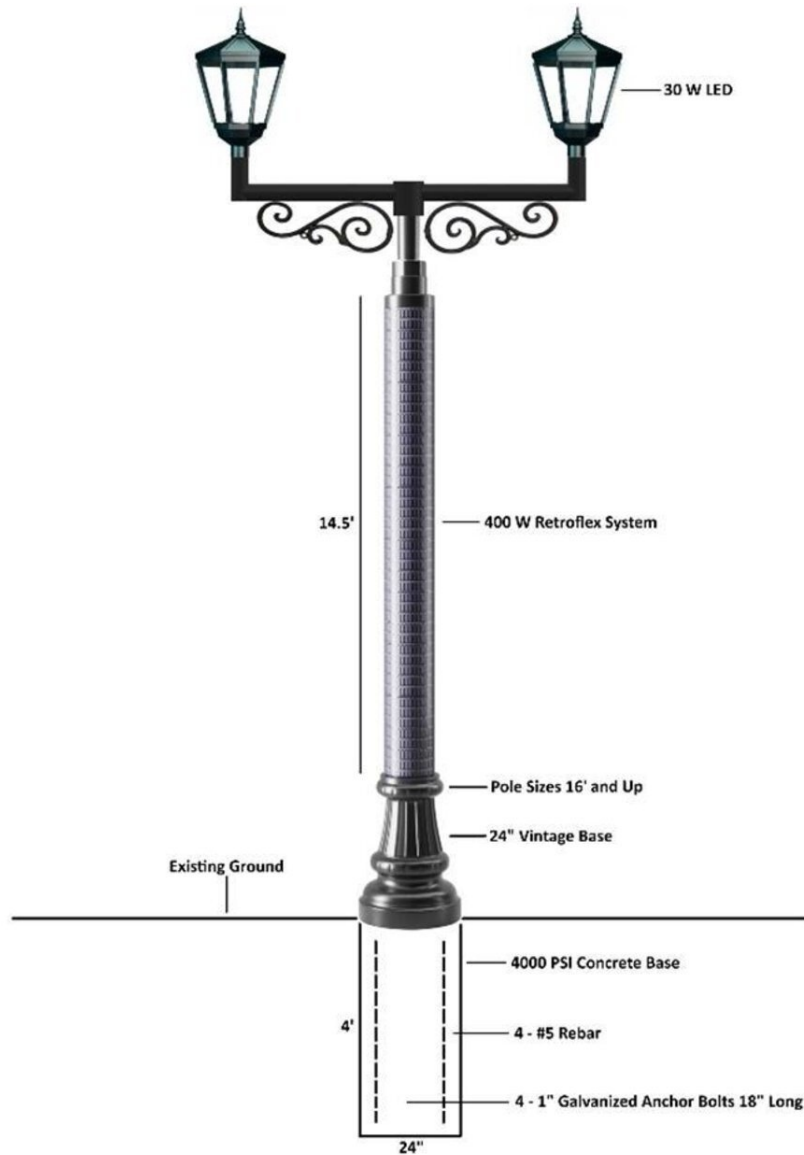
RS320 SINGLE LIGHT COLUMN HEAD



SPECIFICATIONS RS3202475

SOLAR ARRAY	320W (11'.1" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	45W
BATTERY	24V - 75A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	9.84

RS400 DOUBLE LANTERN HEAD

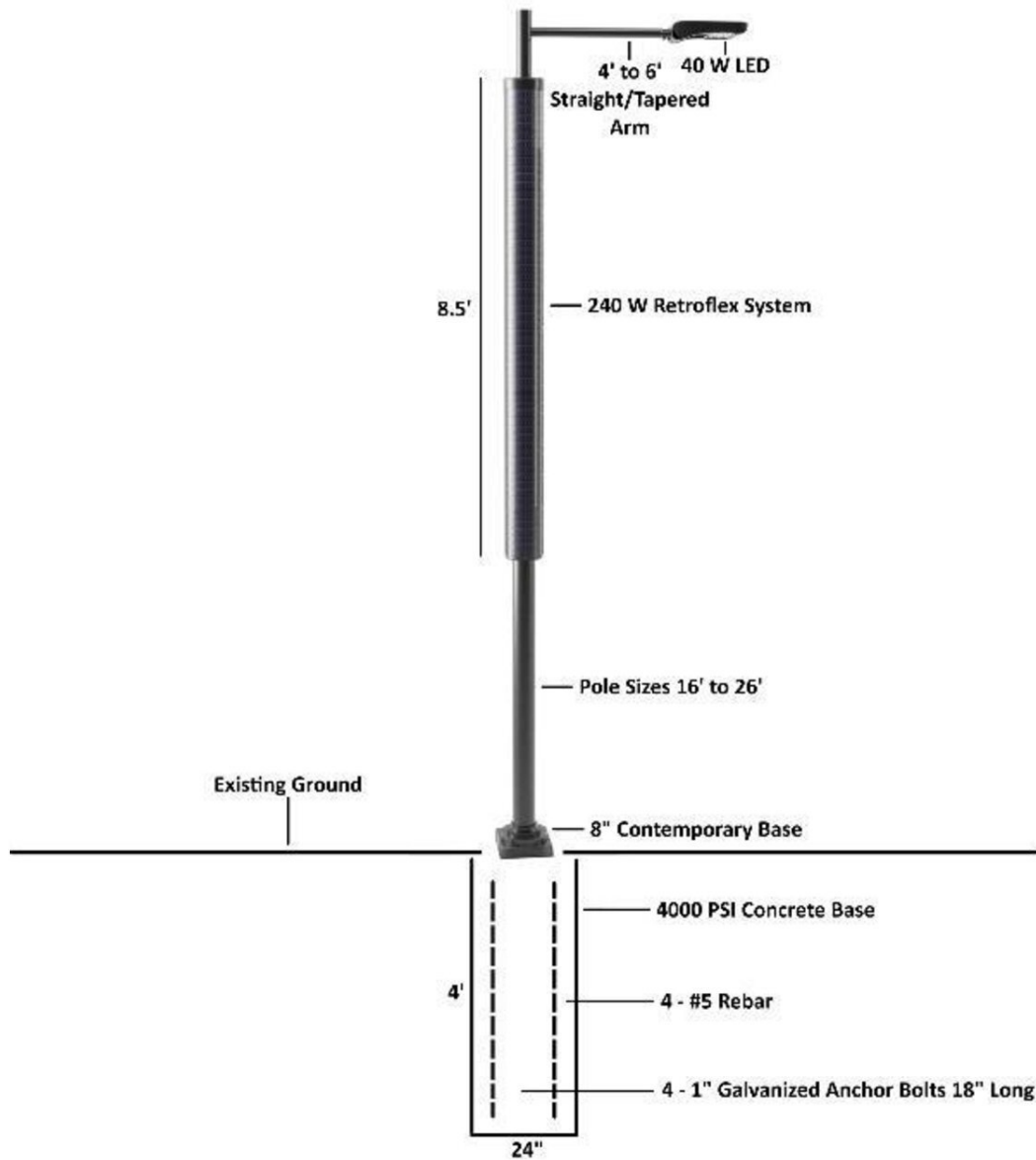


SPECIFICATIONS RS4002475

SOLAR ARRAY	400W (14'.5" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	(2) 30W LED MODULES @ 162 LUMENS PER WATT, DIMMABLE
BATTERY	24V - 75A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	12.8

**RW 240 / 260 / 320 / 400
540 / 620 / 700 /
DOUBLES 480 / 520 / 780
MODELS**

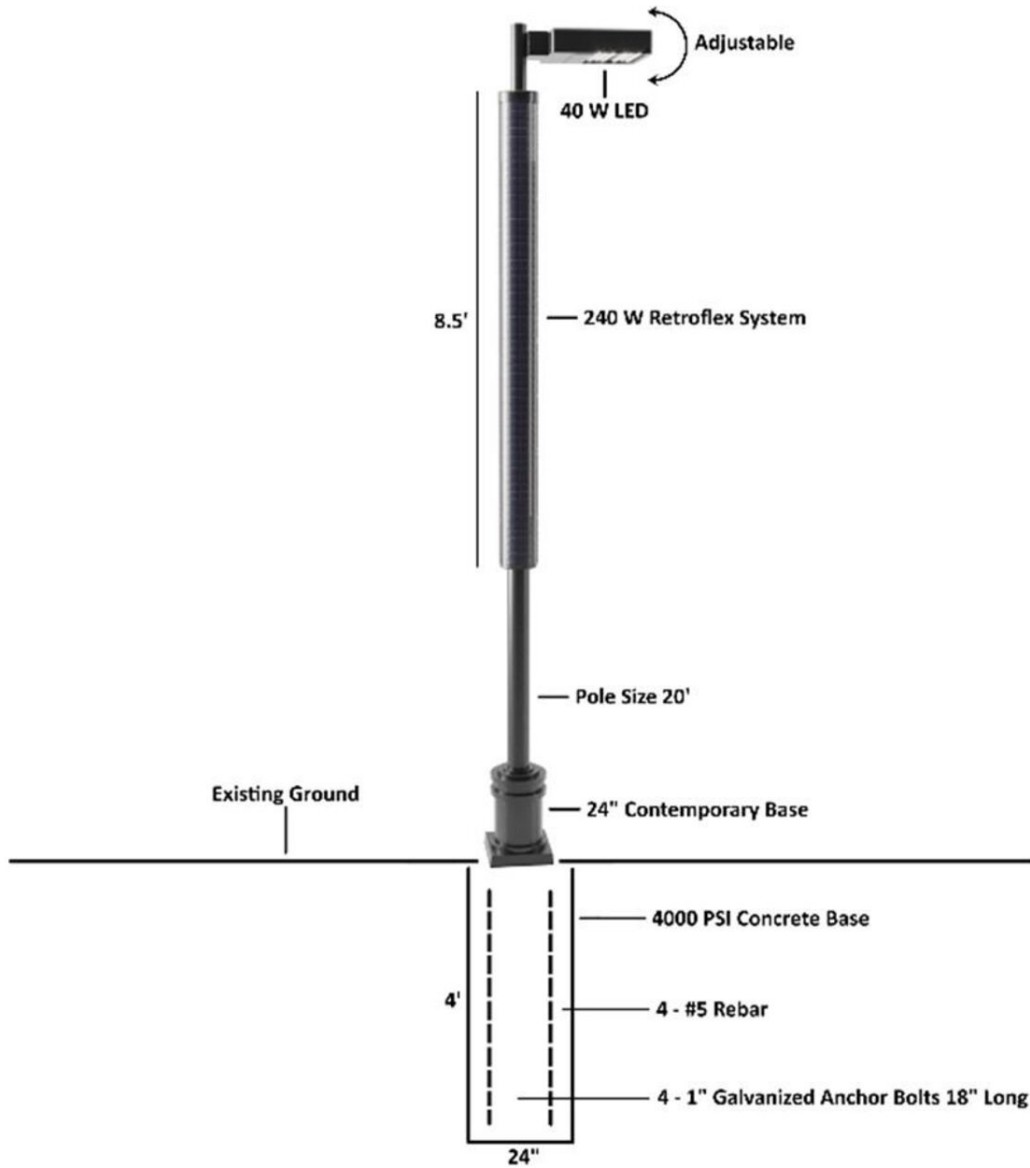
RW240 SINGLE GOBO A LUMINAIRE



SPECIFICATIONS RW2402460

SOLAR ARRAY	240W (8'.6" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W
BATTERY	24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	7.55

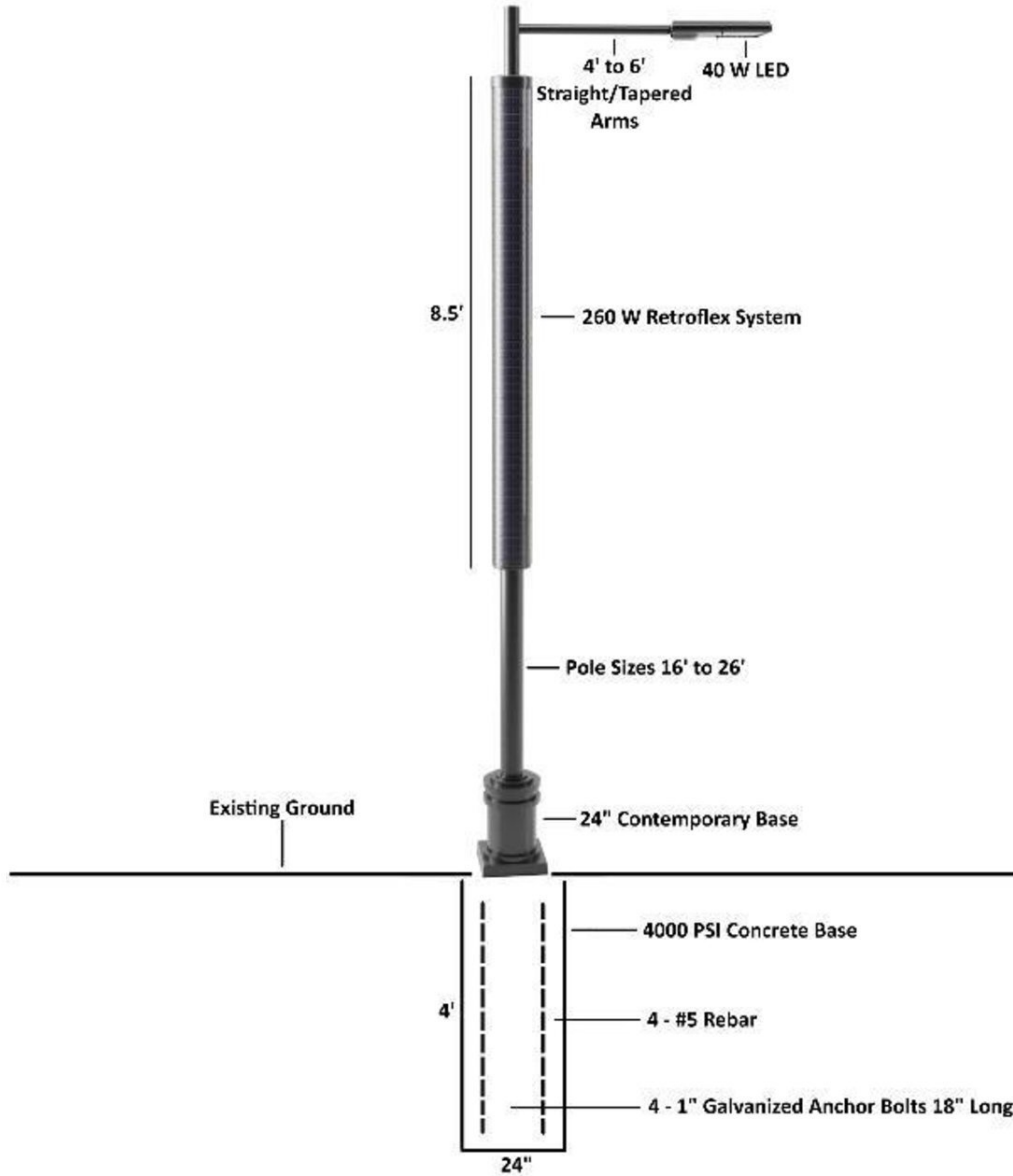
RW240 SINGLE GAMA L LUMINAIRE



SPECIFICATIONS RW2402460

SOLAR ARRAY	240W (8'.6" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W
BATTERY	24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	7.55

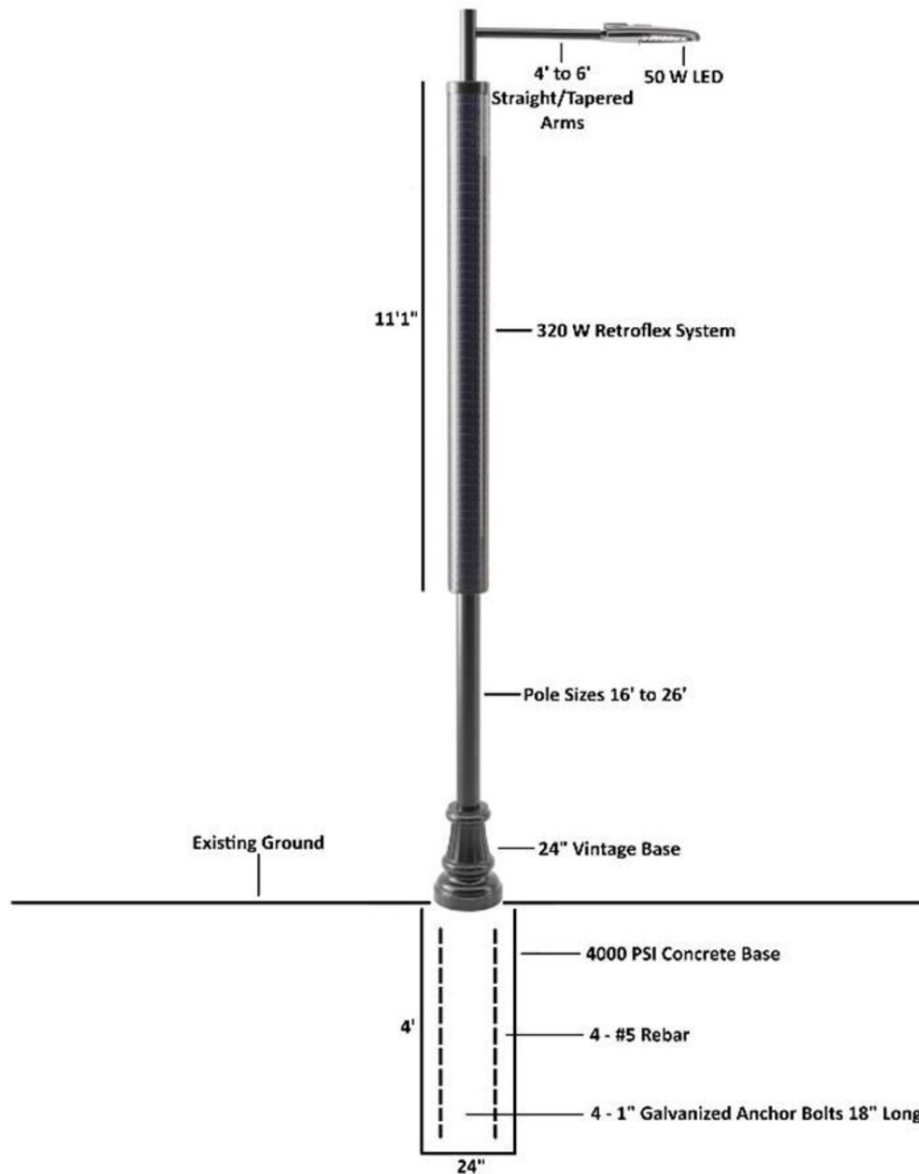
RW260 SINGLE GOBO T LUMINAIRE



SPECIFICATIONS RW2602460

SOLAR ARRAY	260W (8'.6" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W
BATTERY	24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	7.55

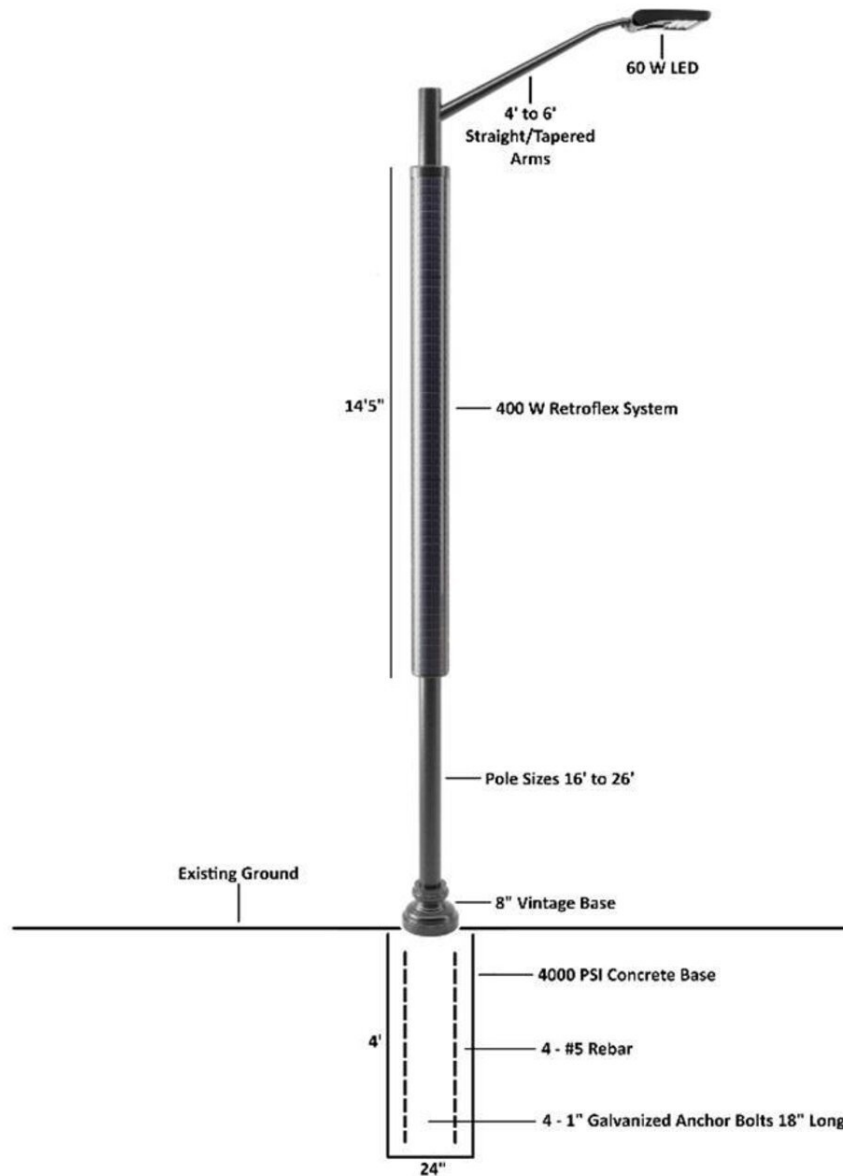
RW320 SINGLE GOBO L LUMINAIRE



SPECIFICATIONS RW3202475

SOLAR ARRAY	320W (11'.1" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	50W
BATTERY	24V - 75A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	9.84

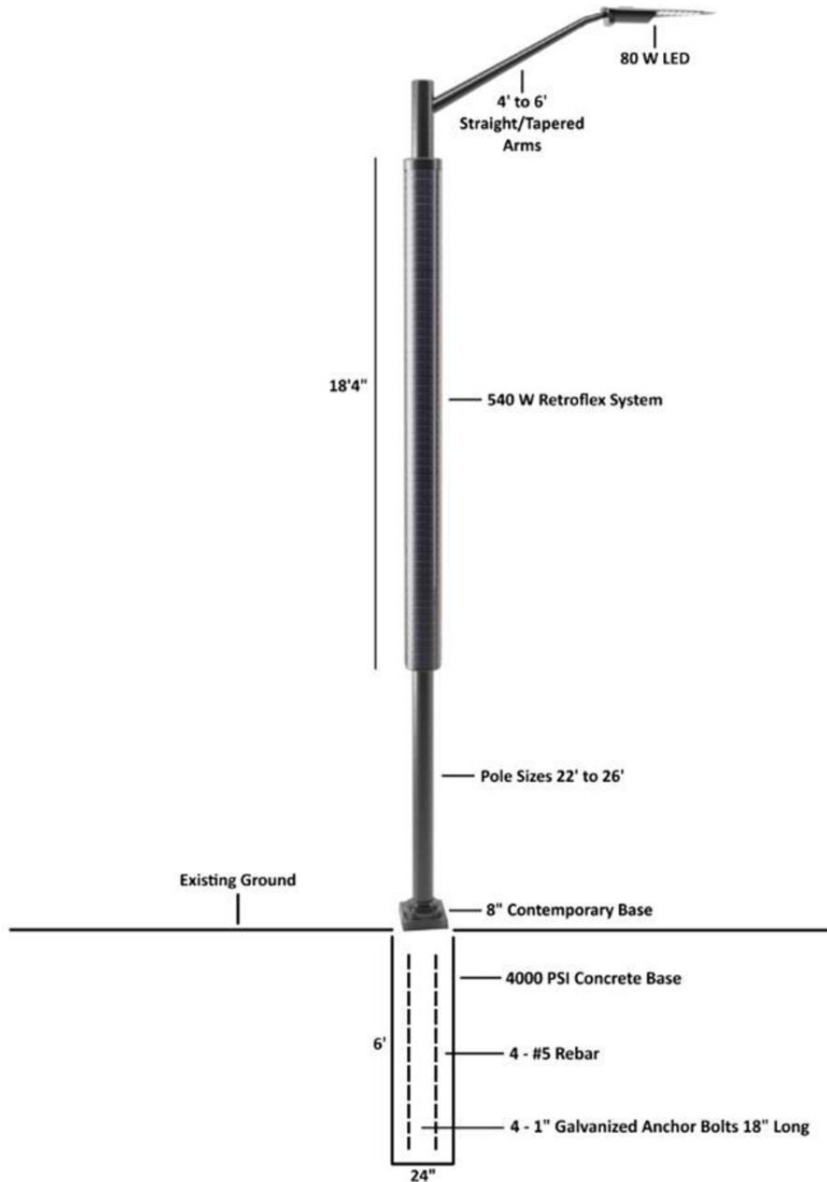
RW400 SINGLE GOBO A LUMINAIRE



SPECIFICATIONS RW4002475

SOLAR ARRAY	400W (14'.5" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	60W
BATTERY	24V - 75A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	12.8

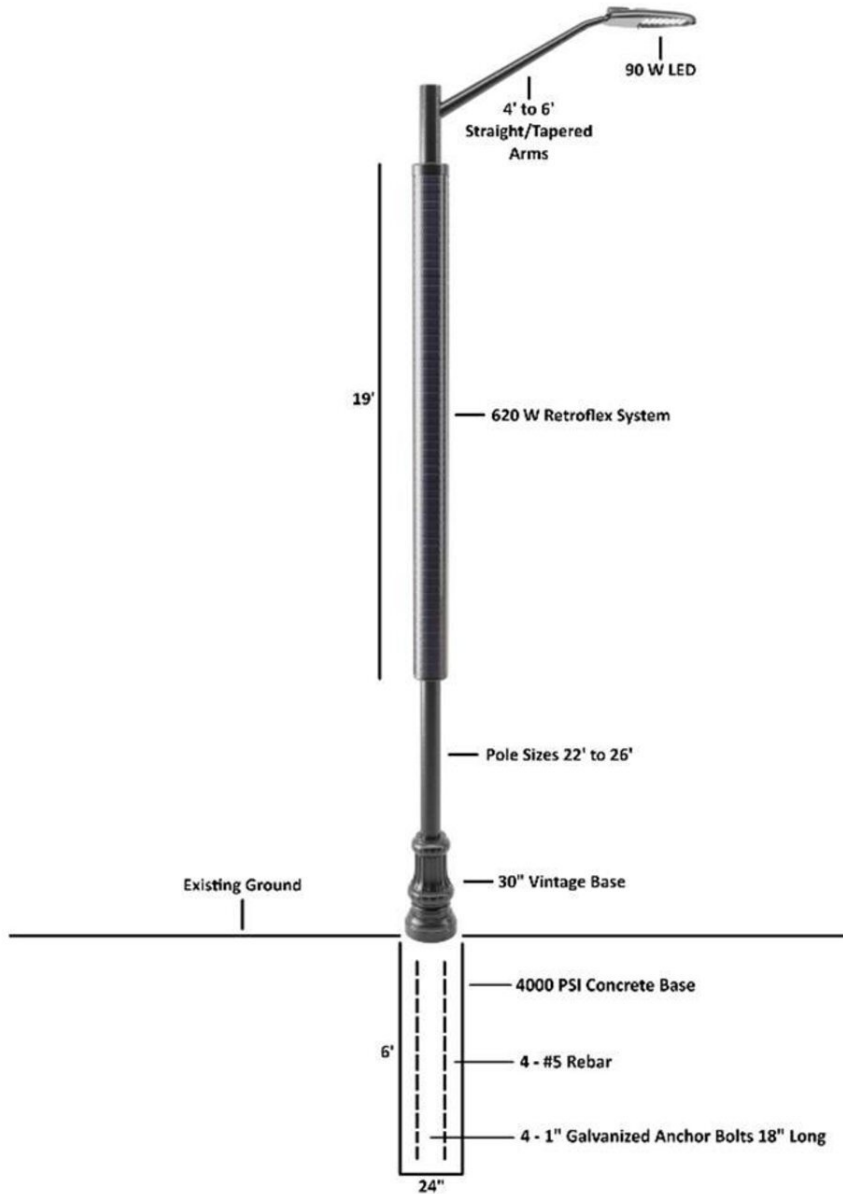
RW540 SINGLE GOBO F LUMINAIRE



SPECIFICATIONS RW5402490

SOLAR ARRAY	540W (18'.4" IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	80W
BATTERY	24V - 90A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	16.28

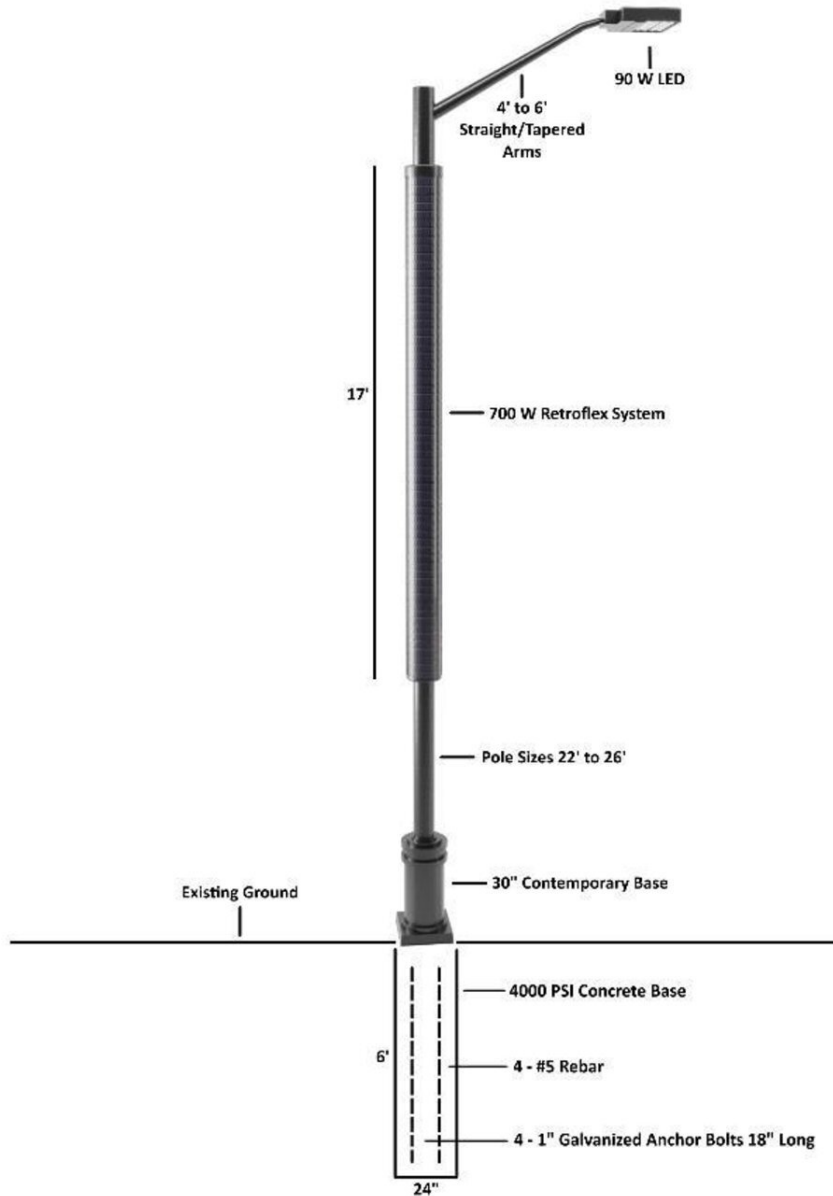
RW620 SINGLE GOBO L LUMINAIRE



SPECIFICATIONS RW6202490

SOLAR ARRAY	620W (19' IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	90W
BATTERY	24V - 90A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	16.872

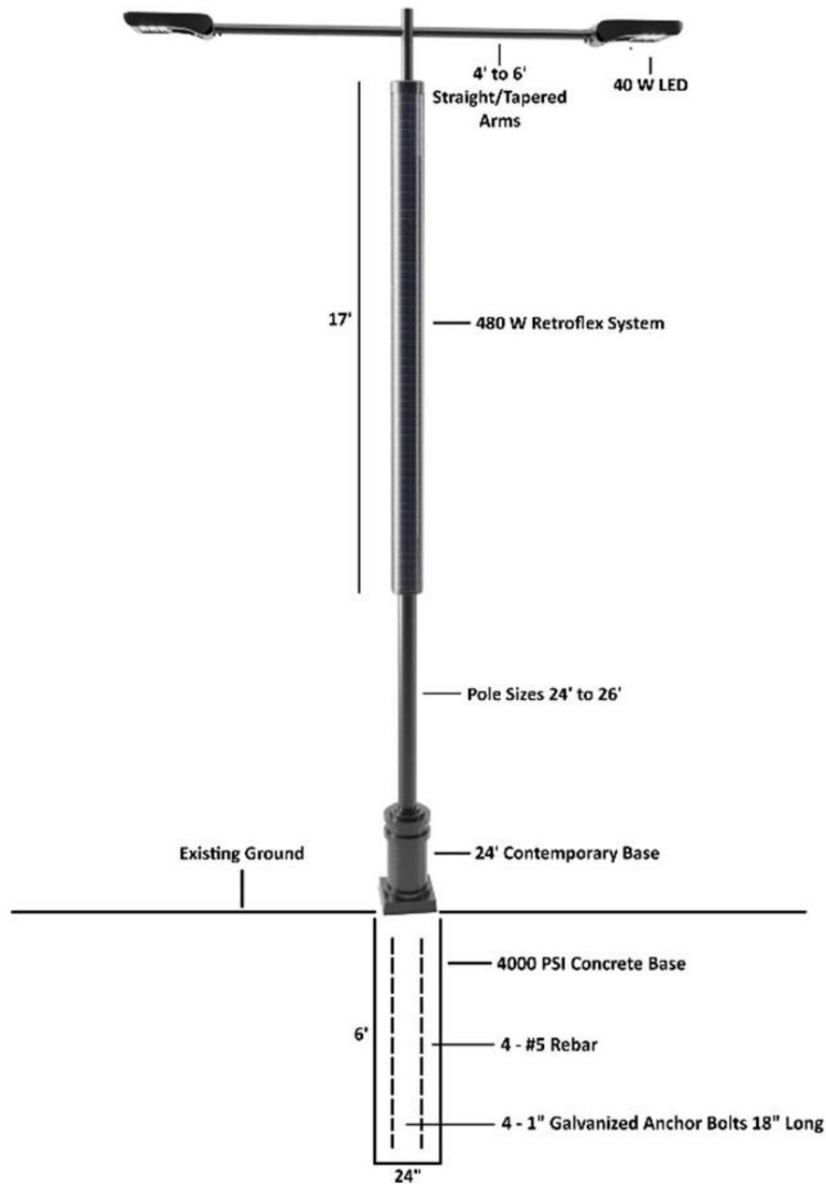
RW700 SINGLE GAMA T LUMINAIRE



SPECIFICATIONS RW7002490

SOLAR ARRAY	700W (17' IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	90W
BATTERY	24V - 90A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	17.425

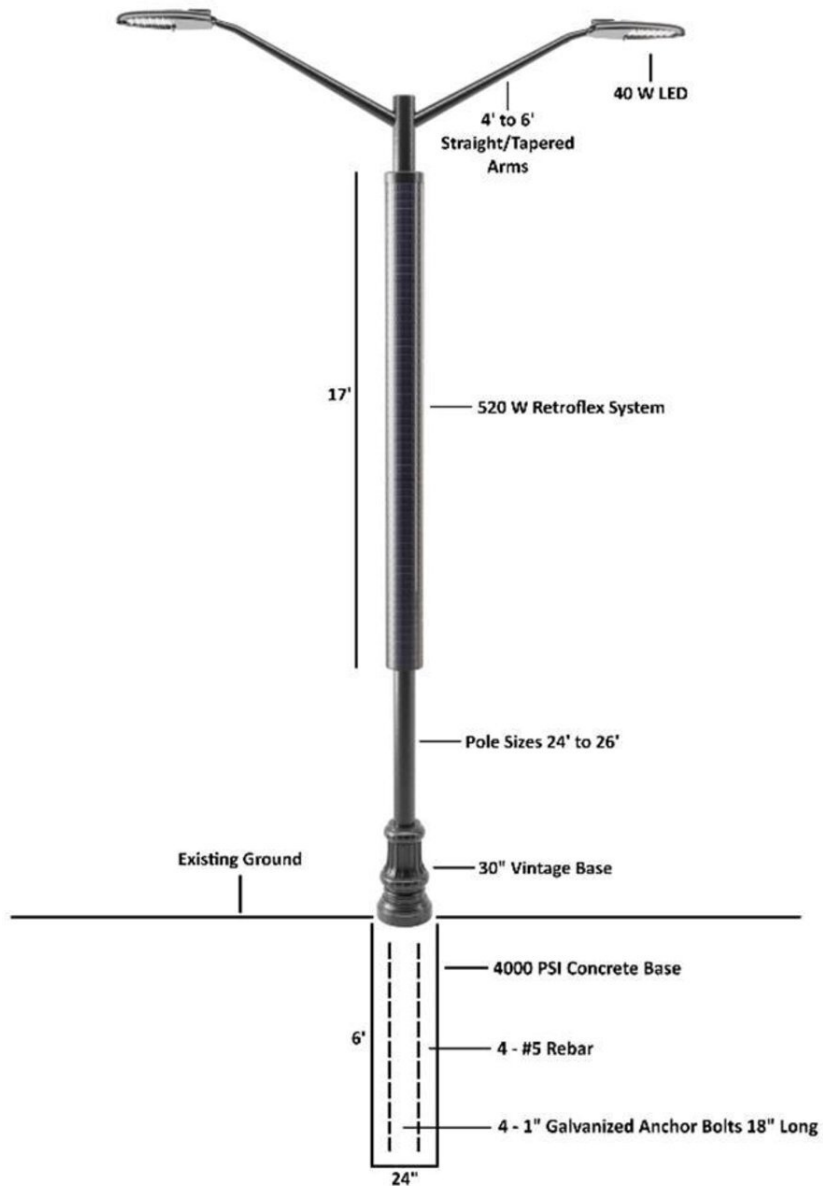
RW480 DOUBLE GOBO A LUMINAIRE



SPECIFICATIONS RW48024120

SOLAR ARRAY	480W (17' IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	(2) 40W
BATTERY	(2) 24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	15.096

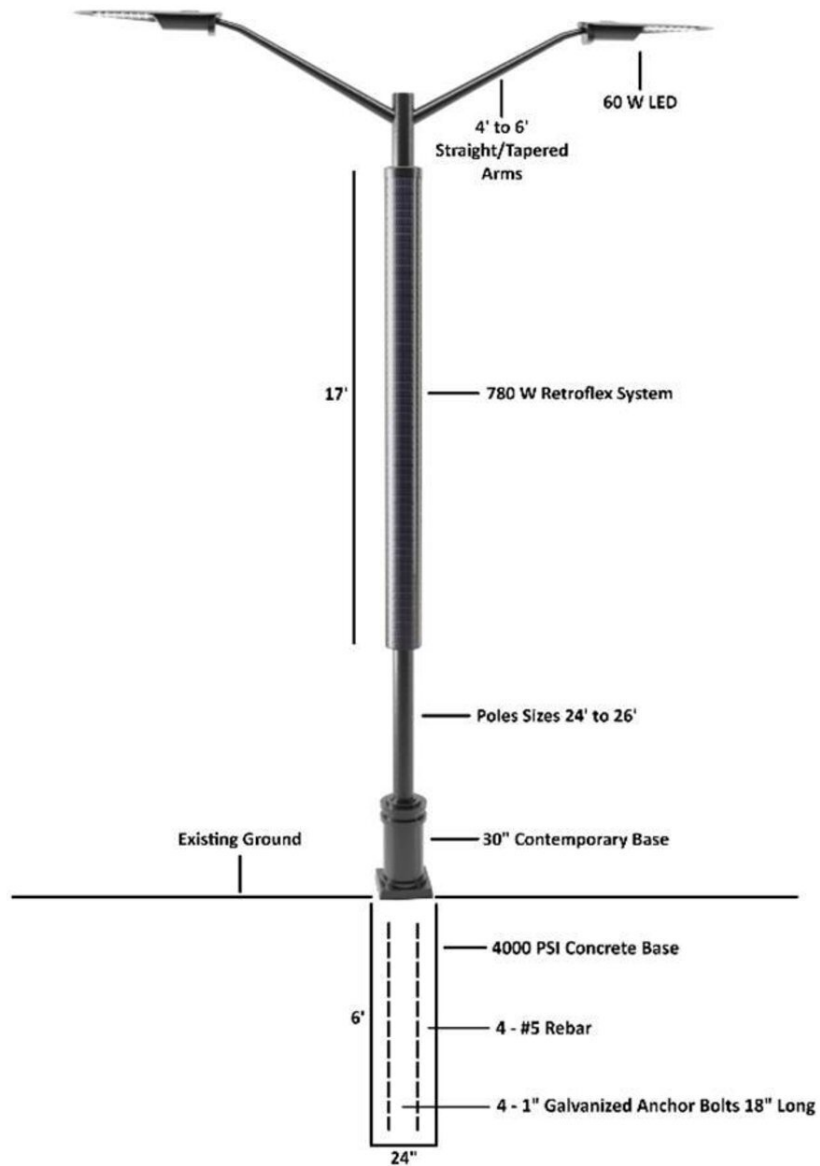
RW520 DOUBLE GOBO L LUMINAIRE



SPECIFICATIONS RW52024120

SOLAR ARRAY	520W (17' IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	(2) 40W
BATTERY	(2) 24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	16.28

RW780 DOUBLE GOBO F LUMINAIRE



SPECIFICATIONS RW78024150

SOLAR ARRAY	780W (17' IN LENGTH) WITH ADJUSTABLE ALUMINUM ARRAY
LIGHTING	(2) 60W
BATTERY	(2) 24V - 60A LITHIUM ION 1.8KWH (12+ YEARS LIFE EXPECTANCY)
CONTROLLER	ELECTRONIC MPPT CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH MONITORING
EPA (SQFT)	17.425

ROADWAY LUMINAIRES



GOBO L



GOBO F



GOBO T



GOBO A



GAMA T



GAMA L

RESIDENTIAL LUMINAIRES



ACORN WITH BASE



ACORN WITH CAP & BASE



ACORN WITH CAGE & BASE



ACORN WITH CAGE, BASE, TOP CAP



ASTURIAS



BILBOA



LIGHT COLUMN



HOOK ARM



LANTERN

RESIDENTIAL & COMMERCIAL BASES



11" BASE



24" VINTAGE BASE



30" VINTAGE BASE



24" CONTEMPORARY BASE



30" CONTEMPORARY BASE

GOBO A SPECIFICATION



The GOBO A series is an ideal solution for street lighting, available in multiple drive currents and optical distributions. Combining it with our optional motion sensor for even greater energy savings.



FEATURES & BENEFITS

- Die cast aluminum housing.
 - Modular design allows for easy installation, replacement and maintenance. This design also creates a chimney effect which provides exceptional thermal management.
 - Tool-less entry to driver compartment.
 - Meets 3G vibration per ANSI C136.31-2010.
 - Corrosion resistant polyester powder painted 100µm thickness.
 - Meets a 1000-hour salt spray certification per ASTM B117/ ISO 9227-2012.
 - Over 15 optical lenses are available for virtually any application.
 - Slipfitter with +/- 20 degree of adjustment for leveling.
 - Multiple smart lighting control options are available, e.g. photocell, motion sensor, DALI, 1-10V.
 - UL/ CUL/ DLC/ LM79/ SAA/ ENEC/ CB/ CE/ ErP/ RoHS/ PSE/ Ikt08
- Not all products are qualified on the DLC OPL. To view our DLC qualified products please consult the DLC Qualified Product List at www.designlights.org

TECHNICAL PARAMETERS

Power	30-320W
Input	120-277VAC or 220-240VAC or 347-480VAC or 12-24VDC
PF	>0.95
THD	<20%
L70/L90	>200,000H/ >60,000H
Operating Temperature	-40°C - +50°C
Efficacy	120-160lm/W
ANSI CCT	3000K/4000K/5000K/5700K
Min CRI	70* or 80 or 90
IP Rating	IP67
SPD	10KA* or 20KA
DALI	Optional
1-10V	Optional
Photocell	Optional
Smart Control	Optional
Optic (IESNA)	Type I, Type II, Type III, Type IV, Type V
Color Options	Grey/Black/Bronze/White

* Standard

GOBO F SPECIFICATION



Employing a mix of traditional exterior design elements with modern power-saving technologies, the GOBO F series offers exceptional energy efficiency for faster ROI while providing an aesthetic appeal.

FEATURES & BENEFITS

- Single-cast aluminum housing enables passive heat dissipation along the entire length of the luminaire.
- Modular design allows for easy installation, replacement and maintenance.
- Corrosion resistant polyester powder painted 100µm thickness.
- Meets a 1000-hour salt spray certification per ASTM B117/ ISO 9227:2012.
- Class II isolation protection.
- 0 and +5 degree of tilting angle adjustment.
- Adjustable for 1 5/8-2 3/8" (42mm-60mm) O.D. tenon.
- Multiple smart lighting control options are available, e.g. photocell, 1-10V.
- UL/ CUL/ DLC/ LM79/ CB/ CE/ RoHS

Not all products are qualified on the DLC QPL. To view our DLC qualified products please consult the DLC Qualified Product List at www.designlights.org

TECHNICAL PARAMETERS

Power	20-120W
Input	120-277VAC or 220-240VAC or 12-24VDC
PF	>0.95
THD	<20%
L70/L90	>200,000H/>60,000H
Operating Temperature	-40°C ~ +50°C
Efficacy	120-160lm/W
ANSI CCT	3000K/4000K/5000K/5700K
Min CRI	70* or 80 or 90
IP Rating	IP65
SPD	10KA* or 20KA
DALI	/
1-10V	Optional
Photocell	Optional
Smart Control	Optional
Optic (IESNA)	Type II, Type III, Type IV, Type V
Color Options	Grey

* Standard



SLG



SLE

GOBO L SPECIFICATION



GOBO L is designed for durability and ease of installation, the sleek external design prevents build up of dust or potentially damaging airborne material on the lighting

FEATURES & BENEFITS

- Compact & sleek design.
 - Tool-less entry to driver compartment.
 - Meets 3G vibration per ANSI C136.31-2010.
 - Corrosion resistant polyester powder painted 100µm thickness.
 - Meets a 1000-hour salt spray certification per ASTM B117/ ISO 9227:2012.
 - Adjustable for 1 5/8-2 3/8"(42mm-60mm) O.D. tenon.
 - Multiple smart lighting control options are available, e.g. photocell, motion sensor, DALI, 1-10V.
 - UL/ CUL/ DLC/ LM79 / CB/ CE/ ENEC/ RoHS/ IK08
- Not all products are qualified on the DLC QPL. To view our DLC qualified products please consult the DLC Qualified Product List at www.designlights.org

TECHNICAL PARAMETERS

Power	20-100W
Input	120-277VAC or 220-240VAC or 12-24VDC
PF	>0.95
THD	<20%
L70/L90	>200,000H/>60,000H
Operating Temperature	-40°C ~ +50°C
Efficacy	120-160lm/W
ANSI CCT	3000K/4000K/5000K/5700K
Min CRI	70* or 80 or 90
IP Rating	IP67
SPD	10KA* or 20KA
DALI	Optional
1-10V	Optional
Photocell	Optional
Smart Control	Optional
Optic (IESNA)	Type II, Type III, Type IV, Type V
Color Options	Grey/Black/Bronze/White

* Standard



GOBO T SPECIFICATION



The GOBO T Series luminaire is designed with industry-leading LED technology in accordance to DOT standards. It provides unmatched illumination performance and significant energy savings.

FEATURES & BENEFITS

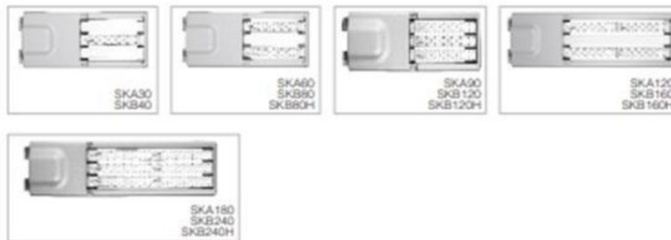
- Die cast aluminum housing.
- Modular design allows for easy installation, replacement and maintenance. This design also creates a chimney effect which provides exceptional thermal management.
- Tool-less entry to driver compartment.
- Meets 3G vibration per ANSI C136.31-2010.
- Corrosion resistant polyester powder painted 100µm thickness.
- Meets a 1000-hour salt spray certification per ASTM B117/ ISO 9227:2012.
- Over 15 optical lenses are available for virtually any application.
- 0, +/-2.5, +/-5 degree of tilting angle adjustment.
- Multiple smart lighting control options are available, e.g. photocell, motion sensor, DALI, 1-10V.
- UL/ CUL/ DLC/ LM79 / CB/ CE/ RoHS/ IK08

Not all products are qualified on the DLC QPL. To view our DLC qualified products please consult the DLC Qualified Product List at www.designlights.org

TECHNICAL PARAMETERS

Power	30-240W
Input	120-277VAC or 220-240VAC or 347-480VAC or 12-24VDC
PF	>0.95
THD	<20%
L70/L90	>200,000H/>60,000H
Operating Temperature	-40°C - +50°C
Efficacy	120-160lm/W
ANSI CCT	3000K/4000K/5000K/5700K
Min CRI	70* or 80 or 90
IP Rating	IP67
SPD	10KA* or 20KA
DALI	Optional
1-10V	Optional
Photocell	Optional
Smart Control	Optional
Optic (IESNA)	Type II, Type III, Type IV, Type V
Color Options	Grey/Black/Bronze/White

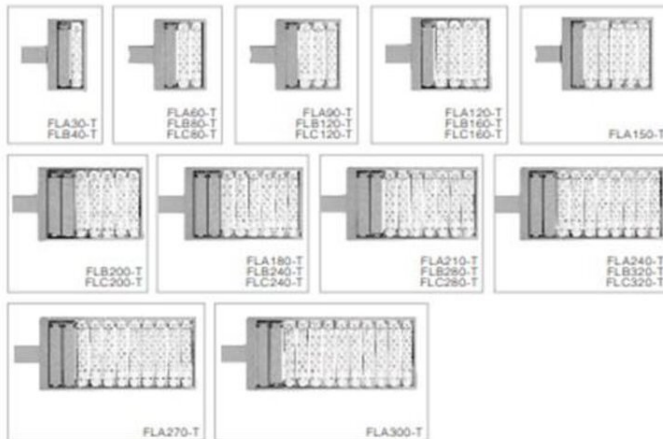
* Standard



GAMA T SPECIFICATION



GAMA T is highly suitable for car parks and shop fronts where direct lighting is required. A simple yet functional modular design, combined with the right lens type will improve lighting proficiency.



FEATURES & BENEFITS

- Shoe box appearance with advanced LED system.
- Modular design allows for easy installation, replacement and maintenance.
- Corrosion resistant polyester powder painted 100µm thickness.
- Meets a 1000-hour salt spray certification per ASTM B 117/ ISO 9227:2012.
- Interchangeable with the other GAMA Series with a bracket change.
- Multiple lighting control options are available, e.g. DALI, 1-10V.
- UL/ CUL/ DLC/ LM79/ SAA/ ENEC / CB/ CE/ ErP/ RoHS/ IK08

Not all products are qualified on the DLC QPL. To view our DLC qualified products please consult the DLC Qualified Product List at www.designlights.org

TECHNICAL PARAMETERS

Power	30-320W
Input	120-277VAC or 220-240VAC or 347-480VAC
PF	> 0.95
THD	< 20%
L70/L90	> 200,000H/ > 60,000H
Operating Temperature	-40°C -- + 50°C
Efficacy	120-160lm/W
ANSI CCT	3000K/4000K/5000K/5700K
Min CRI	70* or 80 or 90
IP Rating	IP67
SPD	Optional
DALI	Optional
1-10V	Optional
Photocell	Optional
Smart Control	Optional
Optic (IESNA)	Type I, Type II, Type III, Type IV, Type V
Color Options	Black/Grey/Bronze/White

* Standard

GAMA L SPECIFICATION



The GAMA L series offers exacting illumination performance featuring advanced LED optical design and multiple light distribution options.



FEATURES & BENEFITS

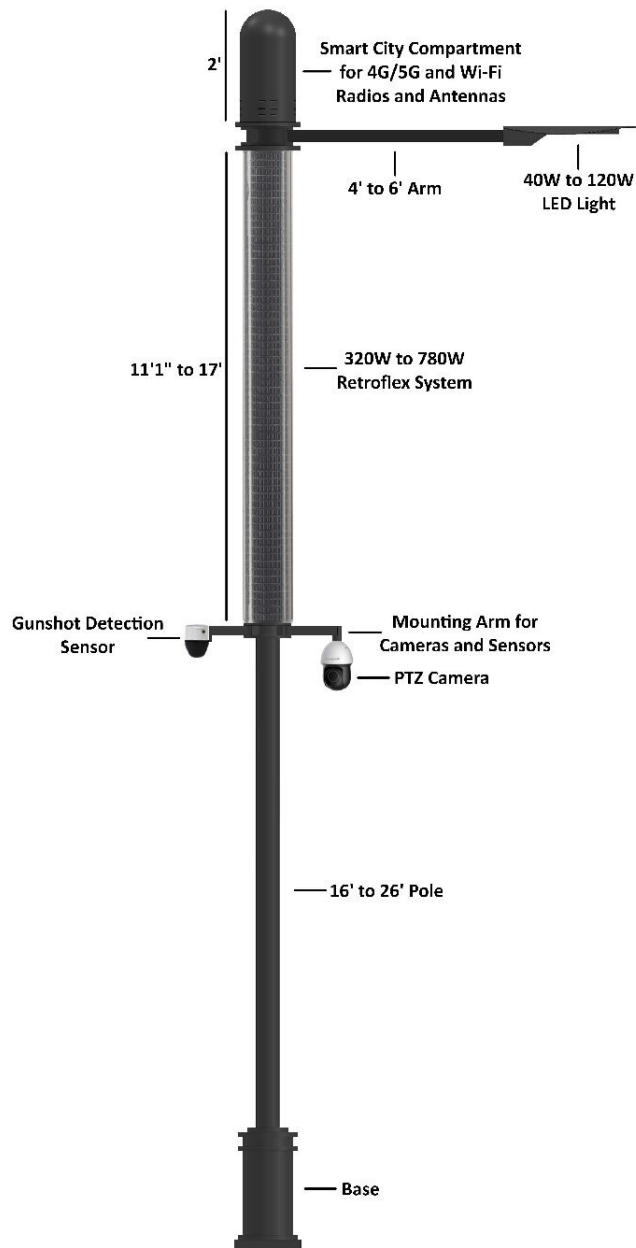
- Modular design allows for easy installation, replacement and maintenance. This design also creates a chimney effect which provides exceptional thermal management.
 - Corrosion resistant polyester powder painted 100µm thickness.
 - Meets a 1000-hour salt spray certification per ASTM B117/ISO 9227:2012.
 - Over 15 optical lenses are available for virtually any application.
 - Slipfilter with +/- 90 degree of adjustment for leveling.
 - Interchangeable with the other GAMA Series with a bracket change.
 - Multiple lighting control options are available, e.g. DALI, 1-10V.
 - UL/ CUL/ DLC/ LM79/ SAA/ ENEC/ CB/ CE/ ErP/ RoHS/ IK08
- Not all products are qualified on the DLC QPL. To view our DLC qualified products please consult the DLC Qualified Product List at www.designlights.org

TECHNICAL PARAMETERS

Power	30-320W
Input	120-277VAC or 220-240VAC or 347-480VAC
PF	>0.95
THD	<20%
L70/L90	>200,000H/ >60,000H
Operating Temperature	-40°C ~ +50°C
Efficacy	120-160lm/W
ANSI CCT	3000K/4000K/5000K/5700K
Min CRI	70* or 80 or 90
IP Rating	IP67
SPD	Optional
DALI	Optional
1-10V	Optional
Photocell	Optional
Smart Control	Optional
Optic (IESNA)	Type I, Type II, Type III, Type IV, Type V
Color Options	Grey/Black/Bronze/White

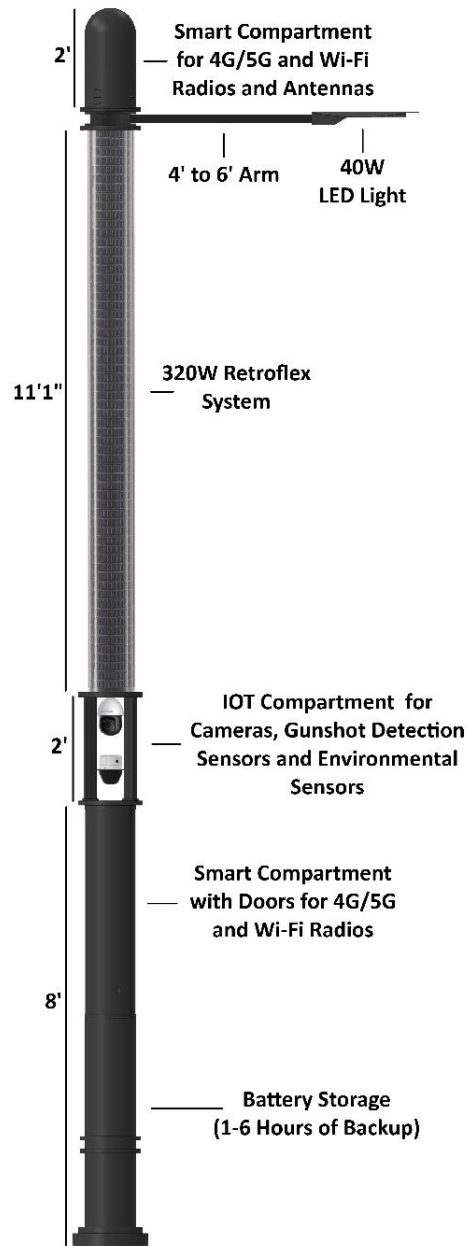
* Standard

SMART POLE (RWSMC)



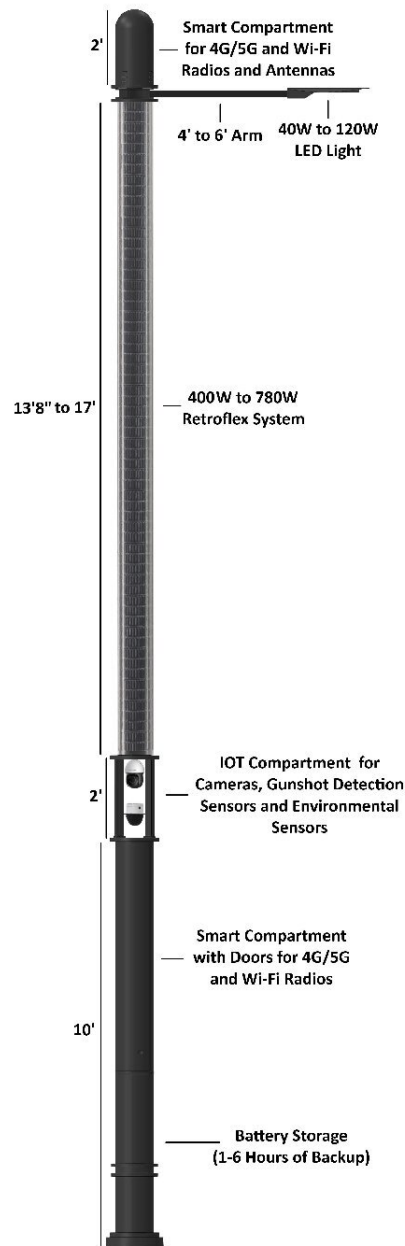
COMPONENT SPECIFICATIONS SMART POLE	
SOLAR ARRAY	320W - 780W(11'1" TO 17' IN LENGTH) ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W - 120W LED MODULE
BATTERY	24V - 60AH(x2) 2.88KWH TO 24V-90AH(x2) 4.32KWH LITHIUM ION
CONTROLLER	ELECTRONIC MPPT SOLAR CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH OR CLOUD MONITORING/CONTROL
EPA (SQFT)	11.84 TO 17.1

SMART POLE (RWS)



COMPONENT SPECIFICATIONS SMART POLE	
SOLAR ARRAY	320W (11'1" IN LENGTH) ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W LED MODULE
BATTERY	24V - 60AH(x2) 2.88KWH TO 24V-75AH(x2) 3.6KWH LITHIUM ION
CONTROLLER	ELECTRONIC MPPT SOLAR CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH OR CLOUD MONITORING/CONTROL
EPA (SQFT)	19.84

SMART POLE (RWSM)



COMPONENT SPECIFICATIONS SMART POLE	
SOLAR ARRAY	400W - 780W(13'8" TO 17' IN LENGTH) ADJUSTABLE ALUMINUM ARRAY
LIGHTING	40W - 120W LED MODULE
BATTERY	24V - 75AH(x2) 3.6KWH TO 24V-90AH(x2) 4.32KWH LITHIUMION
CONTROLLER	ELECTRONIC MPPT SOLAR CHARGE CONTROLLER / REGULATOR
LIGHTING CONTROLS	BLUETOOTH OR CLOUD MONITORING/CONTROL
EPA (SQFT)	24.13 TO 27.1

SMART POLE OPERATIONS AND ECONOMICS

- ADDITIONAL SPACE FOR MULTIPLE CARRIER 4G / 5G RADIOS
- SMART COMPARTMENT HOUSING FOR WIFI & 4G / 5G ANTENNAS
- VARIOUS CAMERA OPTIONS FOR PUBLIC SAFETY / SECURITY
- VARIOUS WIFI OPTIONS FOR 2.4GHZ AND 5GHZ NETWORKS
- GUNSHOT DETECTION SENSORS FOR THREAT DETECTION
- DIFFERENT TYPES OF ENVIRONMENTAL SENSORS FOR MONITORING AIR QUALITY, TEMPERATURE, HUMIDITY, PRESSURE, WATER LEVEL SENSOR, ETC.
- USB FAST CHARGER FOR CHARGING PHONES OR TABLETS
- EMERGENCY CALL 911 BUTTON FOR MEDICAL AND EMERGENCY SITUATIONS.
- MOTION SENSOR APPLICATION FOR POWER SAVING AND LONGER BATTERY BACKUP.
- CAMERAS WITH ARTIFICIAL INTELLIGENCE FOR FACIAL RECOGNITION, LICENSE PLATE RECOGNITION AND TRAFFIC MONITORING.
- PTZ CAMERA COMPATIBILITY WITH GUNSHOT DETECTION SENSOR FOR CAPTURING PHOTOS / VIDEOS OF A THREAT OR GUNMAN.
- ADDITIONAL BACKUP POWER AVAILABLE VIA AC POWER FOR REDUNDANCY.
- EASY ACCESS TO BATTERIES / RADIOS FOR QUICK AND EASY MAINTENANCE AND REPLACEMENT.

WIRELESS LIGHTING MONITORING AND CONTROLS

Standard Bluetooth Monitoring/Control Option (Included in Retroflex System)

ClearWorld's smart lighting monitoring and control can monitor and control multiple luminaire types. Our primary network control uses 2.4 GHz Bluetooth networking. You can monitor and control the extensive features of your lighting with built-in Bluetooth in the pole by going near the pole and pairing it with your smartphone or tablet via the VictronConnect app. These lighting controls have been used with different types of luminaries in the past.

ClearWorld's smart lighting controls are fully programmable and are capable of PWM and 0-10 V dimming as well as ON/OFF functionality. This is done by connecting to the pole using the VictronConnect app. For remote installations - even when there is no internet connection or phone signal nearby - you may be able to monitor and control your lighting by Bluetooth-pairing. The user can then schedule the lights to turn ON/OFF and dim according to their needs and the application. This system works without an Internet connection which is a plus.

ClearWorld's smart lighting monitoring and controls are fully wireless and are based on a 2.4 GHz Bluetooth networking.

ClearWorld's smart lighting monitoring and control system is a plug and play design and is a set it and forget it solution. The user does not have to worry about changing anything after installation. And it's also very easy to use.

ClearWorld's smart lighting solution has the ability of real time system monitoring. Real time statistics of battery voltage and current, solar panel voltage and current, load voltage and current, power produced by the solar panel as well as power consumed by the load can be displayed in a smartphone or a tablet via the app. The status of each light as well as other information can be viewed in the app.

ClearWorld's smart lighting solution allows the user to monitor system data such as energy production, energy consumption, voltage, current and light status wirelessly. This data can be monitored by the user in real time. The user can also view the history of the system data up to 30 days.

ClearWorld’s smart lighting system is secured via AES128, WEP, WPA and WPA2 encryption. Our system runs off solar power completely and is totally off-grid, so there are no power supply requirements.



CLEARWORLD PLATFORM – AS – A – SERVICE (PaaS) REMOTE MONITORING / CONTROL UPGRADE

ClearWorld's secondary network control uses either Ethernet or Cellular networking. You can remotely monitor and control the extensive features of your lighting via the Internet with your smartphone, tablet or PC via the ClearWorld PaaS.

The user can remotely monitor and control their lighting from a centralized location from anywhere in the world via the ClearWorld PaaS from their smartphone, tablet or PC. You will need an Internet connection and a network to the poles to realize remote monitoring and control of all the poles from anywhere in the world.

The customer has two options for network connectivity: Ethernet and Cellular.

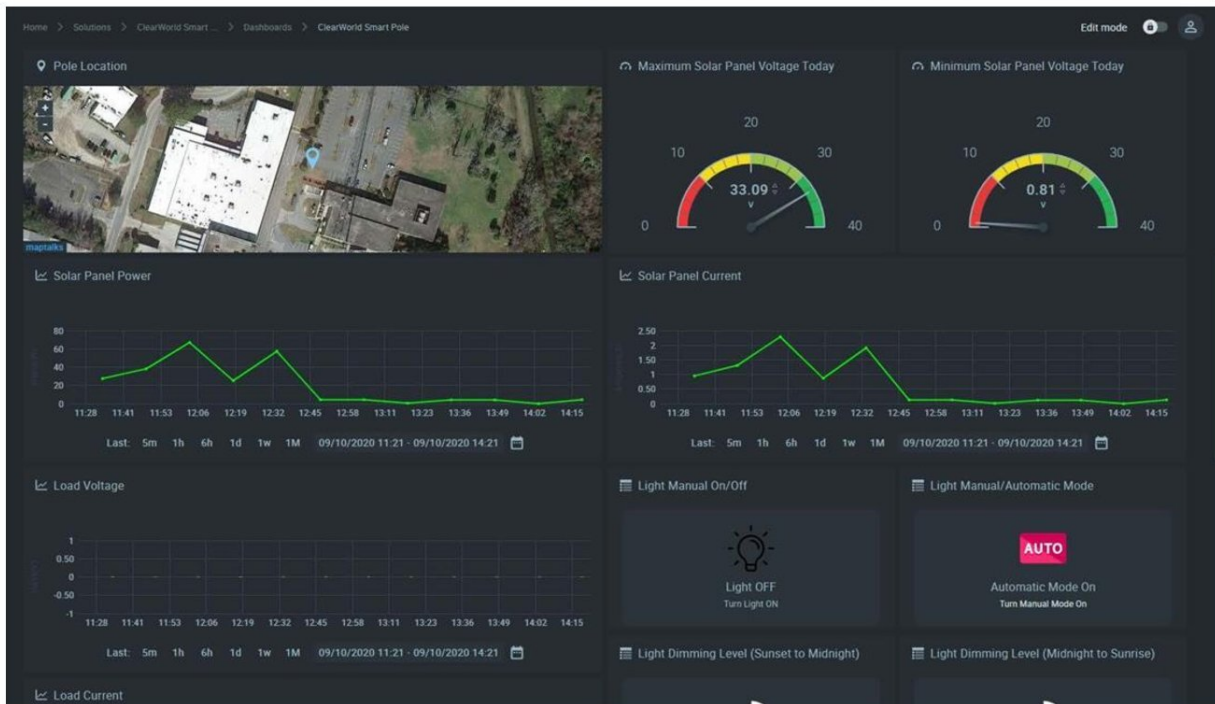
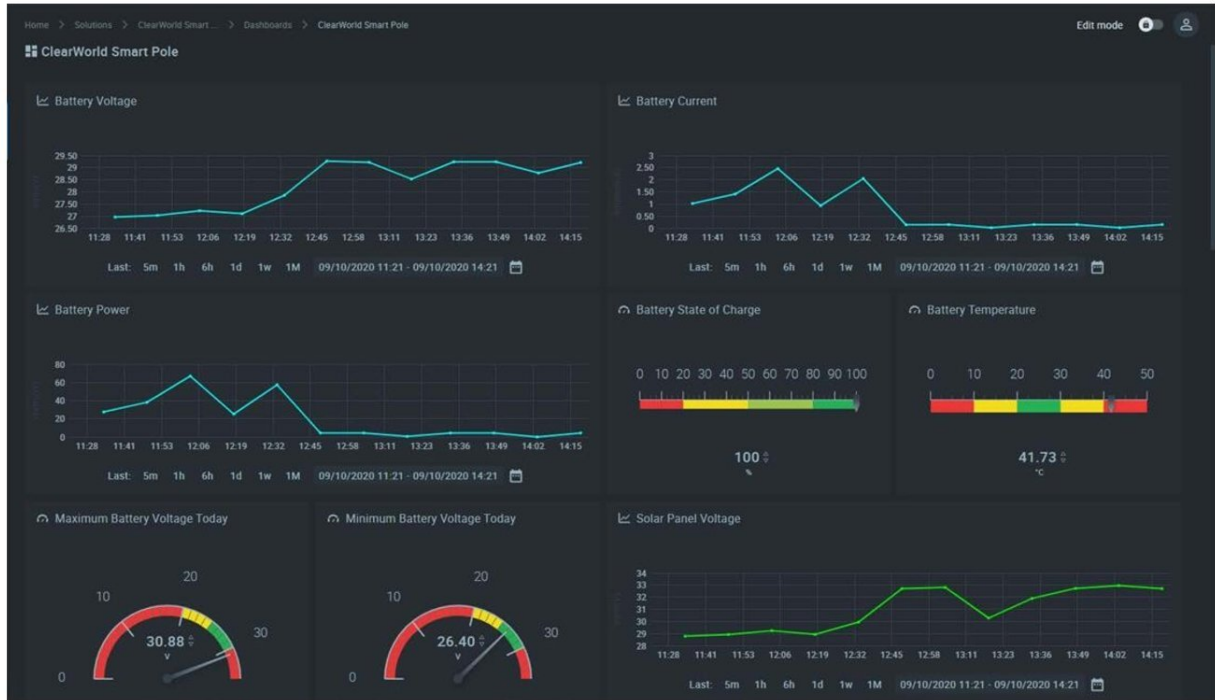
For Ethernet connectivity, the network can be either provided by the customer or ClearWorld (network is additional). The Internet connection has to be provided by the customer.

For Cellular connectivity, the network is provided by ClearWorld (network is additional). The data charges must be paid by the customer.

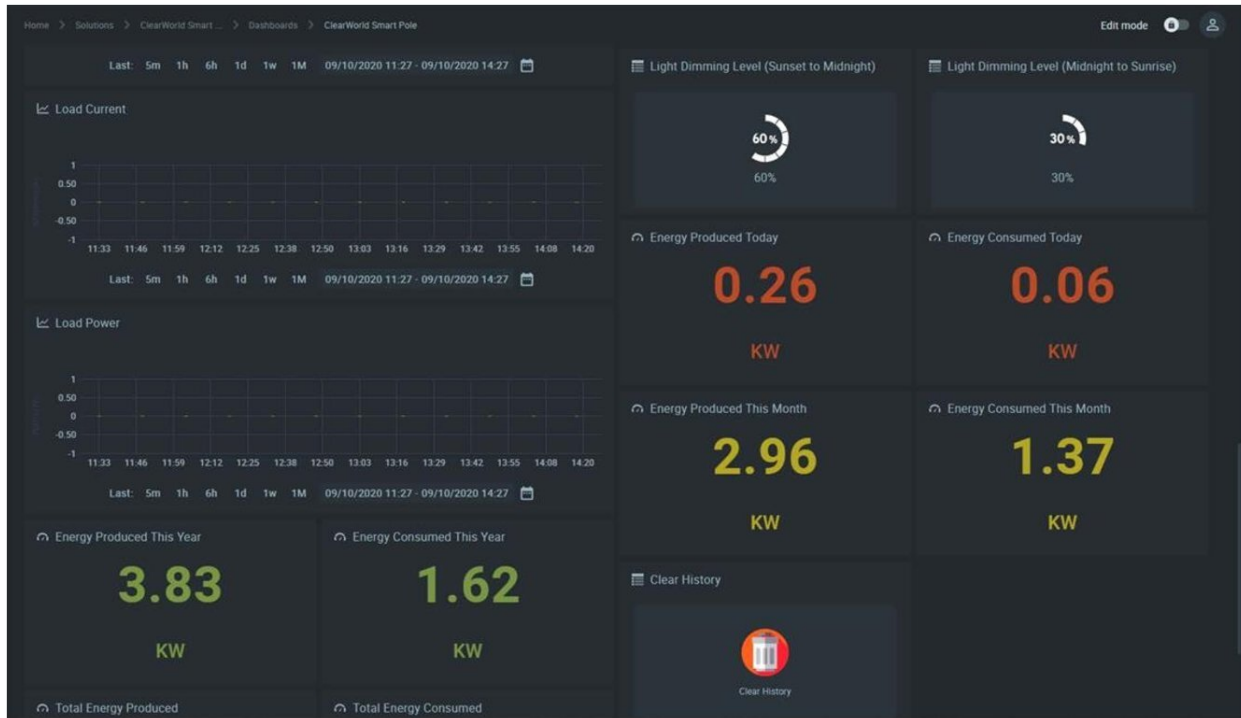
ClearWorld PaaS Remote Monitoring and Lighting Control has a dashboard to view near real time statistics of battery voltage and current, solar panel voltage and current, load voltage and current, power produced by the solar panel as well as power consumed by the load. The dashboard also allows to view the status of each light as well as other information.

ClearWorld PaaS Remote Monitoring and Lighting Controls are fully programmable and are capable of PWM and 0-10 V dimming as well as ON/OFF functionality. The user can schedule the lights to turn ON/OFF and dim according to their needs and the application remotely from anywhere in the world via the ClearWorld PaaS Dashboard.

CLEARWORLD DASHBOARD



CLEARWORLD DASHBOARD (CONT.)



CLEARWORLD PRICING



RETROFLEX (RESIDENTIAL MODELS)

SPECIFICATIONS	SINGLE RESIDENTIAL UNITS			DOUBLE HEAD
MODEL #	RS240	RS260	RS320	RS400
RETROFLEX (WATTS)	240	260	320	400
BATTERY CAPACITY (AMP HOURS)	60	60	75	75
BATTERY PACK (12 + yr life expectancy)	LITHIUM ION	LITHIUM ION	LITHIUM ION	LITHIUM ION
LED LIGHT(WATTS)	40	40	45	30 X 2
LUMENS PER WATT @ 162	6480	6480	7290	9720
DIMENSIONS (SOLAR ARRAY)	10.66" OD X 8'6"L	10.66" OD X 8'6"L	10.66" OD X 11'1"L	10.66" OD X 14'5"L
WEIGHT(LBS)	134	144	175	200
EPA (SQFT)	7.55	7.55	9.84	12.8
POLE SIZES	11" TO 14' (5" DIAMETER)		13'.5" AND UP	16' UP TO 26'
CAP ARMS	LANTERN	LANTERN	LANTERN	LANTERN
BASE	11",24"30"			11",24",30"
LIGHTING & CHARGE CONTROLLER	MPPT	MPPT	MPPT	MPPT

RETROFLEX (SINGLE HEAD ROADWAY)

SPECIFICATIONS	SINGLE HEAD ROADWAY UNITS			
MODEL #	RW240	RW260	RW320	RW400
RETROFLEX (WATTS)	240	260	320	400
BATTERY CAPACITY (AMP HOURS)	60	60	75	75
BATTERY PACK (12 + yr life expectancy)	LITHIUM ION	LITHIUM ION	LITHIUM ION	LITHIUM ION
LED LIGHT (WATTS)	40	40	50	60
LUMENS PER WATT @ 162	6480	6480	8100	9720
DIMENSIONS (SOLAR ARRAY)	10.66" OD X 8'6"L	10.66" OD X 8'6"L	10.66" OD X 11'1"L	10.66" OD X 14'5"L
WEIGHT (LBS)	134	134	175	200
EPA (SQFT)	7.55	7.55	9.84	12.8
POLE SIZES	STANDARD IS 16' UP TO 26' (5" DIAMETER)			
CAP ARMS	1 STRAIGHT/TAPERED ARMS (4' TO 6')			
BASE	11" INCLUDED (24",30" - UPGRADE)			
LIGHTING & CHARGE CONTROLLER	MPPT	MPPT	MPPT	MPPT

RETROFLEX (SINGLE HEAD ROADWAY)

SPECIFICATIONS	SINGLE HEAD ROADWAY UNITS		
MODEL #	RW540	RW620	RW700
RETROFLEX (WATTS)	540	620	700
BATTERY CAPACITY (AMP HOURS)	90	90	90
BATTERY PACK (12 + yr life expectancy)	LITHIUM ION	LITHIUM ION	LITHIUM ION
LED LIGHT (WATTS)	80	90	90
LUMENS PER WATT @ 162	12960	14580	14580
DIMENSIONS (SOLAR ARRAY)	10.66" OD X 18'4"L	10.66" OD X 19'L	12.3" OD X 17'L
WEIGHT (LBS)	268	334	230
EPA (SQFT)	16.28	16.872	17.425
POLE SIZES	22' TO 26' (5" DIAMETER)		
CAP ARMS	1 STRAIGHT/TAPERED ARMS (4' TO 6')		
BASE	11" INCLUDED (24",30" - UPGRADE)		
LIGHTING & CHARGE CONTROLLER	MPPT	MPPT	MPPT

RETROFLEX (DOUBLE HEAD ROADWAY)

SPECIFICATIONS	DOUBLE HEAD ROADWAY UNITS		
MODEL #	RW480	RW520	RW780
RETROFLEX (WATTS)	240 X 2	260 X 2	780
BATTERY CAPACITY (AMP HOURS)	60 X 2	60 X 2	75 X 2
BATTERY PACK (12 + yr life expectancy)	2 LITHIUM ION	2 LITHIUM ION	2 LITHIUM ION
LED LIGHT (WATTS)	40 X 2	40 X 2	60 X 2
LUMENS PER WATT @ 162	12960	12960	19440
DIMENSIONS (SOLAR ARRAY)	10.66" OD X 17'L	10.66" OD X 17'L	12.3" OD X 17'L
WEIGHT (LBS)	268	268	230
EPA (SQFT)	15.096	15.096	17.425
POLE SIZES	22' TO 26' (5" DIAMETER)		
CAP ARMS	2 STRAIGHT/TAPERED ARMS (4' TO 6')		
BASE	11" INCLUDED (24",30" - UPGRADE)		
LIGHTING & CHARGE CONTROLLER	MPPT	MPPT	MPPT

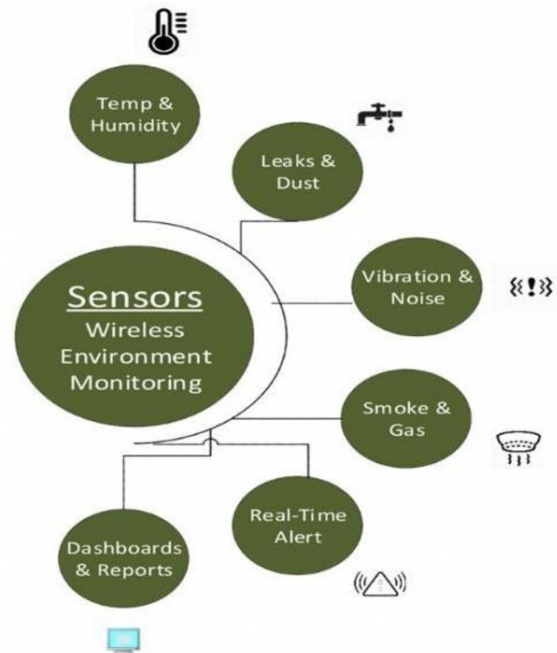
SMART POLE

SPECIFICATIONS	SMART POLE		
MODEL #	RWSMC	RWS	RWSM
RETROFLEX (WATTS)	320-780	320-780	320-780
BATTERY CAPACITY (AMP HOURS)	60	60	60 X 2
BATTERY PACK (12 + yr life expectancy)	LITHIUM ION	LITHIUM ION	2 LITHIUM ION
LED LIGHT (WATTS)	40	40	40
LUMENS PER WATT @ 162	6480	6480	6480
DIMENSIONS (SOLAR ARRAY)	10.66" OD X 17'L	10.66" OD X 17'L	10.66" OD X 17' L
WEIGHT (LBS)	225	275	350
EPA (SQFT)	26.16	26.16	26.16
POLE SIZES	20' TO 26' (5" DIAMETER)		
CAP ARMS	1 STRAIGHT/TAPERED ARMS (4' TO 6')		
BASE	11" INCLUDED (24",30" - UPGRADE)		
LIGHTING & CHARGE CONTROLLER	MPPT	MPPT	MPPT

SMART APPLICATIONS – ENVIRONMENTAL SENSORS

ENVIRONMENTAL SENSORS.....

- TEMPERATURE SENSOR
- HUMIDITY SENSOR
- PRESSURE SENSOR
- SMOKE & GAS SENSOR
- SUNLIGHT SENSOR
- AIR QUALITY SENSOR
- WATER SENSOR (FLOOD SENSOR)
- VIBRATION & NOISE SENSOR
- DUST SENSOR



SMART APPLICATIONS – CAMERAS & WIFI

- 2 MP CAMERA
- 4 MP CAMERA
- 4 MP FACIAL RECOGNITION CAMERA.....
- PTZ CAMERA
- 2 MP VF BULLET CAMERA LPR.....
- 3 MP AI ENFORCEMENT CAMERA LPR.....
- GUNSHOT DETECTION.....
- EMERGENCY CALL BUTTON.....
- MOTION SENSOR.....
- USB CHARGER
- WIFI MESH
- WIFI MESH PRO.....
- CLEARWORLD BLUETOOTH CONNECTAPP.....
- CLEARWORLD NETWORK SERVER.....
 - REMOTE CENTRALIZED MANAGEMENT SYSTEM FOR LIGHTING CONTROLS AND SOLAR
 - DASHBOARD VISIBILITY

SMART APPLICATION TIER PRICING

TIER I	TIER II	TIER III	TIER IV
<ul style="list-style-type: none"> • UP TO 250 DEVICES • CLEARWORLD IoT PaaS • REAL TIME DASHBOARDS • ACCESS TO API'S • WEB & MOBILE APPS • REMOTE SYSTEM MAINTENANCE • OVER THE AIR SOFTWARE UPDATES • FULL SYSTEM VISIBILITY & CONTROL • 24/7 CUSTOMER SERVICE 	<ul style="list-style-type: none"> • 251 TO 500 DEVICES • CLEARWORLD IoT PaaS • REAL TIME DASHBOARDS • ACCESS TO API'S • WEB & MOBILE APPS • REMOTE SYSTEM MAINTENANCE • OVER THE AIR SOFTWARE UPDATES • FULL SYSTEM VISIBILITY & CONTROL • 24/7 CUSTOMER SERVICE 	<ul style="list-style-type: none"> • 501 TO 750 DEVICES • CLEARWORLD IoT PaaS • REAL TIME DASHBOARDS • ACCESS TO API'S • WEB & MOBILE APPS • REMOTE SYSTEM MAINTENANCE • OVER THE AIR SOFTWARE UPDATES • FULL SYSTEM VISIBILITY & CONTROL • 24/7 CUSTOMER SERVICE 	<ul style="list-style-type: none"> • 751 TO 1000 DEVICES • CLEARWORLD IoT PaaS • REAL TIME DASHBOARDS • ACCESS TO API'S • WEB & MOBILE APPS • REMOTE SYSTEM MAINTENANCE • OVER THE AIR SOFTWARE UPDATES • FULL SYSTEM VISIBILITY & CONTROL • 24/7 CUSTOMER SERVICE
<p>\$6.00 PER DEVICE / MONTH</p>	<p>\$5.00 PER DEVICE / MONTH</p>	<p>\$4.50 PER DEVICE / MONTH</p>	<p>\$4.00 PER DEVICE / MONTH</p>

COMMISIONING & PROFESSIONAL SERVICES

- INTEGRATION AND COMMISSIONING (PER POLE)
- PROFESSIONAL SERVICES
 - EXPANDING IoT OFFERING

AGREEMENT AND WARRANTY

- 5 YEAR WARRANTY ON HARDWARE FOR SMART APPLICATIONS
- ALL TIER PRICING IS ON PROJECT BY PROJECT BASIS
- 3 YEAR AGREEMENT
- 10 YEAR "LIMITED" ON SYSTEM PARTS

