

SOLID STATE BOLLARDS

BRAC8 SERIES-LED

SPECIFICATIONS

PROJECT NAME: _____

FIXTURE TYPE: _____

CONCRETE RISER

Natural precast concrete body with light sandblast finish. A graffiti resistant sealer is applied to the surface. Internal electro-zinc plated steel cage provides additional strength for the structure and has threaded inserts welded to it for mounting the base plate and optical assembly. Base plate is 1/4" galvanized steel.

TOP CAP

Durable, corrosion resistant cast aluminum (A356 alloy; <0.2% copper) construction.

LED POWER ARRAY™

Three-dimensional array consisting of 6 individual LED tubes fastened to a retaining plate equally spaced to provide 360° of even illumination output. Each LED tube consists of a circuit board populated with a multiple of LED's which is fastened to a radial aluminum heat sink. A white polycarbonate lens and end caps protect each LED tube's internal components and provides diffusion to prevent shadowing and striations.

INTERNAL LOUVER (IL) - A specular louver stack conceals the inner LED Power Array Module and provides uplight and glare control through the external clear polycarbonate lens.

CAST LOUVER (CL) - External cast aluminum louver stack protects the internal LED Power Array Module and provides uplight and glare control. An internal clear polycarbonate lens is integrated with the LED Power Array Module.

OPAL LENS (WP) - Exterior white polycarbonate lens protects the internal LED Power Array Module and provides a uniform white glow.

RADIAL LED MODULE

LED'S are mounted to a circular heatsink in a radial array. The radial LED module is concealed in the cap of the bollard. LED's are not directly visible from angles above 90°.

PARABOLIC REFLECTOR (PR) - A specular Parabolic Reflector reflects a portion of the distribution from the radial LED module and provides a uniform wide angle throw through the outer clear polycarbonate lens.

LED EMITTERS

High Output LED'S are driven at 350mA for nominal 1 Watt output each. 70CRI Minimum. LED'S are available in standard Neutral White (4000K), or optional Cool White (5000K) or Warm White (3000K). Consult Factory for other LED options.

LED DRIVER

UL and CUL recognized Constant Current LED drivers operate on input voltages from 120-277VAC, 50/60hz. Consult Factory for (347-480VAC). Driver is mechanically fastened to a retaining bracket. Driver has a minimum 4KV of internal surge protection, 10KV & 20KV Surge Protector optional. Dimmable and High-Low Driver options available.

FINISH

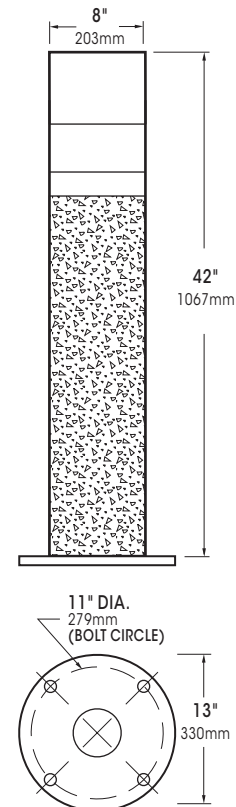
Polyester powder coat incorporates four step iron phosphate process to pretreat metal surface for maximum adhesion. Top coat is baked at 400°F for maximum hardness and exterior durability.



BRAC8

SHOWN WITH -WP OPTICS

PATENT PENDING



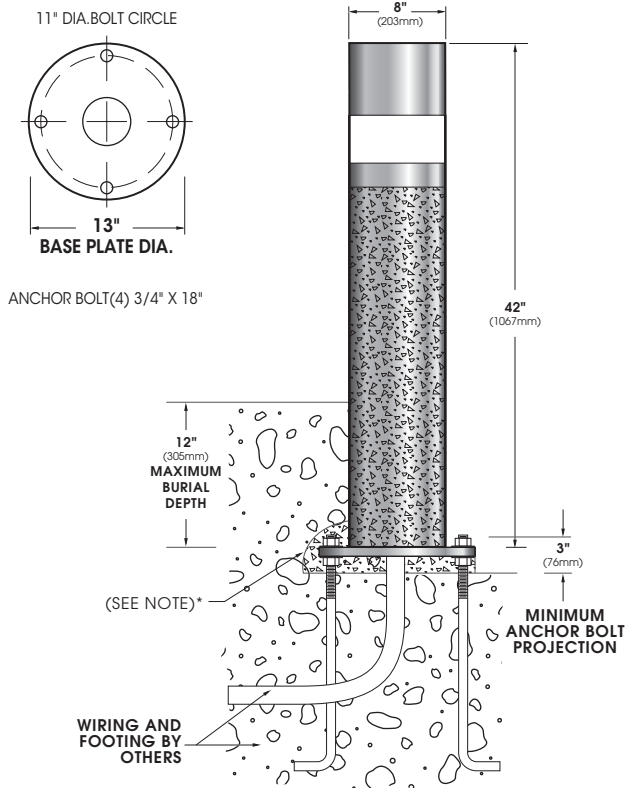
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BRAC8 SERIES-LED

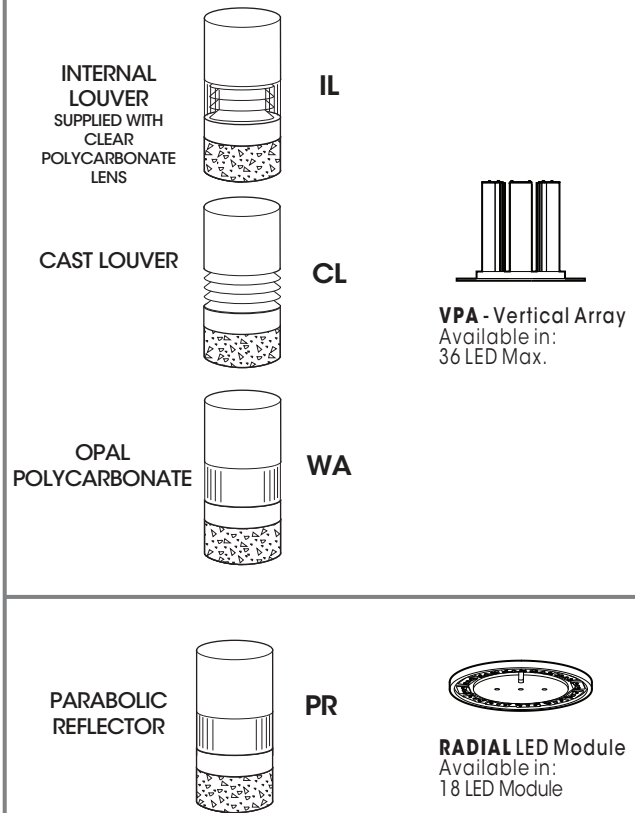
SPECIFICATIONS

INSTALLATION



*When mounting in soil, anchor bolt fasteners and other hardware must be protected from soil by grouting.

OPTICS



ORDERING INFORMATION

BOLLARD	OPTICS	# of LED's	COLOR	VOLTAGE	MOUNTING	FINISH	OPTIONS
<input type="checkbox"/> BRAC8-LED	VERTICAL POWER ARRAY <input type="checkbox"/> INTERNAL LOUVER IL <input type="checkbox"/> CAST LOUVER CL <input type="checkbox"/> OPAL POLYCARBONATE WP* RADIAL LED MODULE <input type="checkbox"/> PARABOLIC REFLECTOR PR	<input type="checkbox"/> 36LED <input type="checkbox"/> 24LED <input type="checkbox"/> 18LED	<input type="checkbox"/> NW (4000K) Standard <input type="checkbox"/> CW (5000K) <input type="checkbox"/> WW (3000K) OTHER LED COLORS AVAILABLE CONSULT FACTORY	VOLTAGE <input type="checkbox"/> 120 <input type="checkbox"/> 208 <input type="checkbox"/> 240 <input type="checkbox"/> 277 <input type="checkbox"/> 347 <input type="checkbox"/> 480	GROUND INSTALLATION	STANDARD TEXTURED FINISH <input type="checkbox"/> BLACK RAL-9005-T <input type="checkbox"/> WHITE RAL-9003-T <input type="checkbox"/> GREY RAL-7004-T <input type="checkbox"/> DARK BRONZE RAL-8019-T <input type="checkbox"/> GREEN RAL-6005-T FOR SMOOTH FINISH REMOVE SUFFIX "T" (EXAMPLE: RAL-9500) SEE USALTG.COM FOR ADDITIONAL COLORS	<input type="checkbox"/> DIMMABLE DRIVER (0-10V PROVIDED) DIM <input type="checkbox"/> HIGH-LOW DIMMING FOR HARDWIRED SWITCHING OR NONINTEGRATED MOTION SENSOR HLSW <input type="checkbox"/> INTERNAL HOUSE SIDE SHIELD . . . HS <input type="checkbox"/> DUPLEX RECEPTACLE DUP-C (CONSULT FACTORY) <input type="checkbox"/> GROUND FAULT RECEPTACLE GF-C (CONSULT FACTORY) <input type="checkbox"/> 10KV SURGE PROTECTOR 10SP <input type="checkbox"/> 20KV SURGE PROTECTOR (277V & 480V Only) 20SP OPTIONAL HEIGHTS: <input type="checkbox"/> 30" <input type="checkbox"/> 36"



SOLID STATE BOLLARDS

BRAC12 SERIES-LED

SPECIFICATIONS

CONCRETE RISER

Natural precast concrete body with light sandblast finish. A graffiti resistant sealer is applied to the surface. Internal electro-zinc plated steel cage provides additional strength for the structure and has threaded inserts welded to it for mounting the base plate and optical assembly. Base plate is 1/4" galvanized steel.

TOP CAP

Durable, corrosion resistant cast aluminum (A356 alloy; <0.2% copper) construction.

LED POWER ARRAY™

Three-dimensional array consisting of (6) or (8) individual LED Tubes fastened to a retaining plate. Each LED Tube consists of circuit board populated with a multiple of LED's and is mechanically fastened to a radial aluminum heat sink. An acrylic lens and end cap protects the LED Tube's internal components.

CAST LOUVER (CL) - External louver stack consisting of individual cast aluminum (A356 alloy; <0.2% copper) louver vanes which index together and are mechanically bonded to form a unified assembly. The louver stack is fastened to the concrete riser via threaded inserts. An internal clear acrylic lens is integrated with the LED Power Array module.

LED EMITTERS

High Output LED's are driven at 350mA for nominal 1 Watt output each. 70CRI Minimum. LED's are available in standard Neutral White (4000K), or optional Cool White (5000K) or Warm White (3000K). Consult Factory for other LED options.

LED DRIVER

UL and CUL recognized Constant Current LED drivers operate on input voltages from 120-277VAC, 50/60hz. Consult Factory for (347-480VAC). Driver is mechanically fastened to a retaining bracket. Driver has a minimum 4KV of internal surge protection, 10KV & 20KV Surge Protector optional. Dimmable and High-Low Driver options available.

FINISH

Polyester powder coat incorporates four step iron phosphate process to pretreat metal surface for maximum adhesion. Top coat is baked at 400°F for maximum hardness and exterior durability.

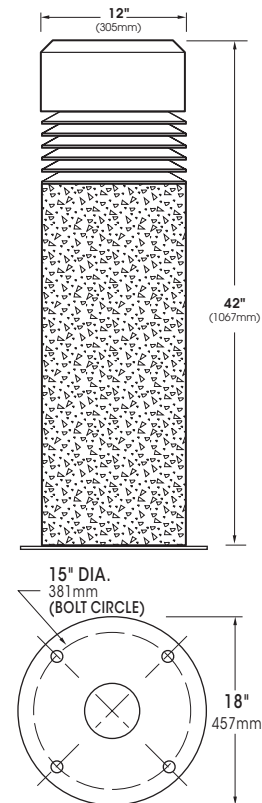
PROJECT NAME: _____

FIXTURE TYPE: _____



BRAC12

PATENT PENDING

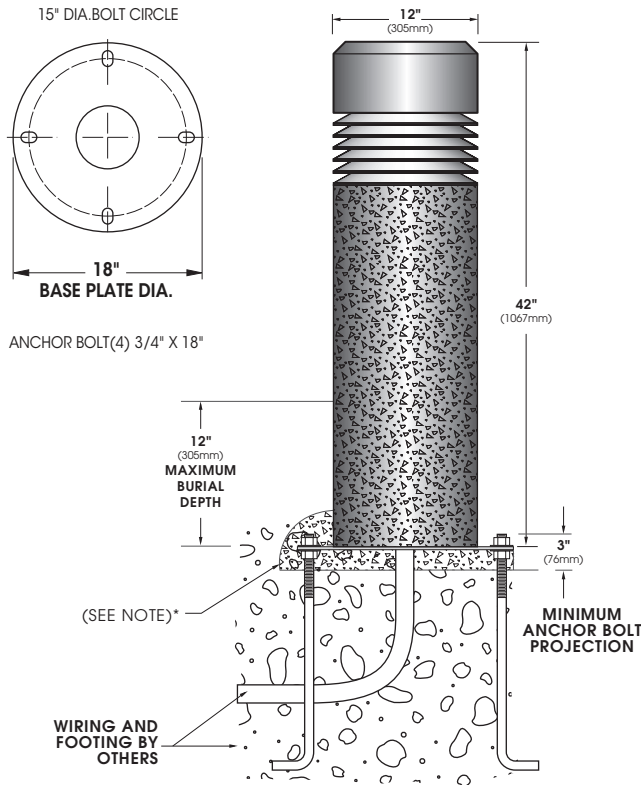


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BRAC12 SERIES-LED

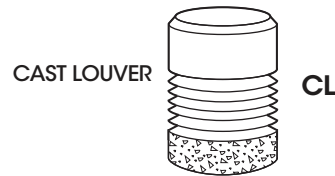
S P E C I F I C A T I O N S

INSTALLATION



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OPTICS



VPA - Vertical Array
Available in:
48 LED Max.

O R D E R I N G I N F O R M A T I O N

BOLLARD	OPTICS	# of LED's	COLOR	VOLTAGE	MOUNTING	FINISH	OPTIONS
<input type="checkbox"/> BRAC12-LED	<input type="checkbox"/> VERTICAL POWER ARRAY <input type="checkbox"/> CAST LOUVER CL	<input type="checkbox"/> 48LED (53 Watts) <input type="checkbox"/> 36LED (42 Watts) <input type="checkbox"/> 24LED (28 Watts)	<input type="checkbox"/> NW (4000K) Standard <input type="checkbox"/> CW (5000K) <input type="checkbox"/> WW (3000K) OTHER LED COLORS AVAILABLE CONSULT FACTORY	VOLTAGE <input type="checkbox"/> 120 <input type="checkbox"/> 208 <input type="checkbox"/> 240 <input type="checkbox"/> 277 <input type="checkbox"/> 347 <input type="checkbox"/> 480	<input type="checkbox"/> GROUND INSTALLATION (STANDARD) <input type="checkbox"/> DIRECT BURIAL DB	STANDARD TEXTURED FINISH <input type="checkbox"/> BLACK RAL-9005-T <input type="checkbox"/> WHITE RAL-9003-T <input type="checkbox"/> GREY RAL-7004-T <input type="checkbox"/> DARK BRONZE RAL-8019-T <input type="checkbox"/> GREEN RAL-6005-T FOR SMOOTH FINISH REMOVE SUFFIX "T" (EXAMPLE: RAL-9500) SEE USALTG.COM FOR ADDITIONAL COLORS	<input type="checkbox"/> DIMMABLE DRIVER (0-10V PROVIDED) DIM <input type="checkbox"/> HIGH-LOW DIMMING FOR HARDWIRED SWITCHING OR NONINTEGRATED MOTION SENSOR HLSW <input type="checkbox"/> INTERNAL HOUSE SIDE SHIELD... HS <input type="checkbox"/> DUPLEX RECEPTACLE DUP-C (CONSULT FACTORY) <input type="checkbox"/> GROUND FAULT RECEPTACLE GFI-C (CONSULT FACTORY) <input type="checkbox"/> 10KV SURGE PROTECTOR 10SP <input type="checkbox"/> 20KV SURGE PROTECTOR (277V & 480V Only) 20SP OPTIONAL HEIGHTS: <input type="checkbox"/> 30" <input type="checkbox"/> 36"

SOLID STATE BOLLARDS

BRAC18 SERIES-LED

SPECIFICATIONS

CONCRETE RISER

Natural precast concrete body with light sandblast finish. A graffiti resistant sealer is applied to the surface. Internal electro-zinc plated steel cage provides additional strength for the structure and has threaded inserts welded to it for mounting the base plate and optical assembly. Base plate is 1/4" galvanized steel.

TOP CAP

Durable, corrosion resistant cast aluminum (A356 alloy; <0.2% copper) construction.

LED POWER ARRAY™

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LED EMITTERS

High Output LED's are driven at 350mA for nominal 1 Watt output each. 70CRI Minimum. LED's are available in standard Neutral White (4000K), or optional Cool White (5000K) or Warm White (3000K). Consult Factory for other LED options.

LED DRIVER

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FINISH

Polyester powder coat incorporates four step iron phosphate process to pretreat metal surface for maximum adhesion. Top coat is baked at 400°F for maximum hardness and exterior durability.

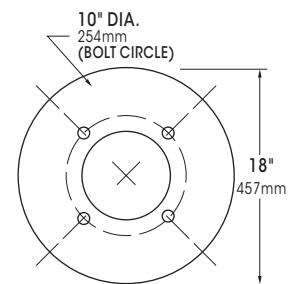
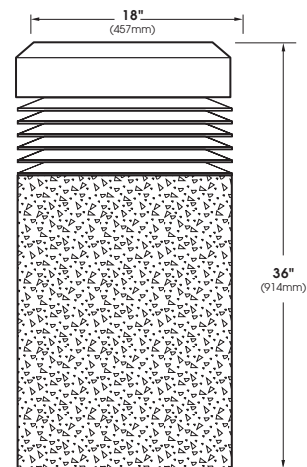
PROJECT NAME: _____

FIXTURE TYPE: _____



BRAC18

PATENT PENDING

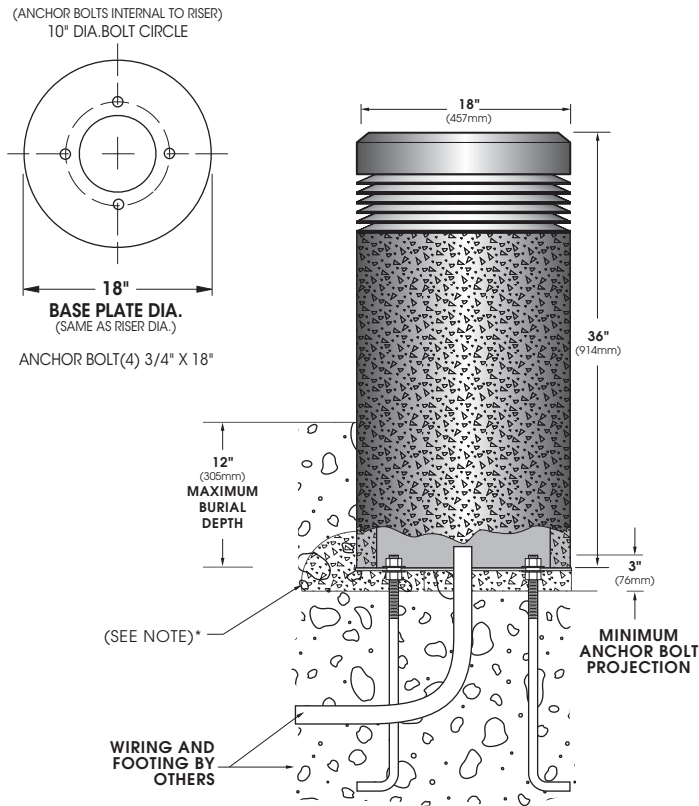


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BRAC18 SERIES-LED

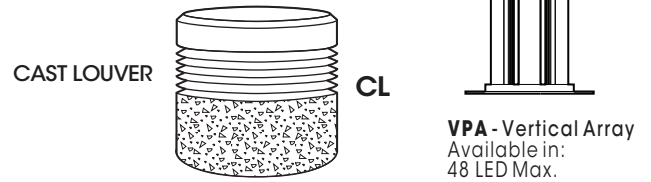
S P E C I F I C A T I O N S

INSTALLATION



*When mounting in soil, anchor bolt fasteners and other hardware must be protected from soil by grouting.

OPTICS



O R D E R I N G I N F O R M A T I O N

BOLLARD	OPTICS	# of LED's	COLOR	VOLTAGE	MOUNTING	FINISH	OPTIONS
BOLLARD	OPTICS	LED		MOUNTING	FINISH	OPTIONS	
<input type="checkbox"/> BRAC18-LED	VERTICAL POWER ARRAY <input type="checkbox"/> CAST LOUVER CL	# of LEDs <input type="checkbox"/> 48LED (53 Watts) <input type="checkbox"/> 36LED (42 Watts) <input type="checkbox"/> 24LED (28 Watts) WATTS ARE MAX INOUT WATTS	COLOR <input type="checkbox"/> NW (4000K) Standard <input type="checkbox"/> CW (5000K) <input type="checkbox"/> WW (3000K) OTHER LED COLORS AVAILABLE CONSULT FACTORY	VOLTAGE <input type="checkbox"/> 120 <input type="checkbox"/> 208 <input type="checkbox"/> 240 <input type="checkbox"/> 277 <input type="checkbox"/> 347 <input type="checkbox"/> 480	<input type="checkbox"/> GROUND INSTALLATION (STANDARD) <input type="checkbox"/> DIRECT BURIAL DB	STANDARD TEXTURED FINISH <input type="checkbox"/> BLACK RAL-9005-T <input type="checkbox"/> WHITE RAL-9003-T <input type="checkbox"/> GREY RAL-7004-T <input type="checkbox"/> DARK BRONZE RAL-8019-T <input type="checkbox"/> GREEN RAL-6005-T FOR SMOOTH FINISH REMOVE SUFFIX "T" (EXAMPLE: RAL-9500) SEE USALTG.COM FOR ADDITIONAL COLORS	<input type="checkbox"/> DIMMABLE DRIVER (0-10V PROVIDED) DIM <input type="checkbox"/> HIGH-LOW DIMMING FOR HARDWIRED SWITCHING OR NONINTEGRATED MOTION SENSOR HLSW <input type="checkbox"/> INTERNAL HOUSE SIDE SHIELD... HS <input type="checkbox"/> DUPLEX RECEPTACLE DUP-C (CONSULT FACTORY) <input type="checkbox"/> GROUND FAULT RECEPTACLE GFI-C (CONSULT FACTORY) <input type="checkbox"/> 10KV SURGE PROTECTOR 10SP <input type="checkbox"/> 20KV SURGE PROTECTOR (277V & 480V Only) 20SP OPTIONAL HEIGHTS: <input type="checkbox"/> 24" <input type="checkbox"/> 30"