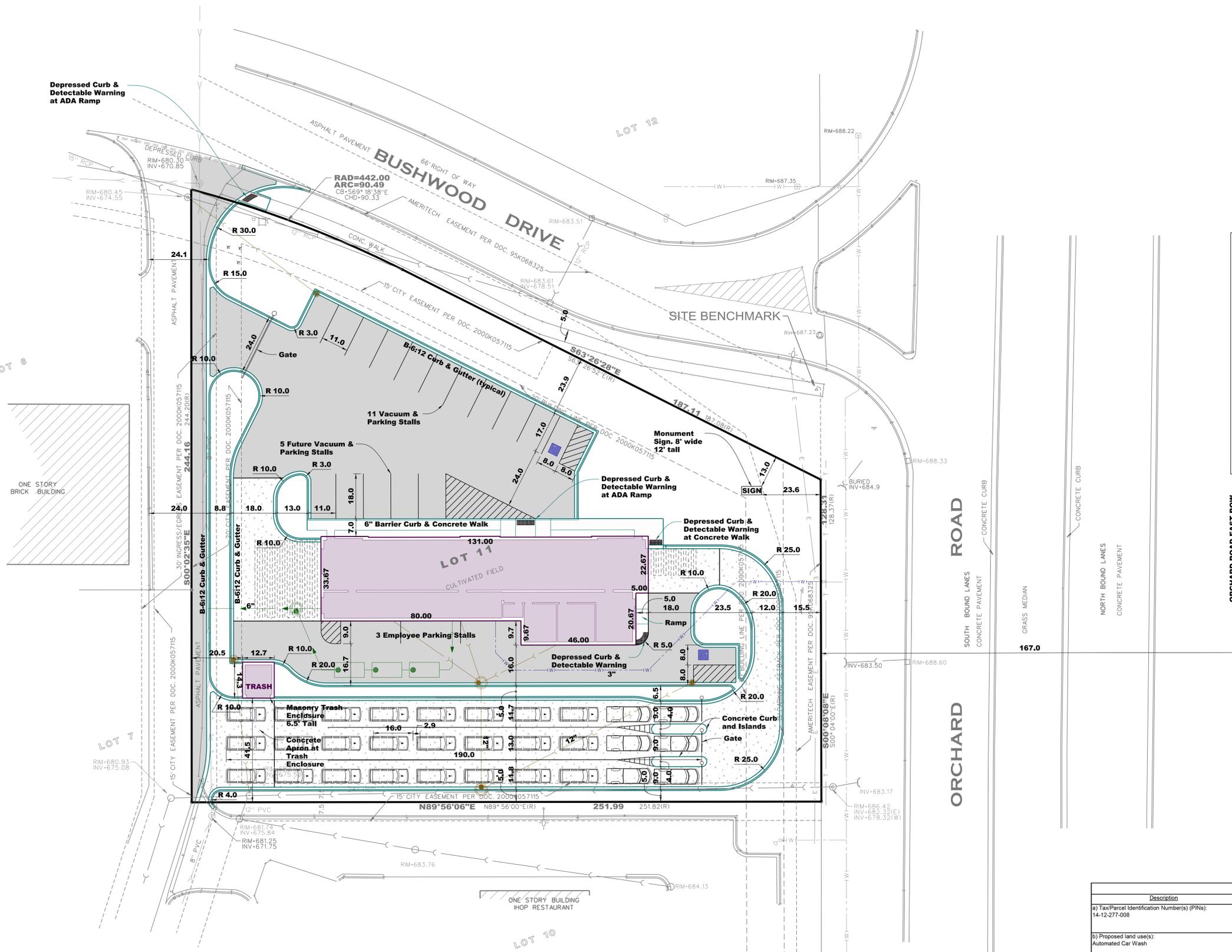
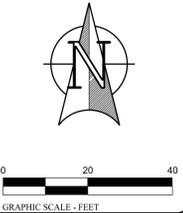


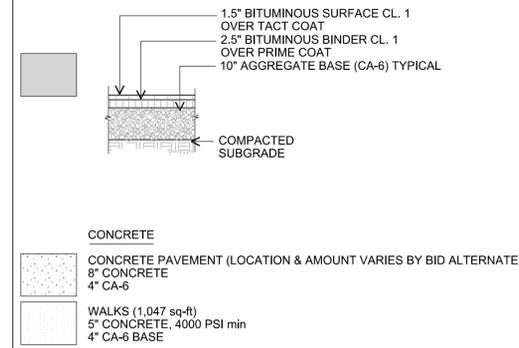
FINAL PLAN FOR LOT 11 OF ORCHARD ROAD BUSINESS PARK SUBDIVISION



VICINITY MAP
USGS - Aurora North & Sugar Grove Quads
1" = 2000'



PAVEMENT SECTIONS



Development Data Table: Final Plan					
Description	Value	Unit	Description	Value	Unit
a) Tax/Parcel Identification Number(s) (PINs): 14-12-277-008			j) Total Number of Residential Dwelling Units	0	Units
			i. Gross Density	0.00	du/acre
			ii. Net Density	0.00	Net Density
			k) Number of Single Family Dwelling Units	0	Units
			i. Gross Density	0.00	du/acre
			ii. Net Density	0.00	Net Density
			iii. Unit Square Footage (average)	-	square feet
			iv. Bedroom Mix	0%	% 1 bdr
				0%	% 2 bdr
				0%	% 3 bdr
				0%	% 4 bdr
			v. Number of Single Family Corner Lots	0	Units
			i. Gross Density	0.00	du/acre
			ii. Net Density	0.00	Net Density
			iii. Unit Square Footage (average)	-	square feet
			iv. Bedroom Mix	0%	% 1 bdr
				0%	% 2 bdr
				0%	% 3 bdr
				0%	% 4 bdr
			vi. Number of Multifamily Dwelling Units	0	Units
			i. Gross Density	0.00	du/acre
			ii. Net Density	0.00	Net Density
			iii. Unit Square Footage (average)	-	square feet
			iv. Bedroom Mix	0%	% 1 bdr
				0%	% 2 bdr
				0%	% 3 bdr
				0%	% 4 bdr

CAR WASH
2410 BUSHWOOD DRIVE, AURORA, IL 60504

Prepared For:
ARCHAMERICA, INC.
1800 Nations Drive, Suite 201
Gurnee, IL 60037
847-237-5250

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DESIGN FIRM LICENSE NO. 184-003101

REV#	DATE	REVISION DESCRIPTION	BY	RLS
1	11-22-2016	Revised per Fox Metro WRD review		
2	12-06-2016	Submitted to COA for Permit		
3	12-22-2016	Revised per Planning & Zoning Review		

Section-Township-Range
Kane: NE1/4 12-38N-07E

JOB # 43892 SURV: JCV

DRAWN: RLS REVIEW:

SCALE: 1"=20' DATE: 11-16-2016

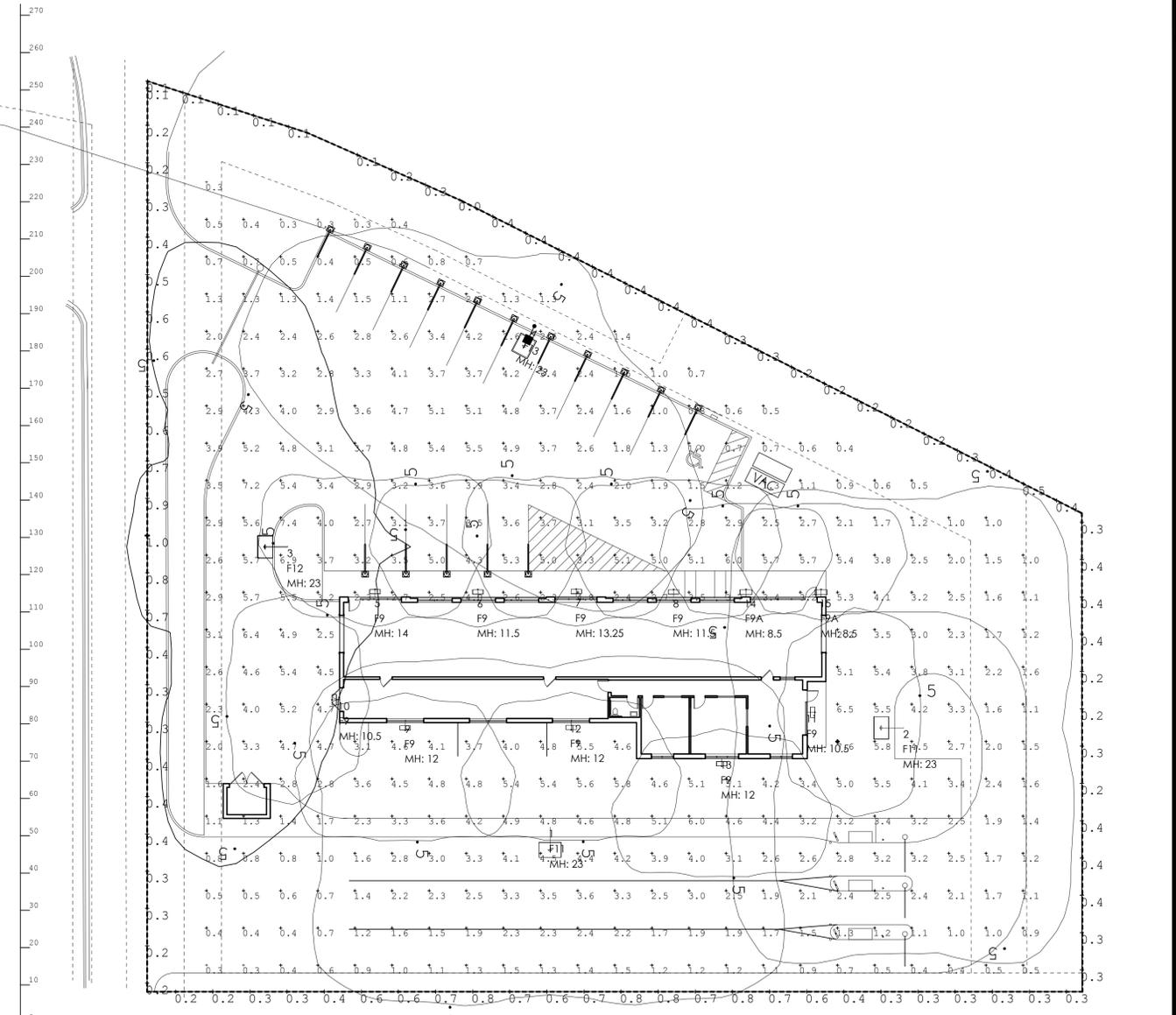
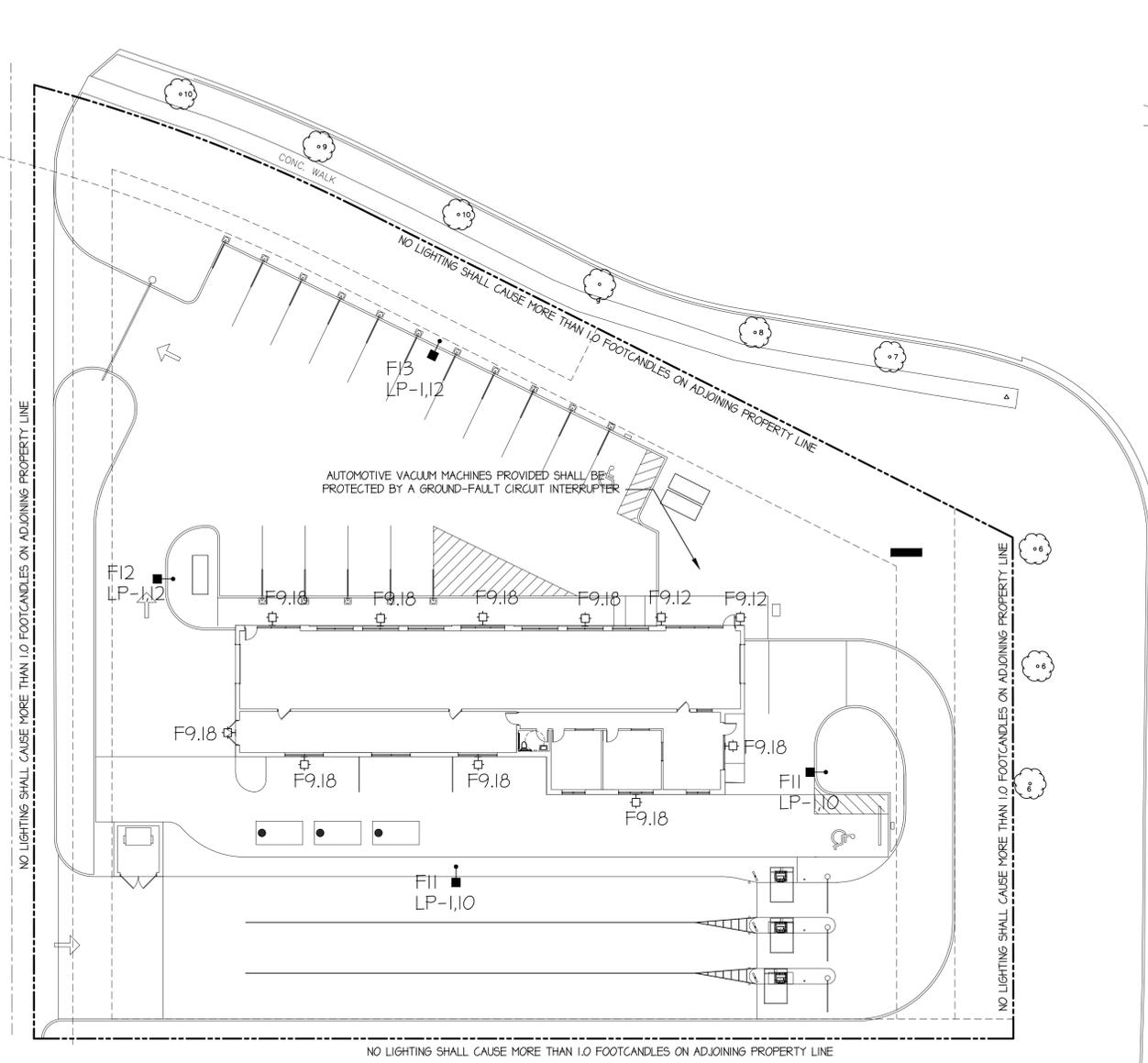
SHEET NAME

FINAL PLAN

SHEET # **X-1**

DATE: 11/22/2016
FILE: E:\ACTIVE PROJECTS\43892_12307\Kane\ENGR\MR43892_FinalEPlan.dgn
MODEL: X-1

Site Photometric Plan



SITE LIGHTING PLAN
SCALE 1" = 20'-0"

SITE PHOTOMETRIC PLAN
SCALE 1" = 20'-0"

Fixtures F9.12 & F9.18

LN2 SERIES

HUBBELL Outdoor Lighting

Specifications:

- 120V/277V universal voltage 50/60Hz 0-10V dimming driver
- 347V and 480V dimmable driver option in 12L configuration
- Electronic driver: One to six, 7L, 8L, and 12L units driven in 16, unit
- Maximum operating temperature is -40°F to 40°F
- Driver: RoHS and IP68
- Drivers have greater than 50,000 hours life and less than 20% total harmonic distortion

LEDs:

- 3000 CCT nominal - 40 CRI, 8000K CCT nominal - 70 CRI
- 5, 7, 8, 12 and 18 LED configurations available
- See page 2 for electrical and photometric details

Optical:

- Type I, II and III distributions with zero spillage to avoid glare
- Available PMMA acrylic lenses for wide glare free, maximum control and efficiency. Acrylic diffuser included where required. LED target is dimmed

Product Images: LNC2-18L1U, LNC2-18L1U, LNC2-18L1U, LNC2-18L1U

Dimensions: A, B, C, D, E, Weight / BBU

Model	A	B	C	D	E	Weight / BBU
LNC2-18L1U	6.25"	1.6"	10.25"	5.6"	10.25"	7.0 / 15.0 lbs.
LNC2-18L1U	18.7"	4.2"	20.6"	11.2"	14.2"	3.2 / 6.8 lbs.

Shipping Information:

Model	Qty	Carton Dimensions (LxWxH)	Carton Weight (lb)	Carton Volume (cu ft)
LNC2-18L1U	12	14.5 x 11.5 x 11.5	84.0	1.9
LNC2-18L1U	12	14.5 x 11.5 x 11.5	84.0	1.9

Fixtures F11, F12, and F13

VIPER L SERIES

BEACON

Specifications:

- Manufactured with a low copper content, die cast aluminum
- Coated with a polyester finish that meets ASTM B117 corrosion test requirements and ASTM D3217 salt water test requirements
- External hardware is corrosion resistant
- One piece optical cartridge system consisting of an LED engine, LED lens, optics, gasket and stainless steel bezel
- Cartridge is held together with internal brass inserts added to the bezel so that it can be field replaced as a one piece optical system
- Two piece silicone and non-volatile polyurethane foam gasket ensures a weather-proof seal around each individual LED

LED Options:

- LED driver accepts 100V through 277V, 50 Hz to 60 Hz (LVN), or a driver that accepts 347V or 480V input
- Power factor is .92 at full load
- All electrical components are rated at 50,000 hours at full load and 55°C ambient conditions per MIL-2179 Notes 2
- Dimming drivers are standard with contractors for additional dimming equipment available upon request
- Component-to-component wiring within the luminaire may carry no more than 60% of rated load and is listed by UL for use at 600VAC at 60°C or higher
- Plug disconnects are listed by UL for use at 600VAC, 15A or higher. 15A wiring applies to primary (AC) only

Product Images: rectangular arm, decorative arm

Dimensions: A, B, C, D, Weight, EPA

Model	A	B	C	D	Weight	EPA
20.12"	24.19"	14.25"	4.13"	23.3 lb	1.8 ft ²	
704 mm	614 mm	362 mm	105 mm	11.3 kg		

Mounting Options: Side View, PA Rectangular Arm, Back View

Photometric Data Table

Description	Value	Unit
Total proposed external lumens	76,249	Lumens
Total square footage of area to be illuminated		Feet
Figure #9.12		
Description	Value	Unit
i) Type of Fixture (i.e. Pole, Wall Mounted)	Wall	
ii) manufacturer and model number(s)	LNC2-18L1U-4K-4	
iii) Number of these Fixtures Shown	2	Fixtures
iv) Lamp source type (bulb type, i.e. high pressure sodium, LED)	LED	
v) Lumen output and wattage per Fixture	28	Lumen/Wattage
vi) Mounting Height / Fixture Height	6'-2"	Feet
Figure #9.18		
Description	Value	Unit
i) Type of Fixture (i.e. Pole, Wall Mounted)	Wall	
ii) manufacturer and model number(s)	LNC2-18L1U-4K-4	
iii) Number of these Fixtures Shown	9	Fixtures
iv) Lamp source type (bulb type, i.e. high pressure sodium, LED)	LED	
v) Lumen output and wattage per Fixture	45	Lumen/Wattage
vi) Mounting Height / Fixture Height	8'-10" & 13'	Feet
Figure #11		
Description	Value	Unit
i) Type of Fixture (i.e. Pole, Wall Mounted)	Pole	
ii) manufacturer and model number(s)		
iii) Number of these Fixtures Shown	2	Fixtures
iv) Lamp source type (bulb type, i.e. high pressure sodium, LED)	LED	
v) Lumen output and wattage per Fixture	224	Lumen/Wattage
vi) Mounting Height / Fixture Height	23'	Feet
Figure #12		
Description	Value	Unit
i) Type of Fixture (i.e. Pole, Wall Mounted)	Pole	
ii) manufacturer and model number(s)		
iii) Number of these Fixtures Shown	1	Fixtures
iv) Lamp source type (bulb type, i.e. high pressure sodium, LED)	LED	
v) Lumen output and wattage per Fixture	224	Lumen/Wattage
vi) Mounting Height / Fixture Height	23'	Feet
Figure #13		
Description	Value	Unit
i) Type of Fixture (i.e. Pole, Wall Mounted)	Pole	
ii) manufacturer and model number(s)		
iii) Number of these Fixtures Shown	1	Fixtures
iv) Lamp source type (bulb type, i.e. high pressure sodium, LED)	LED	
v) Lumen output and wattage per Fixture	224	Lumen/Wattage
vi) Mounting Height / Fixture Height	23'	Feet

LNC2 SERIES	Cat.#	 HUBBELL Outdoor Lighting
	Type	
		Approvals

SPECIFICATIONS

Intended Use:

The compact LED LNC2 is designed for perimeter illumination for safety, security and identity. This compact fixture has no uplight and is neighbor friendly with typical mounting heights up to 15ft. Units are supplied with an acrylic diffuser accessory that can be used for lower LED brightness near building entrances or other pedestrian areas. Units have protective polyester finish for long lasting appearance.

Construction:

Decorative die-cast aluminum housing protects components and provides an architectural appearance. Casting thermally conducts LED heat to optimize performance and long life. Powder paint finish provides durability in outdoor environments.

Electrical:

- 120V-277V universal voltage 50/60Hz 0-10V dimming drivers
- 347V and 480V dimmable driver option in 12L configuration
- Electronic drivers: One in 5L, 7L, 9L and 12L units
Two drivers in 18L units
- Minimum operating temperature is -40°C/-40°F
- Driver RoHS and IP66
- Drivers have greater than .90 power factor and less than 20% Total Harmonic Distortion

LED(s) CCT:

- 3000K CCT nominal – 80 CRI, 4000K CCT nominal – 70 CRI, 5000K CCT nominal – 70 CRI
- 5, 7, 9, 12 and 18 LED configurations available see page 2 for electrical and photometric details

Optical:

Type II, III and IV distributions with zero uplight; Individual PMMA acrylic lenses for wide lateral throw, maximum control and efficiency; Acrylic diffuser included where reduced LED brightness is desired

Lumen Maintenance:

L96 at 60,000hrs (Projected per IESNA TM-21-11), see table on page 2 for all values

Installation:

Quick-mount adapter provides easy installation to wall or to recessed junction boxes (4" square junction box). Gasket seal and secured by two Allen-head hidden fasteners for tamper resistance. Designed for direct j-box mount or conduit feed in single SKU. Conduit feed not available with BBU.

Options:

Controls:

- Button photocontrol for dusk to dawn energy savings
- Occupancy sensor options available for complete on/off and dimming control (includes factory installed back box)

Egress (includes factory installed back box):

- Battery back-up option - 12L configuration only
- Provides 1 fc minimum over 10' x 10' at 11' mounting height (exceeds NEC requirement)
- 1,546 initial lumens in battery mode
- Meets UL924 90 minute discharge schedule
- -20°C to 30°C operating temperature

Listings:

- DLC Qualified (Types III and IV) Consult DLC website for details:
<http://www.designlights.org/QPL>
- Listed to UL 1598 for use in wet locations, 40° C ambient environments

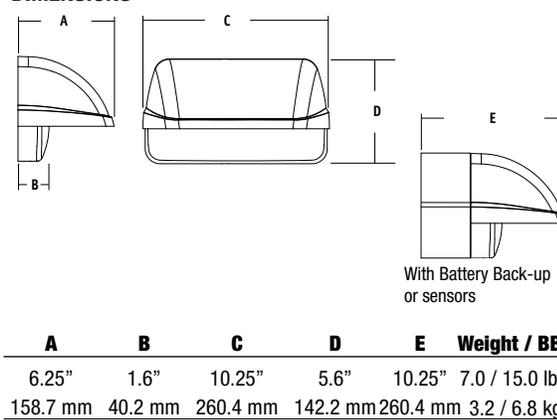
Warranty:

- Five year limited warranty (for more information visit: <http://www.hubbelloutdoor.com/resources/warranty/>)
- IES Progress Award Winner - 2013
 - Building Operating Management 2014 Top Products Award - LNC2-18LU

PRODUCT IMAGE(S)



DIMENSIONS



CERTIFICATIONS/LISTINGS



ORDERING INFORMATION – ORDERING EXAMPLE: LNC2-12LU-5K-3-1

LNC2	-		-		-		-	
SERIES	NUMBER OF LEDS	VOLTAGE ⁷	CCT	IES DISTRIBUTION	FINISH	OPTIONS		
LNC2 LNC2	5L 5 LEDs 7L 7 LEDs 9L 9 LEDs 12L³ 12 LEDs 18L 18 LEDs 12L5 12 LEDs, 480V 12LF 12 LEDs, 347V	U 120V-277V 1 120V 2 208V 3 240V 4 277V 5 480V (12L only) F 347V (12L only)	3K² 3000K nominal 80 CRI 4K 4000K nominal 70 CRI 5K 5000K nominal 67 CRI AM Amber (590 µm available for "Turtle Friendly"/observatory applications, 350 mA (consult factory)	2² Type II 3 Type III 4 Type IV	1 Bronze 2 Black 3 Gray 4 White 5 Platinum	PC⁷ Photocontrol (Must specify individual voltage) BBU^{1,6} Integral battery for 12L only (must specify 120V or 277V voltage in voltage category) rated for -20°C to 30°C SCP^{4,5,6} Programmable motion control, factory default is 10% light output	Controls Guide	

¹ Battery backup only available on 12L models, not available for Canada
² Does not qualify for DLC
³ Replace U with 1 for 120V or 4 for 277V for 12L with BBU
⁴ Must order minimum of one remote control to program dimming settings, 0-10V fully adjustable dimming with automatic daylight calibration and different time delay settings, 120V-277V only
⁵ PC option not applicable, included in sensor
⁶ BBU and motion sensor options cannot be combined
⁷ Specify voltage for PC option 120-277V only

<h1>VIPER L SERIES</h1> <p>ENHANCED LARGE VIPER LUMINAIRE</p>	Cat.#		
	Job	Type	
			Approvals

SPECIFICATIONS

Intended Use:

The Beacon Viper luminaire is available in two sizes with a wide choice of different LED Wattage configurations and optical distributions designed to replace HID lighting up to 1000W MH or HPS. Luminaires are suitable for wet locations.

Construction:

- Manufactured with a low copper content, die cast aluminum.
- Coated with a polyester finish that meets ASTM B117 corrosion test requirements and ASTM D522 cracking and loss of adhesion test requirements.
- External hardware is corrosion resistant.
- One piece optical cartridge system consisting of an LED engine, LED lamps, optics, gasket and stainless steel bezel.
- Cartridge is held together with internal brass standoffs soldered to the board so that it can be field replaced as a one piece optical system.
- Two-piece silicone and micro-cellular polyurethane foam gasket ensures a weather-proof seal around each individual LED.

LED/Optics:

- LED driver accepts 100V through 277V, 50 Hz to 60 Hz (UNV), or a driver that accepts 347V or 480V input.
- Power factor is .92 at full load.
- All electrical components are rated at 50,000 hours at full load and 25°C ambient conditions per MIL- 217F Notice 2.
- Dimming drivers are standard with connections for external dimming equipment available upon request.
- Component-to-component wiring within the luminaire may carry no more than 80% of rated load and is listed by UL for use at 600VAC at 50°C or higher.
- Plug disconnects are listed by UL for use at 600 VAC, 13A or higher. 13A rating applies to primary (AC) side only.

Electrical:

- Fixture electrical compartment shall contain all LED driver components and shall be provided with a push-button terminal block for AC power connections.
- Ambient operating temperature -40°C to 40°C
- Optional 7-pin ANSI C136.41-2013 twist-lock photo control receptacle available. Compatible with ANSI C136.41 external wireless control devices.
- Surge protection - 20KA; Shuts off at end of life.
- Lifeshield™ Circuit - protects luminaire from excessive temperature. The device shall activate at a specific, factory-preset temperature, and progressively reduce power over a finite temperature range. A luminaire equipped with the device may be reliably operated in any ambient temperature up to 55°C (131°F). Operation shall be smooth and undetectable to the eye. Thermal circuit is designed to "fail on", allowing the luminaire to revert to full power in the event of

an interruption of its power supply, or faulty wiring connection to the drivers. The device shall be able to co-exist with other 0-10V control devices (occupancy sensors, external dimmers, etc.).

Controls/Options:

- Available with an optional passive infrared (PIR) motion sensor capable of detecting motion 360° around the luminaire. When no motion is detected for the specified time, the Motion Response system reduces the Wattage to factory preset level, reducing the light level accordingly. When motion is detected by the PIR sensor, the luminaire returns to full Wattage and full light output. Please contact Beacon Products if project requirements vary from standard configuration.
- Available with Energeni for optional set dimming, timed dimming with simple delay, or timed dimming based on hours of operation or time of night (see www.beaconproducts.com/products/energeni).
- Also available with **Beaconconnect** Wireless Control System (see **Beaconconnect** product page for more details www.beaconproducts.com/products/beaconconnect).

Installation:

- Mounting options for horizontal arm, vertical tenon or traditional arm mounting available. Mounting hardware included.

Finish:

- Beacote V polyester powder-coat electro-statically applied and thermocured.
- Beacote V finish consists of a five stage pretreatment regimen with a polymer primer sealer and top coated with a thermoset super TGIC polyester powder coat finish.
- The finish meets the AAMA 605.2 performance specification which includes passing a 3000 hour salt spray test for corrosion resistance and resists cracking or loss of adhesion per ASTM D522 and resists surface impacts of up to 160 inch-pounds.

Listings:

- DesignLights Consortium (DLC) qualified, consult DLC website for more details: <http://www.designlights.org/QPL>
- Listed to UL1598 and CSA22.2#250.0-24 for wet locations and 40°C ambient temperatures
- 3G rated for ANSI C136.31 high vibration applications
- IDA approved

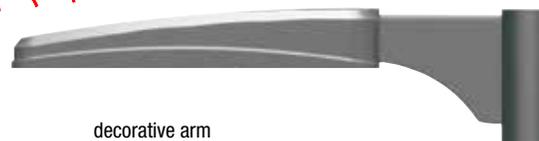
Warranty:

Five year limited warranty (for more information visit: www.hubbellighting.com/resources/warranty).

PRODUCT IMAGE(S)

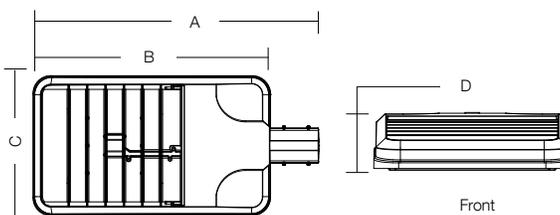


rectangular arm



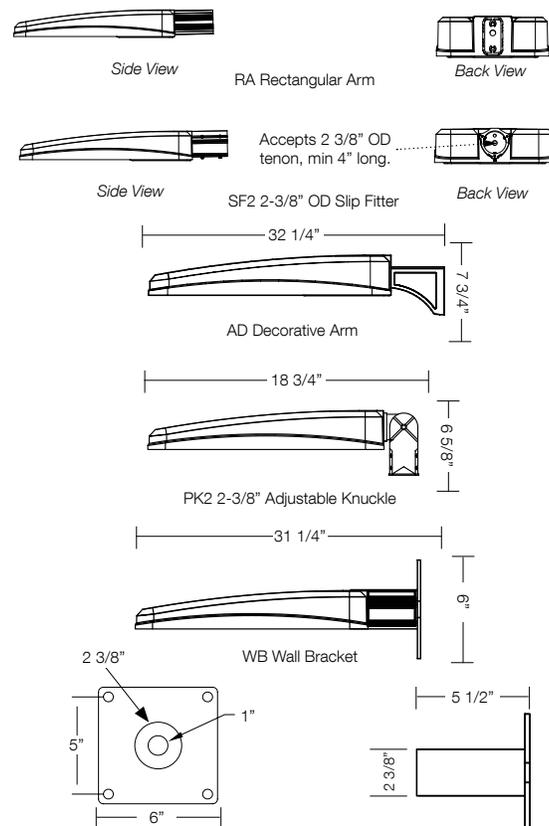
decorative arm

DIMENSIONS



A	B	C	D	Weight:	EPA
29.12"	24.19"	14.25"	4.13"	25.0 lbs	1.0 ft ²
(704 mm)	(614 mm)	(362 mm)	(105 mm)	(11.3 kg)	

MOUNTING OPTIONS



CERTIFICATIONS/LISTINGS



*3000K and warmer CCTs only



Beacon Products • 2041 58th Avenue Circle East Bradenton, FL 34203 • Phone: 800-345-4928

Due to our continued efforts to improve our products, product specifications are subject to change without notice.

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ORDERING INFORMATION ORDERING EXAMPLE: VPL/96NB-280/5K/T4/UNV/PCR-TL/SF2/GENIXX/BLC/RA/BBT

VPL									
SERIES	ENGINE-WATTS	LED COLOR	VOLTAGE	ELECTRICAL OPTIONS	HOUSE SIDE SHIELD OPTIONS	FINISH			
VPL viper-large	64NB-135 135W, LED array 80NB-180 180W, LED array 80NB-235 235W, LED array 96NB-220 220W, LED array 96NB-280 280W, LED array 96NB-395 395W, LED array	3K 3000K 4K 4000K 5K 5000K	UNV 120-277V 347V 347V 480V 480V	PCR-TL 7 pin twist lock receptacle with photo control PCR-SC 7 pin twist lock receptacle with shorting cap 2PF ⁷ dual power feed PCRU 7 pin twist lock receptacle	HSS-90 house side shield 90° HSS-180 house side shield 180° BLC ³ backlight control	BBT basic black textured BMT black matte textured WHT white textured MBT metallic bronze textured BZT bronze textured DBT dark bronze textured GYS gray smooth DPS dark platinum smooth GNT green textured MST metallic silver textured MTT metallic titanium textured OWI old world iron RAL _____			
			OPTICS ⁴	SENSOR OPTIONS		MOUNTING OPTIONS			
			T1 type I T2 type II T3 type III T4 type IV T5R type V, rectangular T5QM type V, square medium T5W type V, round wide FR front row auto optic	BMD ^{2,5} motion sensor for beaconnect MDD ^{2,5} motion dimming detector		RA rectangular arm for round or square pole mount. RPA included. SF2 2 3/8" OD slip-fitter PK2 2 3/8" adjustable knuckle AD decorative arm with universal mounting slot. RPA ordered separately. See referenced table. WB wall bracket (use with SF2 or PK2), SF2 standard			
			CONTROL OPTIONS						
			GENI-XX ⁶ energeni BCW ^{1,5} beaconnect						

MDD ORDERING INFORMATION: When ordering a fixture with the motion detection option (MDD), please specify the appropriate information. These settings are specified in the ordering as shown in the example below.

VPL / 80NB-235 / 5K / T5W / UNV / MDD - 1 to 30 min. - 33% or 50% - ?? / MT

High to Dim Delay Low Level Mounting Height (ft.)

BEACONNECT ORDERING INFORMATION: When ordering a fixture with the Beconnect lighting control options please specify the appropriate group and sensor information. Please provide dimming schedule information in either the Beconnect excel spreadsheet or Beconnect software. For more detailed information please visit www.beaconproducts.com/beaconnect or contact beacon tech support at (800) 345-4928. These settings are specified in the ordering as shown in the example below. (Family) / 24NB-55 / 5K / T3 / UNV / BCW-(Group 1-16)_____(Optional Zone 1-250) / BMD - ___ Time Delay(1 to 255) - ___ Dimming% (1 to 100) - ___ mounting height(1-20ft)___ / Example: TRV/24NB-55/5K/T3/UNV/BCW-G1 / BMD-30M-50%-10F/DBT for luminaires without sensors in the group omit the BMD ordering logic Example: TRV/24NB-55/5K/T3/UNV/BCW-G1 / DBT

¹ Must specify group and zone information at time of order. See www.beaconproducts.com/controls/beaconnect for further details
² Specify time delay, dimming level and mounting height.
³ T4 optic only.
⁴ To rotate optics Left or right 90 degrees, specify L or R after the optical distribution example T4L.
⁵ Not available with other control or sensor options.
⁶ When ordering Energeni, specify the routine setting code (example GENI-04). See Energeni brochure and instructions for setting table and options. Not available with sensor options.
⁷ Not available for 347V or 480V input.

Catalog Number	Description
VPL-AD-RPA3	3.5" - 4.125"
VPL-AD-RPA4	4.188" - 5.25"
VPL-AD-RPA5	5.5" - 6.5"

Order Separately

Catalog Number	Description
ASM-USB-BCW	Beaconnect Software loaded on USB flash drive* (Windows based only)
ASM-TABLET-BCW	Beaconnect 7" Windows Tablet*

*Includes USB Radio



DesignLights Consortium qualified. Consult DLC website for more details: <http://www.designlights.org/QPL>

