



# DEVELOPMENT PLAN REPORT

▶ **FILE #:** 6-C-26-DP

**AGENDA ITEM #:** 26

**AGENDA DATE:** 6/11/2026

▶ **APPLICANT:** IAN JAY

OWNER(S): Nature's Best Organics of TN LLC / Brian Development, LLC

TAX ID NUMBER: 76 009, 00901 089 044, 089 193

[View map on KGIS](#)

JURISDICTION: County Commission District 6

STREET ADDRESS: 0 JOE DANIELS RD (8703, 8707 JOE DANIELS RD; 0 W EMORY RD)

▶ **LOCATION:** North side of Joe Daniels Rd, east and north of Oak Ridge Hwy

▶ **APPX. SIZE OF TRACT:** 193.69 acres

GROWTH POLICY PLAN: Rural Area

ACCESSIBILITY: Access is via Joe Daniels Road, a local street with a pavement width which varies between 15 ft and 28 ft within an undefined right-of-way width.

UTILITIES: Water Source: West Knox Utility District

Sewer Source: West Knox Utility District

FIRE DISTRICT: Karns Fire Department

WATERSHED: Beaver Creek, Clinch River

▶ **ZONING:** PR(k) (Planned Residential) with conditions, up to 3 du/ac

PLACE TYPE: RL (Rural Living), HP (Hillside Ridgetop Protection)

▶ **EXISTING LAND USE:** Commercial, Agriculture/Forestry/Vacant Land, Office

▶ **PROPOSED USE:** Multi-dwelling and commercial development

HISTORY OF ZONING: The majority of the property was rezoned from A (Agricultural) to PC (Planned Commercial) in the 1980's and rezoned back to A in pieces in the 1990's and early 2000's. Two small portions of the property were rezoned to CR (Rural Commercial) in 2012 (4-C-12-RZ). The property was rezoned from A, CR, and PC to PR(k). (Planned Residential with conditions) up to 3 du/ac in 2023 (11-I-23-RZ)

SURROUNDING LAND USE AND ZONING: North: Railroad Right-of-way, rural residential - A (Agricultural), PC (Planned Commercial)  
South: Agriculture/forestry/vacant land, single family residential, rural residential, commercial, transportation/communications/utilities - A (Agricultural), PR (Planned Residential), I (Industrial)  
East: Agriculture/forestry/vacant land, rural residential - PR(k) (Planned Residential) up to 2.2 du/ac with conditions, A (Agricultural)  
West: Industrial, agriculture/forestry/vacant land - PC (Planned Commercial), A (Agricultural), CB (Business and Manufacturing)

NEIGHBORHOOD CONTEXT: This area is comprised of industrial and residential uses interspersed between large swaths of forested land. Industrial uses include mulching and

landscaping, warehousing and shipping, and auto scrapping operations. Residential uses include single family dwellings on large rural lots and small suburban lots.

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**STAFF RECOMMENDATION:**

- ▶ **Postpone for 30 days to the July 9, 2026 Planning Commission meeting, as requested by the applicant.**

**COMMENTS:**

This request is for a mixed residential and commercial development with 482 multi-family dwelling units, 96 townhouses, and 21,100 sqft of commercial.

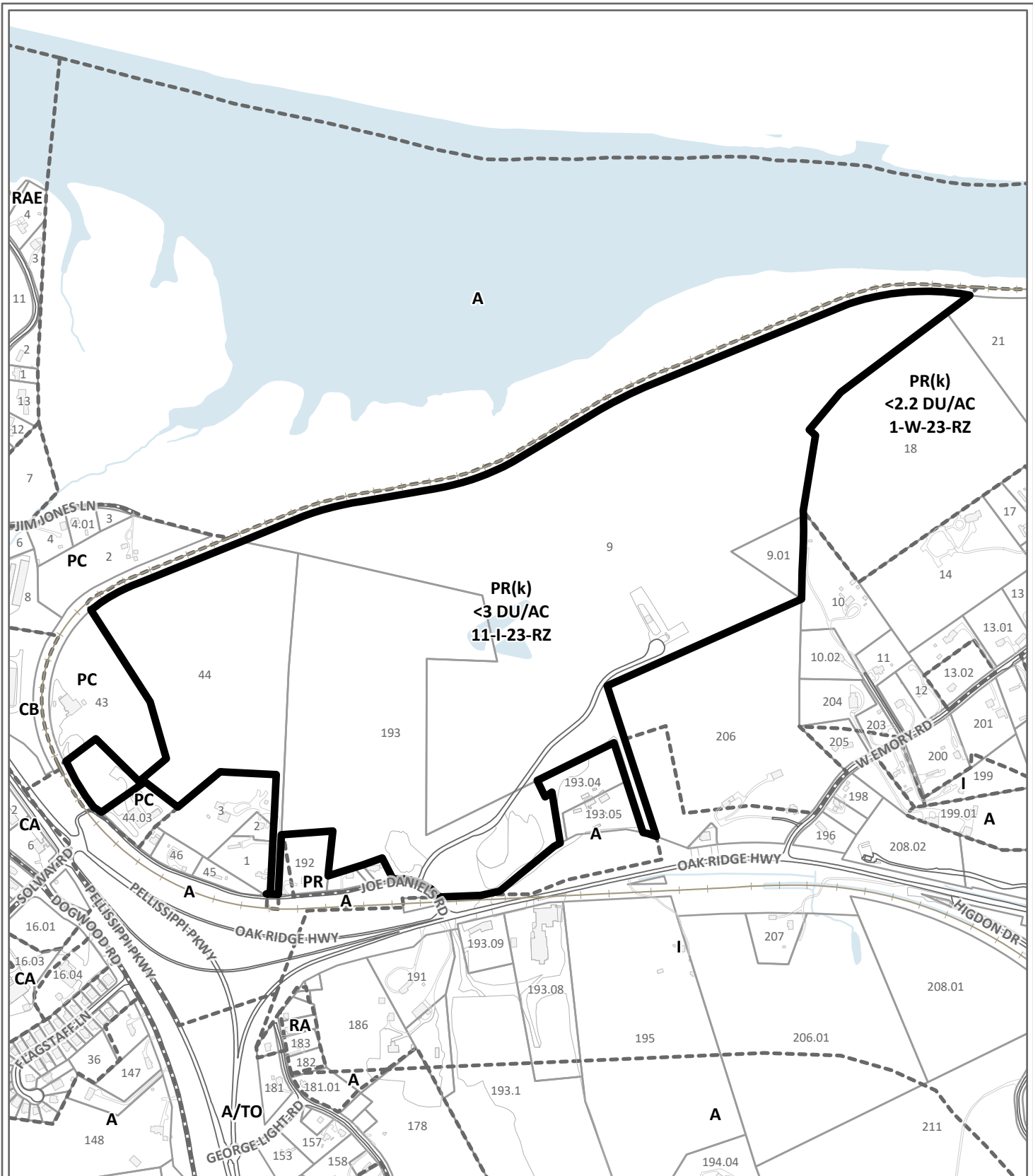
**ESTIMATED TRAFFIC IMPACT:** A traffic impact study was prepared by the applicant. The findings of that study were used in formulating the recommendations of this staff report.

**ESTIMATED STUDENT YIELD:** 50 (public school children, grades K-12)

Schools affected by this proposal: Mill Creek Elementary, Hardin Valley Middle, and Karns High.

- Potential new school population is estimated using locally-derived data on public school student yield generated by new housing.
- Students are assigned to schools based on current attendance zones as determined by Knox County Schools. Students may request transfers to different zones, and zone boundaries are subject to change.
- Estimates presume full build-out of the proposed development. Build-out is subject to market forces, and timing varies widely from proposal to proposal.
- Student yields from new development do not reflect a net addition of children in schools. Additions occur incrementally over the build-out period. New students may replace current population that ages through the system or moves from the attendance zone.

The Planning Commission's approval or denial of this request is final, unless the action is appealed. For more information on the appeal process, contact Knoxville-Knox County Planning.



**DEVELOPMENT PLAN**

**6-C-26-DP**

**Petitioner:** Ian Jay



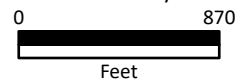
Multi-dwelling and commercial development in PR(k) (Planned Residential), <3 DU/AC

**Original Print Date:** 4/29/2026

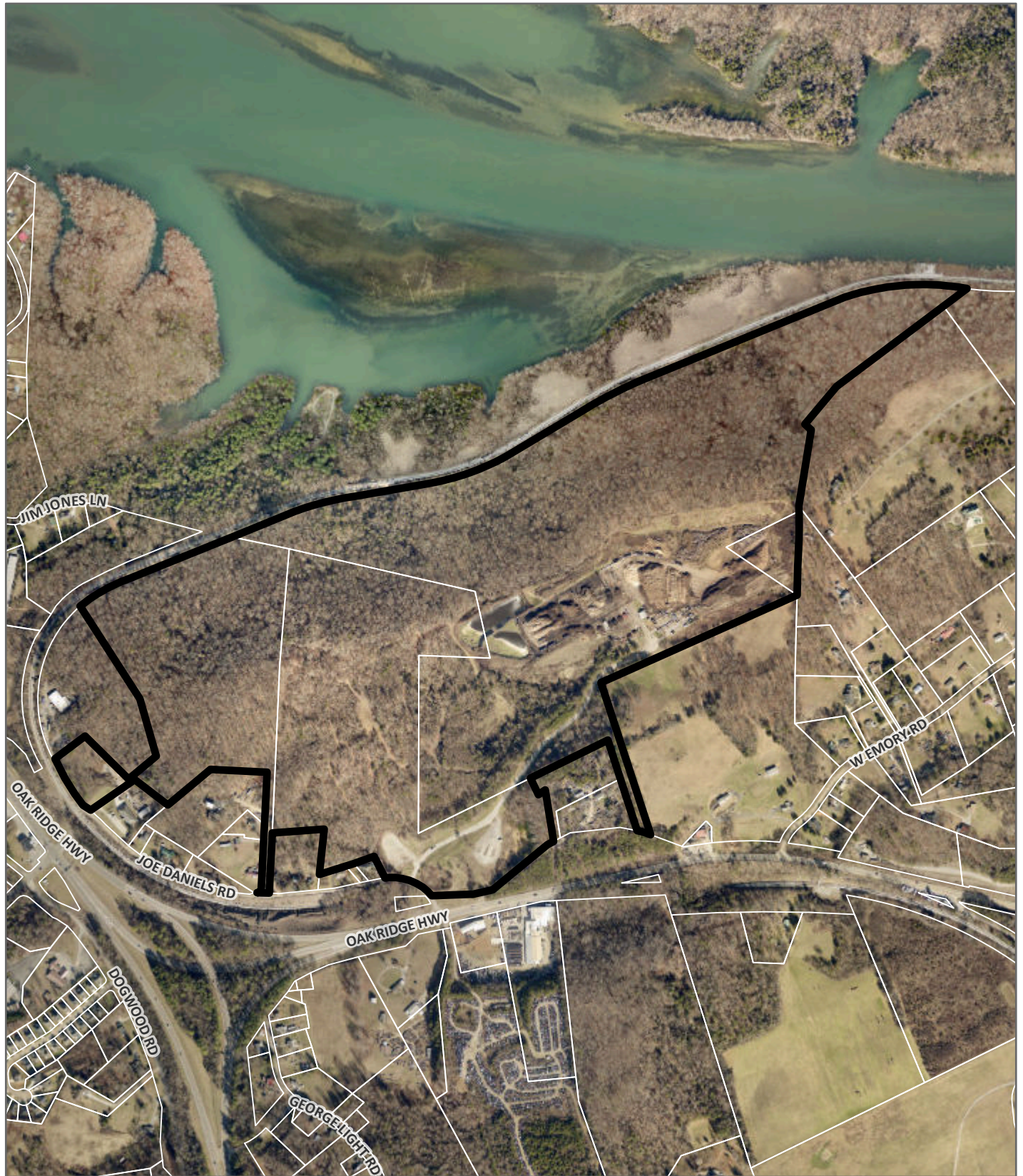
Knoxville - Knox County Planning Commission \* City / County Building \* Knoxville, TN 37902

**Map No:** 76

**Jurisdiction:** County



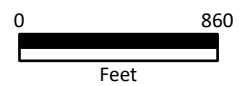
# Exhibit A. Contextual Images



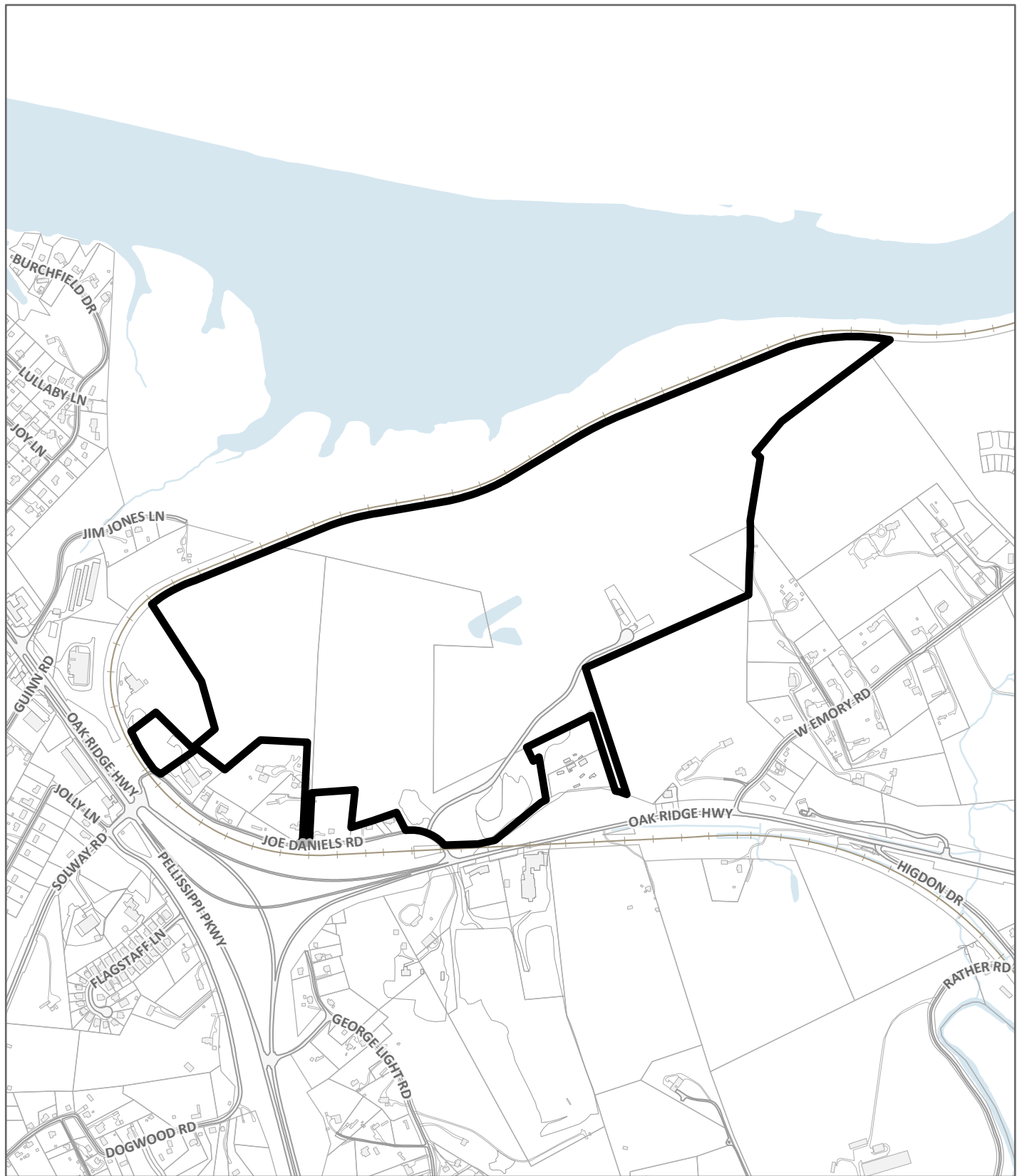
## AERIAL MAP



Case boundary



# Exhibit A. Contextual Images



**LOCATION MAP**

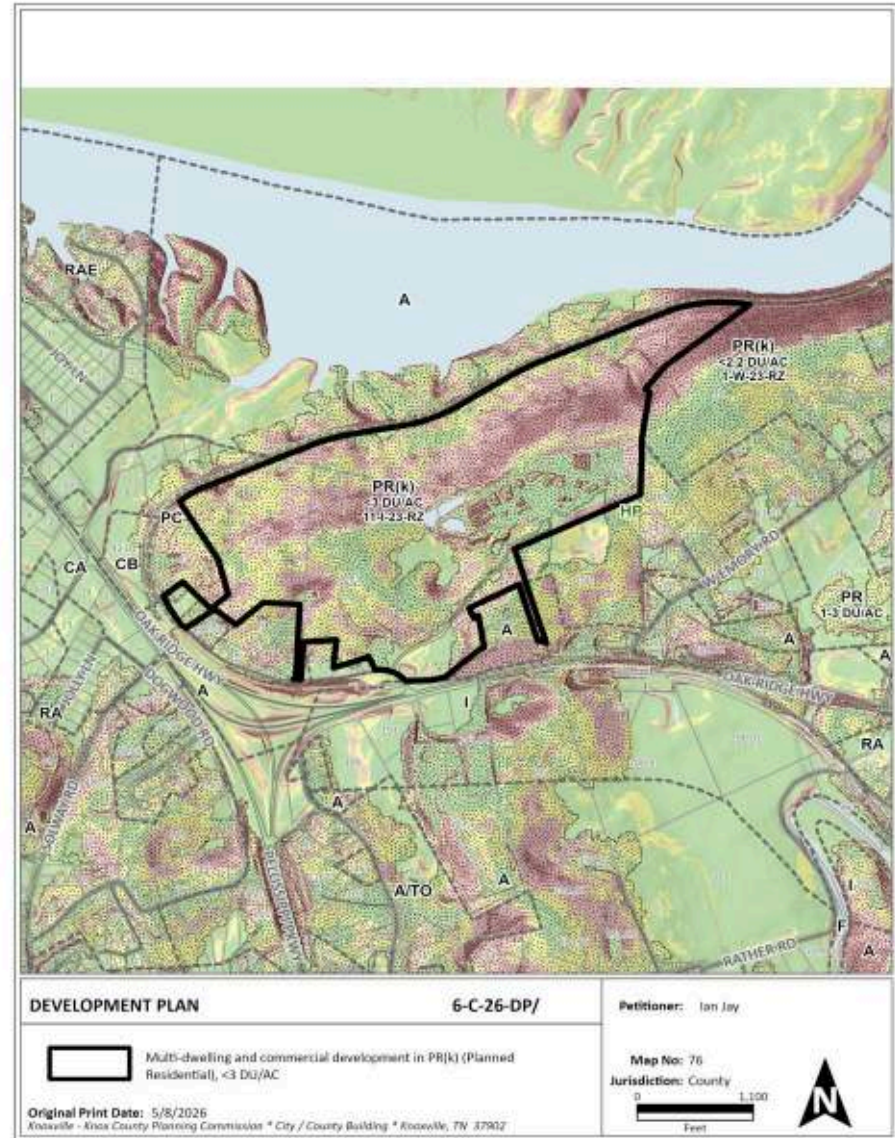
**6-C-26-DP**



Case boundary



CATEGORY	ACRES	RECOMMENDED DISTURBANCE BUDGET (Percent)	DISTURBANCE AREA (Acres)
<b>Total Area of Site</b>	<b>195.79</b>		
Non-Hillside	14.49	N/A	
0-15% Slope	38.79	100%	38.79
15-25% Slope	49.23	50%	24.62
25-40% Slope	60.37	20%	12.07
Greater than 40% Slope	32.90	10%	3.29
Ridgetops			
<b>Hillside Protection (HP) Area</b>	<b>181.29</b>	Recommended disturbance budget within HP Area (acres)	<b>78.77</b>
		Percent of HP Area	<b>43.5%</b>





Building A Elevation



Building B Elevation



\*Images are intended for conceptual design purposes only. Final design and material configurations are subject to change as project develops and commercial building uses are determined.

A Concept Plan for

# Horizon View / Knoxville, TN

April 23, 2026



Building C Elevation



Building D Elevation



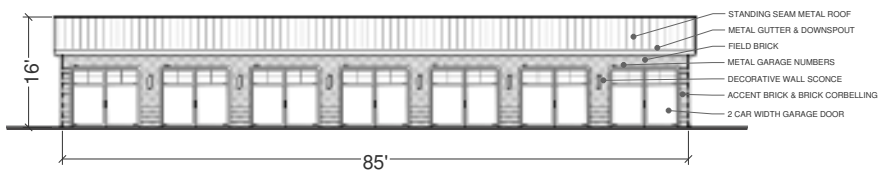
\*Images are intended for conceptual design purposes only. Final design and material configurations are subject to change as project develops and commercial building uses are determined.

A Concept Plan for  
**Horizon View / Knoxville, TN**

April 23, 2026



Townhouse Building Elevation



Garage Building Elevation



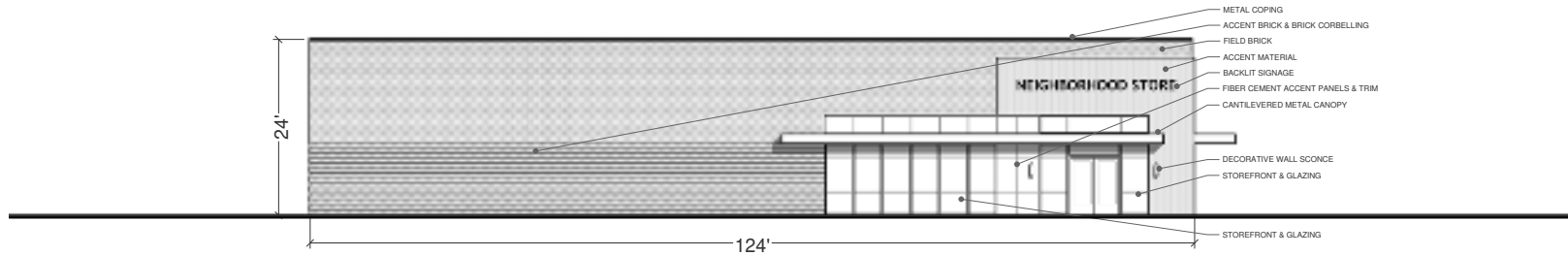
Leasing Office Building Elevation



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A Concept Plan for  
**Horizon View / Knoxville, TN**

April 23, 2026



Commercial Building 1 Elevation



Commercial Building 2 Elevation



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# DEVELOPMENT PLAN HORIZON VIEW

## 8703 & 8707 JOE DANIELS ROAD KNOXVILLE, TN 37931

### CONTACTS

**DEVELOPER:** TBG SOLWAY  
8707 JOE DANIELS ROAD  
KNOXVILLE, TN 37931  
(865) 927-7647  
CONTACT: SIDNEY BRIAN

**DESIGN PROFESSIONAL:** BARGE DESIGN SOLUTIONS  
615 3RD AVENUE SOUTH  
SUITE 700  
NASHVILLE, TN 37210  
(615) 254-1500  
CONTACT: IAN JAY, PE

**ARCHITECT:** LEWIS GROUP ARCHITECTS  
611 KING STREET  
SUITE 500  
KNOXVILLE, TN 37917  
CONTACT: CRAIG LEWIS



### VICINITY MAP

NOT TO SCALE

### INDEX OF DRAWINGS

SHEET NO.	DESCRIPTION
C0.00	COVER SHEET
C0.21	OVERALL EXISTING CONDITIONS
C0.22-C0.23	EXISTING CONDITIONS
C1.00	OVERALL SITE LAYOUT PLAN
C1.01-C1.02	PH. 1 & 2 OVERALL SITE LAYOUT PLAN
C1.03-C1.06	ENLARGED SITE LAYOUT PLAN
C2.00	OVERALL GRADING & DRAINAGE PLAN
C2.01-C2.02	GRADING & DRAINAGE PLAN
C3.00	OVERALL UTILITY PLAN
C3.01-C3.02	UTILITY PLAN
C4.01-C4.03	ROADWAY PLAN & PROFILE
L0.00	TREE PROTECTION PLAN
L1.00	OVERALL LANDSCAPE PLAN
L1.01	LANDSCAPE PLAN
L1.02	LANDSCAPE PLAN
L7.01	LANDSCAPE NOTES
L7.02	LANDSCAPE DETAILS
ES100	ELECTRICAL SITE LIGHTING PLAN - OVERALL
ES101	ENLARGED PHOTOMETRIC PLAN
ES102	ENLARGED PHOTOMETRIC PLAN



615 3RD AVENUE SOUTH, SUITE 700, NASHVILLE, TN 37210 (615) 254-1500



FOR PLANNING COMMISSION APPROVAL ONLY. NOT TO BE USED FOR CONSTRUCTION.

FILE #: 6-C-26-DP

COVER SHEET  
DEVELOPMENT PLAN  
HORIZON VIEW  
8703 & 8707 JOE DANIELS ROAD  
KNOXVILLE, TN 37931

**SITE DATA TABLE**

NO.	DESCRIPTION	DATE	BY	CHECKED
1	PRELIMINARY SITE LAYOUT PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
2	OVERALL EXISTING CONDITIONS	5/26/2026	IAN JAY	SIDNEY BRIAN
3	EXISTING CONDITIONS	5/26/2026	IAN JAY	SIDNEY BRIAN
4	OVERALL SITE LAYOUT PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
5	PH. 1 & 2 OVERALL SITE LAYOUT PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
6	ENLARGED SITE LAYOUT PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
7	OVERALL GRADING & DRAINAGE PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
8	GRADING & DRAINAGE PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
9	OVERALL UTILITY PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
10	UTILITY PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
11	ROADWAY PLAN & PROFILE	5/26/2026	IAN JAY	SIDNEY BRIAN
12	TREE PROTECTION PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
13	OVERALL LANDSCAPE PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
14	LANDSCAPE PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
15	LANDSCAPE PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
16	LANDSCAPE NOTES	5/26/2026	IAN JAY	SIDNEY BRIAN
17	LANDSCAPE DETAILS	5/26/2026	IAN JAY	SIDNEY BRIAN
18	ELECTRICAL SITE LIGHTING PLAN - OVERALL	5/26/2026	IAN JAY	SIDNEY BRIAN
19	ENLARGED PHOTOMETRIC PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN
20	ENLARGED PHOTOMETRIC PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN



520 West Summit Hill Drive // Suite 1202 // Knoxville, Tennessee 37902  
Phone (865) 637-2810 // Fax (865) 673-8554

6-C-26-DP  
Revised: 5/26/2026

**FEMA NOTE**  
THIS PARCEL IS LOCATED IN A FLOOD HAZARD AREA ZONE "AE" ACCORDING TO FEDERAL EMERGENCY MANAGEMENT AGENCY FLOOD INSURANCE RATE MAP NO. 47189C0134E, DATED MAY 9, 2023. FEMA FLOODWAY AND ZONE "AE" LINES ARE SHOWN ON THE PLANS. NO PARTS OF THE RELEVANT AREA TO BE DEVELOPED ARE LOCATED IN A FLOOD HAZARD AREA.

NO.	DESCRIPTION	DATE	BY	CHECKED
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20	ENLARGED PHOTOMETRIC PLAN	5/26/2026	IAN JAY	SIDNEY BRIAN

C0.00

FILE NO. 37122-78





DATE: 08/11/2020  
 FILE: J:\2020\37122\37122.DWG  
 DRAWN BY: JLD  
 CHECKED BY: JLD  
 PLOT DATE: 08/11/2020



MATCH LINE SEE SHEET C0.22

EXISTING STRUCTURE (TYP.)

**EXISTING LEGEND**

PIP	POWER/TEL POLE
⊗	FIRE HYDRANT
⊕	SON
⊖	WW WATER VALVE
⊙	WM WATER METER
⊠	CB CATCH BASIN
⊡	ADS AREA DRAIN SQUARE
⊚	ADR AREA DRAIN ROUND
○	SANITARY MANHOLE
⊖	EDGE OF WOODS
⊖	FENCE
— SA —	UNDERGROUND SANITARY SEWER
— ST —	UNDERGROUND STORM SEWER
— W —	UNDERGROUND WATERLINE
— UGP —	UNDERGROUND POWER
— LGT —	UNDERGROUND TELEPHONE
— G —	UNDERGROUND GASLINE
— OHT —	OVERHEAD POWER/TELEPHONE LINE
---	PROPERTY LINE
---	IRRIGATION LINE
---	750
---	750
---	EXISTING CONTOURS

**811** Know what's below  
 Call before you dig.  
 811  
 www.call811.com

PERMIT NUMBERS:

DATUM: NAVD83  
 GEOD03

BENCHMARK:

SCALE: 1 INCH = 100 FEET

100' 50' 0' 100' 200'



FOR PLANNING COMMISSION  
 APPROVAL ONLY. NOT TO BE  
 USED FOR CONSTRUCTION.  
 FILE #: 6-C-26-DP

EXISTING CONDITIONS  
 DEVELOPMENT PLAN  
 HORIZON VIEW  
 8703 & 8707 JOE DANIELS ROAD  
 KNOXVILLE, TN 37931

NO.	DATE	DESCRIPTION
1	08/11/2020	DEVELOPMENT PLAN

**C0.23**  
 FILE NO. 37122-78







FOR PLANNING COMMISSION APPROVAL ONLY. NOT TO BE USED FOR CONSTRUCTION.

FILE #: 6-C-26-DP

PHASE 2 OVERALL SITE LAYOUT PLAN  
DEVELOPMENT PLAN  
HORIZON VIEW  
8703 & 8707 JOE DANIELS ROAD  
KNOXVILLE, TN 37931

NO.	DATE	BY	CHKD	DESCRIPTION
1				DEVELOPMENT PLAN
2				
3				
4				
5				
6				
7				
8				
9				
10				
11				
12				

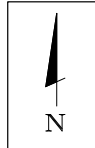
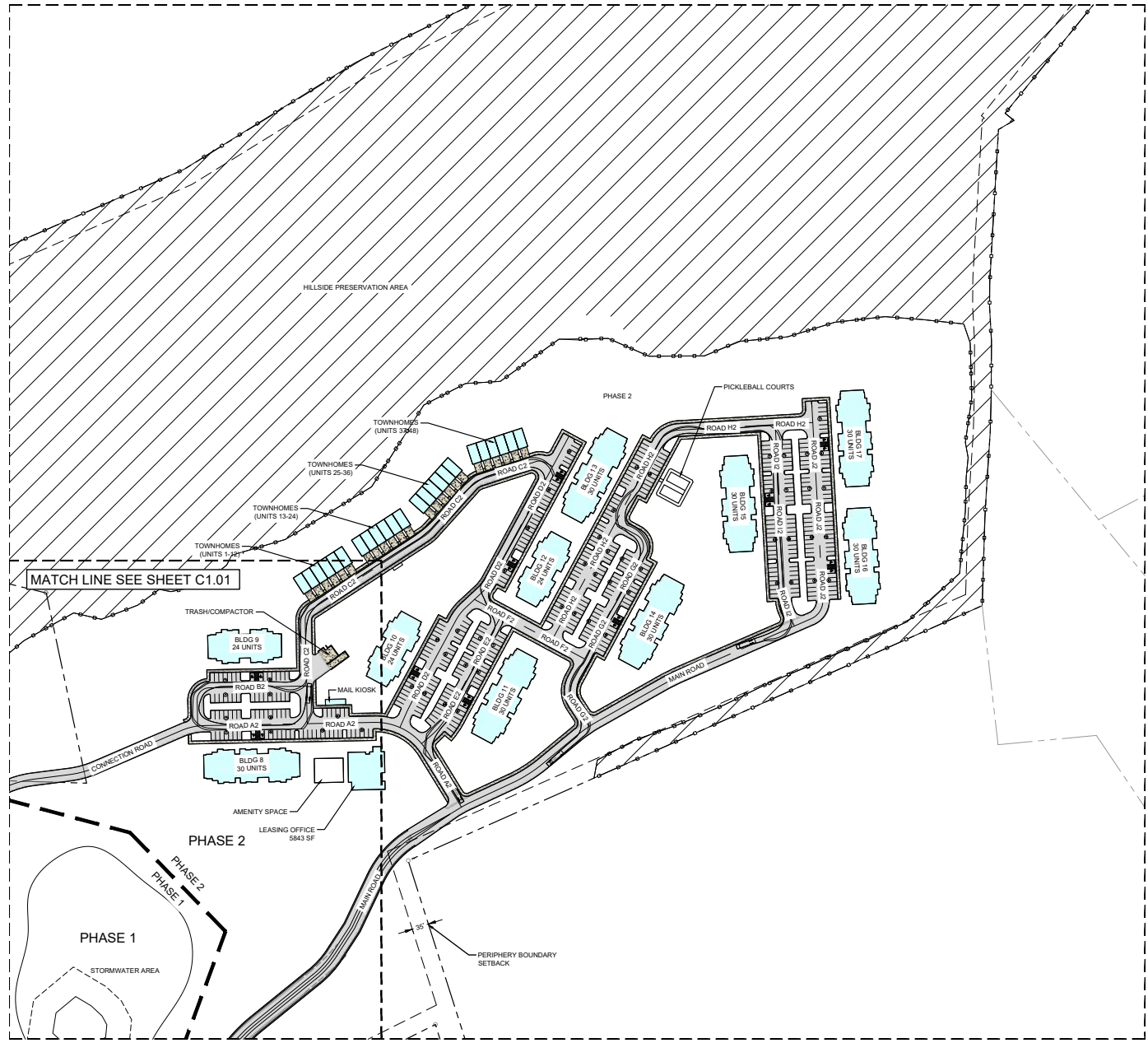
**C1.02**  
FILE NO. 37122-78

**LEGEND**

- CONCRETE SIDEWALK
- HEAVY-DUTY CONCRETE
- ASPHALT PAVEMENT
- PROPOSED BUILDING
- PROTECT EXISTING TREES
- TREE PROTECTION FENCING
- PHASE LINE
- SETBACK LINE
- OVERALL PROPERTY BOUNDARY
- EXISTING PROPERTY LINE

**BUILDING SETBACK REQUIREMENTS**  
PLANNING COMMISSION MAY NOT REQUIRE A SETBACK GREATER THAN THIRTY-FIVE FEET FROM PROJECTIONS

**SIGNAGE STANDARDS**  
ALL SIGNAGE TO FOLLOW CN ZONE STANDARDS



PERMIT NUMBERS:

DATE: NAVD83  
GEOID03

BENCHMARK: 811  
www.ca11.com

SCALE: 1 INCH = 100 FEET

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FILE # 6-C-26-DP

ENLARGED SITE LAYOUT PLAN  
DEVELOPMENT PLAN  
**HORIZON VIEW**  
8703 & 8707 JOE DANIELS ROAD  
KNOXVILLE, TN 37931

NO.	DATE	DESCRIPTION
1	01/23/2024	DEVELOPMENT PLAN

**C1.06**  
FILE NO. 37122-78

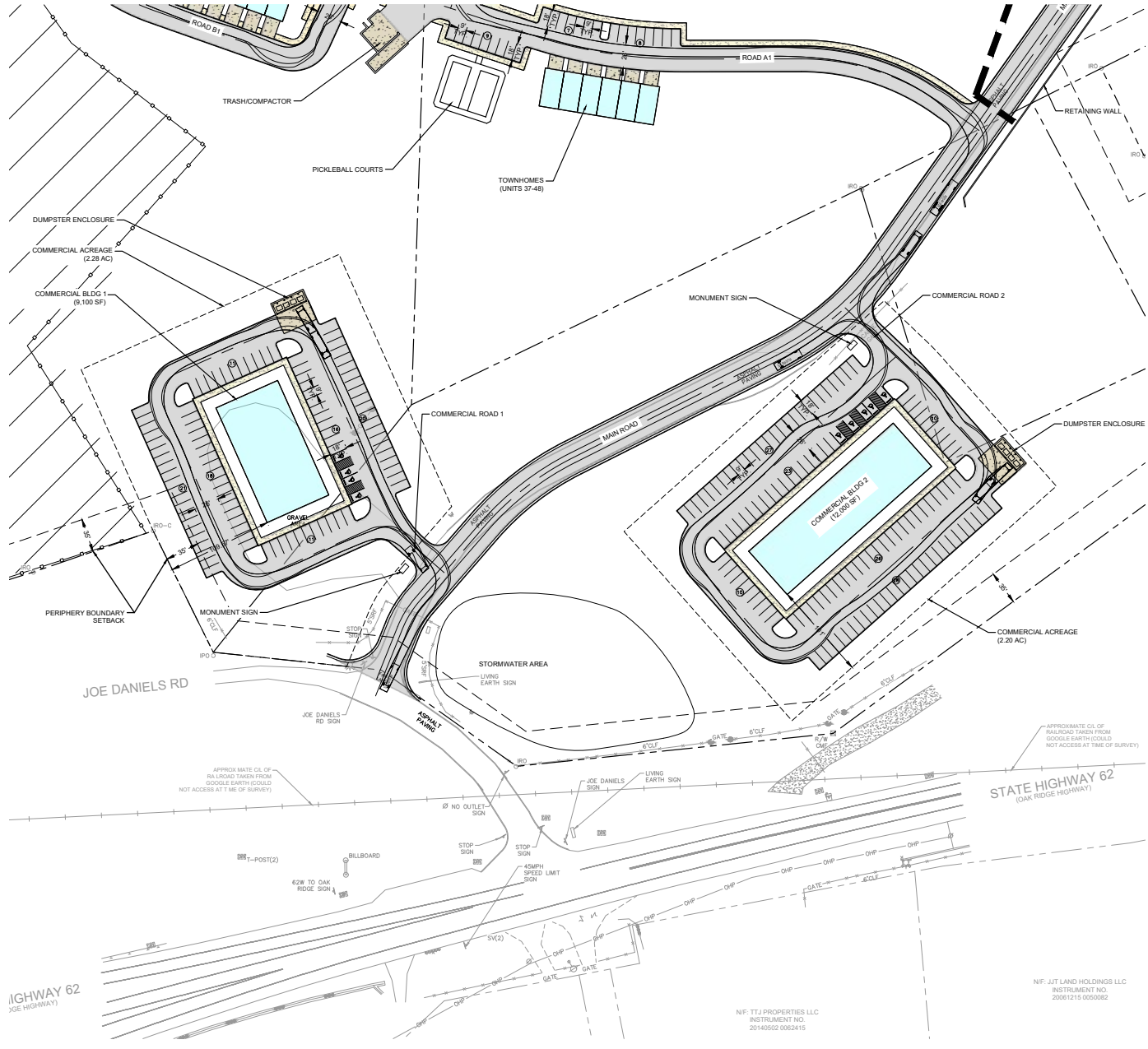
**LEGEND**

- CONCRETE SIDEWALK
- HEAVY-DUTY CONCRETE
- ASPHALT PAVEMENT
- PROPOSED BUILDING
- PROTECT EXISTING TREES
- TREE PROTECTION FENCING
- PHASE LINE
- SETBACK LINE
- OVERALL PROPERTY BOUNDARY
- EXISTING PROPERTY LINE

**BUILDING SETBACK REQUIREMENTS**

PLANNING COMMISSION MAY NOT REQUIRE A SETBACK GREATER THAN THIRTY-FIVE FEET FROM PHASES.

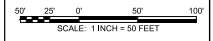
**SIGNAGE STANDARDS**  
ALL SIGNAGE TO FOLLOW ON ZONE STANDARDS



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PERMIT NUMBERS:

DATUM: NAVD83  
GEOID03



NF: TJJ PROPERTIES LLC  
INSTRUMENT NO.  
20140502-0003415

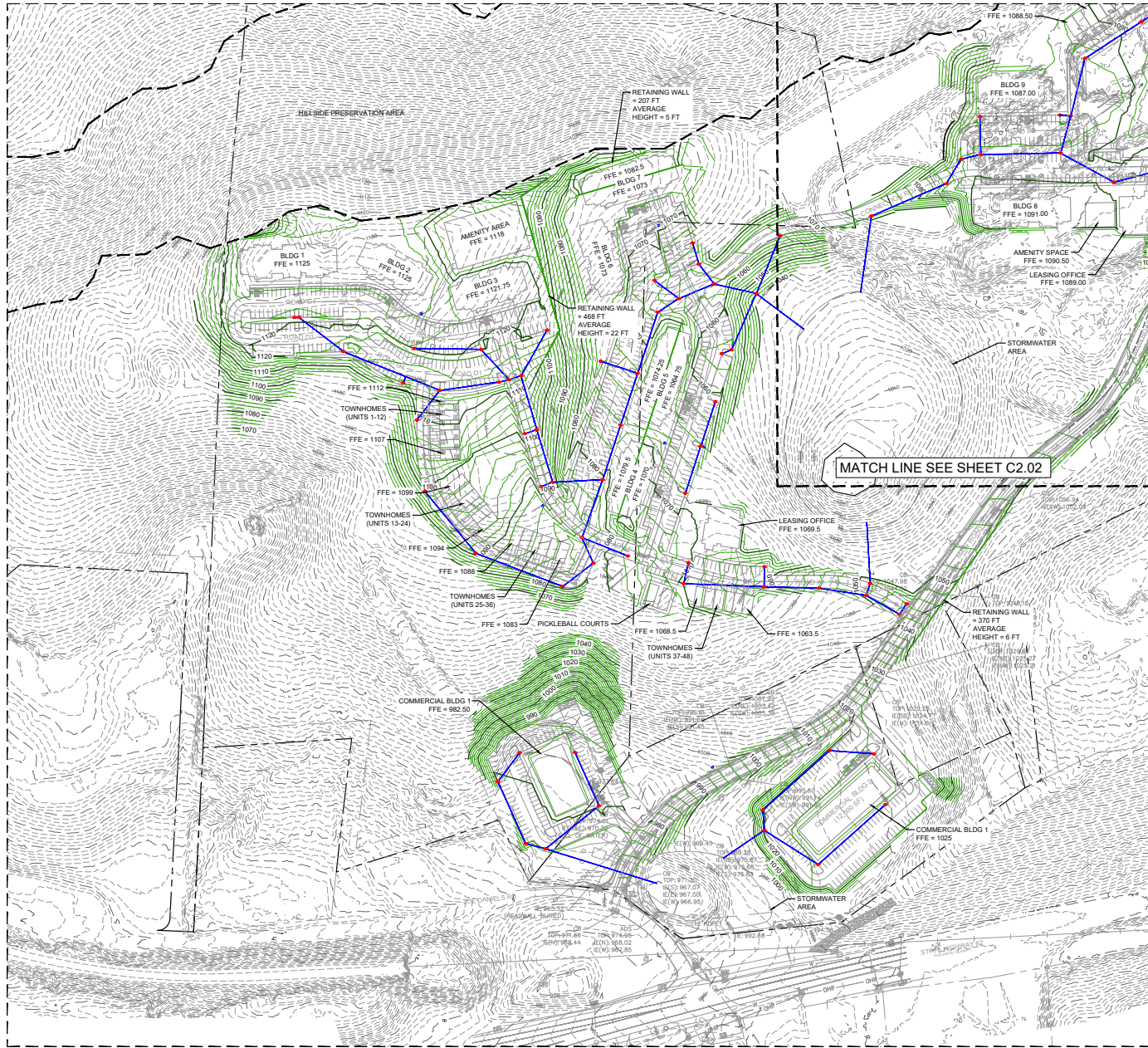
NF: JLT LAND HOLDINGS LLC  
INSTRUMENT NO.  
20081215-0050082

IGHWAY 62  
XOE HIGHWAY)

DATE: 01/23/2024  
FILE: 37122-78-DP-01-23-2024  
DRAWN BY: JTB  
CHECKED BY: JTB  
PROJECT: HORIZON VIEW



DATE: 08/14/2024  
 FILE: 37122.DWG  
 PROJECT: HORIZON VIEW DEVELOPMENT  
 DRAWING: GRADING & DRAINAGE PLAN  
 SHEET: C2.01



**LEGEND**

- 1080 PROPOSED MAJOR CONTOUR
- 1082 PROPOSED MINOR CONTOUR
- 1080 EXISTING MAJOR CONTOUR
- 1082 EXISTING MINOR CONTOUR
- STORM PIPE
- STORM STRUCTURE



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FILE #: 6-C-26-DP

**GRADING & DRAINAGE PLAN**  
 DEVELOPMENT PLAN  
 HORIZON VIEW  
 8703 & 8707 JOE DANIELS ROAD  
 KNOWLEDGE, TN 37081

NO.	DATE	DESCRIPTION
1	08/14/24	DEVELOPMENT PLAN

NO DISTURBANCE PROPOSED WITHIN THE HILLSIDE PROTECTION ZONE.  
 TOTAL DISTURBANCE: 46.44 ACRES

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PERMIT NUMBERS:

DATE:	BENCHMARK:
NAVD83	GEOD03

SCALE: 1 INCH = 100 FEET

**C2.01**  
 FILE NO. 37122-78





PERMIT NUMBERS

DATE: 04/24/18

DESCRIPTION: DEVELOPMENT PLAN

SCALE: 1"=40' (1"=200 FEET)

0' 100' 200' 400'



REV	DR	CHK	DATE	DESCRIPTION
0	BKS	V	04/24/18	DEVELOPMENT PLAN

**OVERALL UTILITY PLAN**

**DEVELOPMENT PLAN**

**HORIZON VIEW**

8703 & 8707 JOE DANIELS ROAD  
 KNOXVILLE, TN 37931

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FILE # 6-C-28-DP



**BARGE**

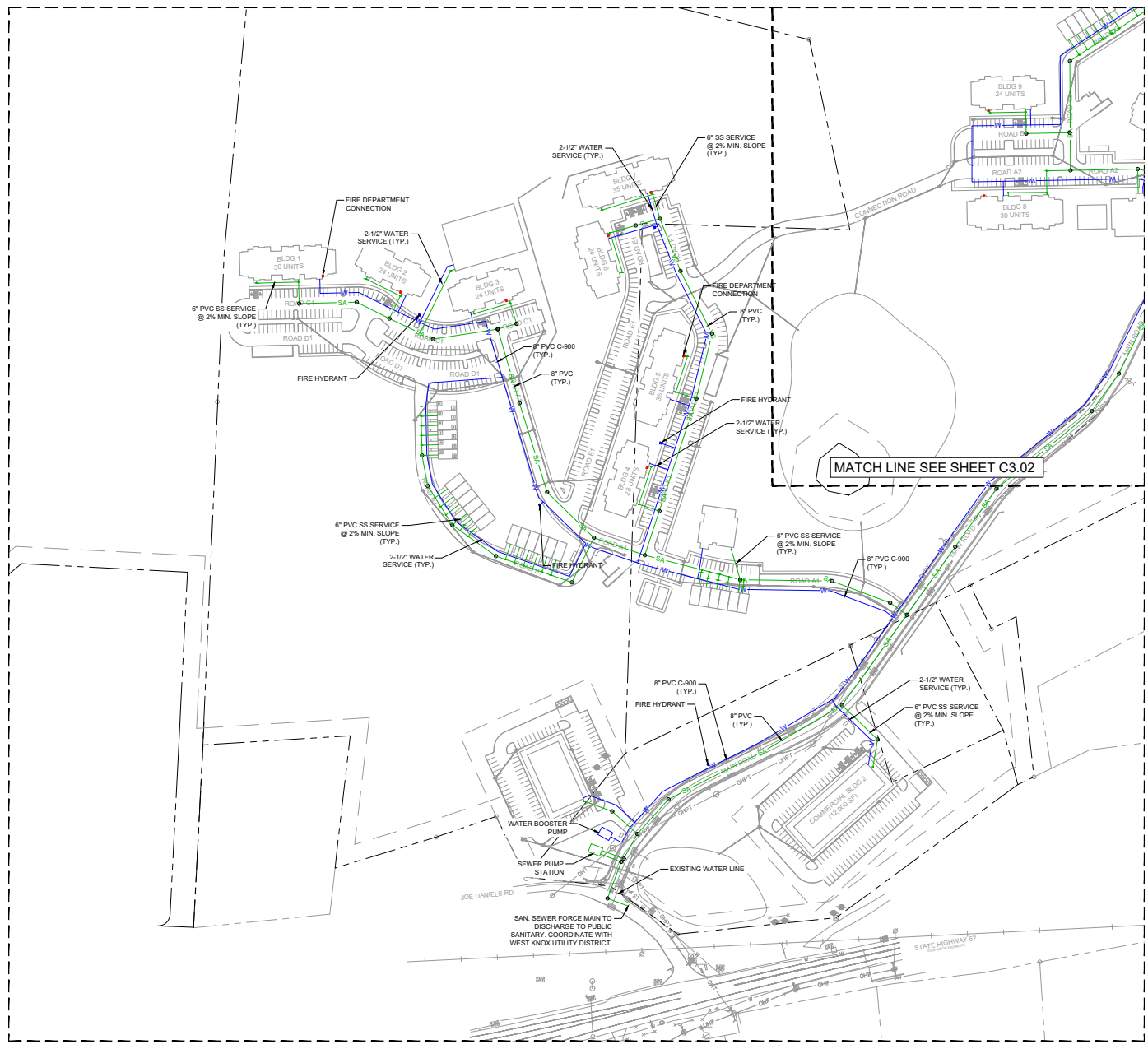
**DESIGN SOLUTIONS**

520 West Summit Hill Drive # Suite 2012 J Knoxville, Tennessee 37902  
 PHONE: 865-637-2910 | FAX: 865-673-8284

FILE NO. 3712278

**C3.00**

DATE: 08/14/2024  
 FILE: 23072024\_FINAL\_CD.DWG  
 DRAWN BY: JTB  
 CHECKED BY: JTB  
 PROJECT: 23072024



**LEGEND**

- SANITARY SEWER MANHOLE
- FIRE HYDRANT
- FIRE DEPARTMENT CONNECTION
- PRIVATE WATER MAIN
- PRIVATE SANITARY SEWER MAIN
- WATER SERVICE
- SANITARY SEWER SERVICE LINE (6" SDR 26 PVC) WITH CLEANOUT

NOTE:  
ALL SANITARY SEWER MAINS AND LATERALS TO BE SDR 26



FOR PLANNING COMMISSION APPROVAL ONLY. NOT TO BE USED FOR CONSTRUCTION.  
FILE #: 6-C-26-DP

UTILITY PLAN  
DEVELOPMENT PLAN  
HORIZON VIEW  
8703 & 8707 JOE DANIELS ROAD  
KNOXVILLE, TN 37931

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GEOID03

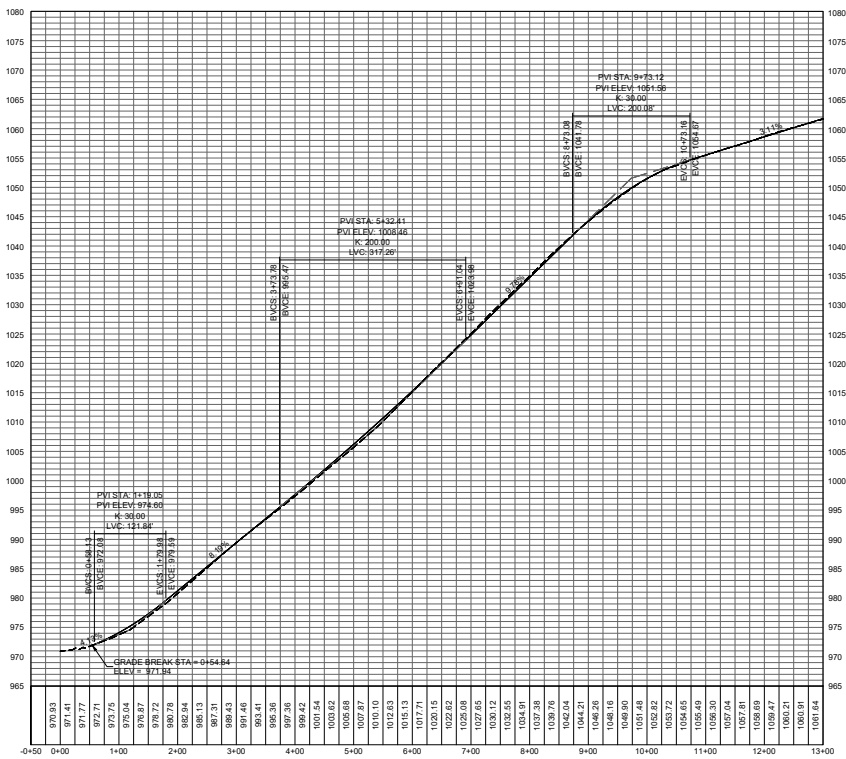
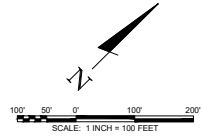
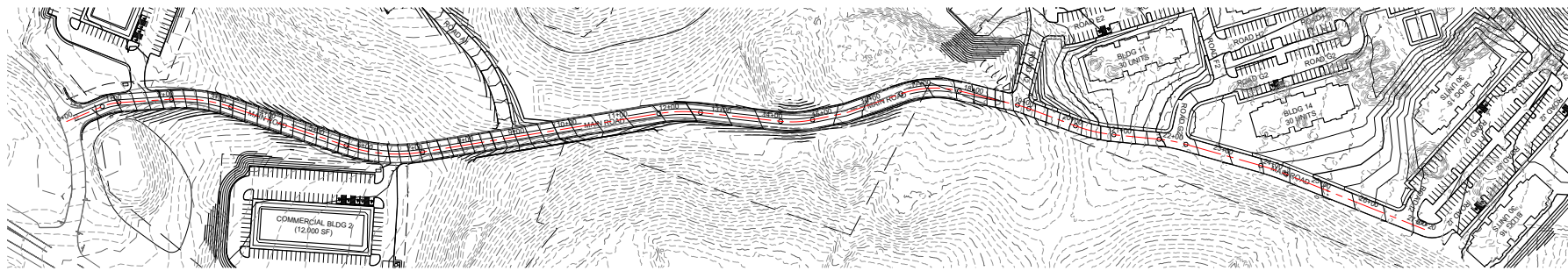
BENCHMARK:

SCALE: 1 INCH = 100 FEET

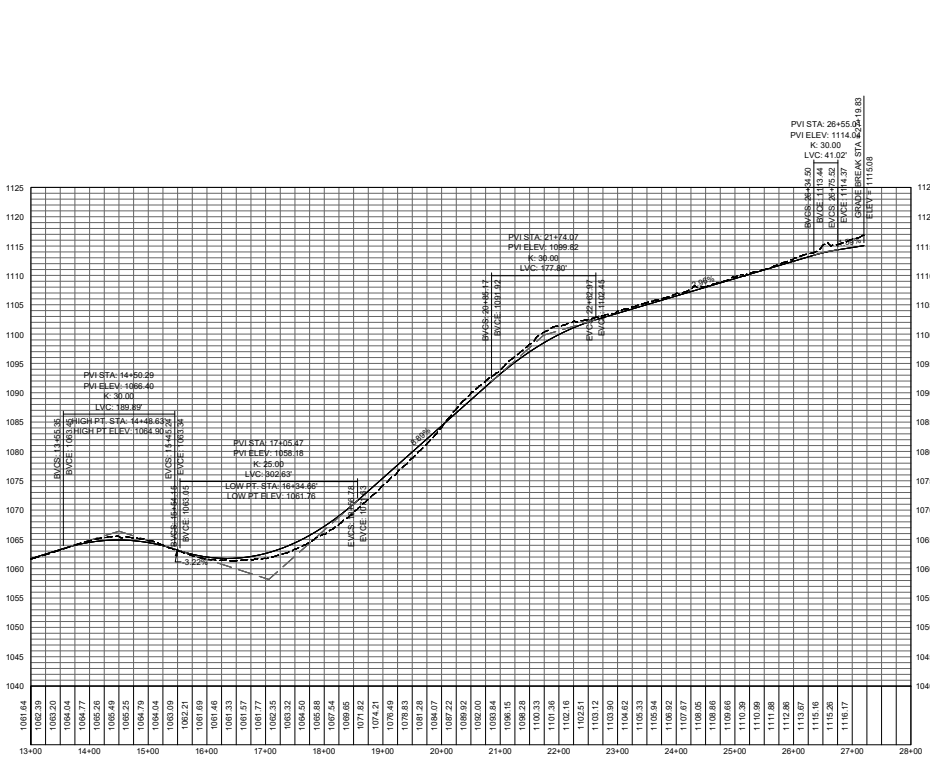
NO.	DATE	DESCRIPTION
1	08/14/2024	DEVELOPMENT PLAN

**C3.01**  
FILE NO. 37122-78





MAIN ROAD PROFILE STA. 0+50 TO 13+00  
SCALE: 1"=50' H  
1"=5' V  
ASSUMED DESIGN SPEED: 30 MPH



MAIN ROAD PROFILE STA. 13+00 TO 28+00  
SCALE: 1"=50' H  
1"=5' V  
ASSUMED DESIGN SPEED: 30 MPH

PREPARED BY: BARGE DESIGN SOLUTIONS  
 FILE # 37122-DP  
 DATE: 08/20/2024  
 PROJECT: 37122-DP

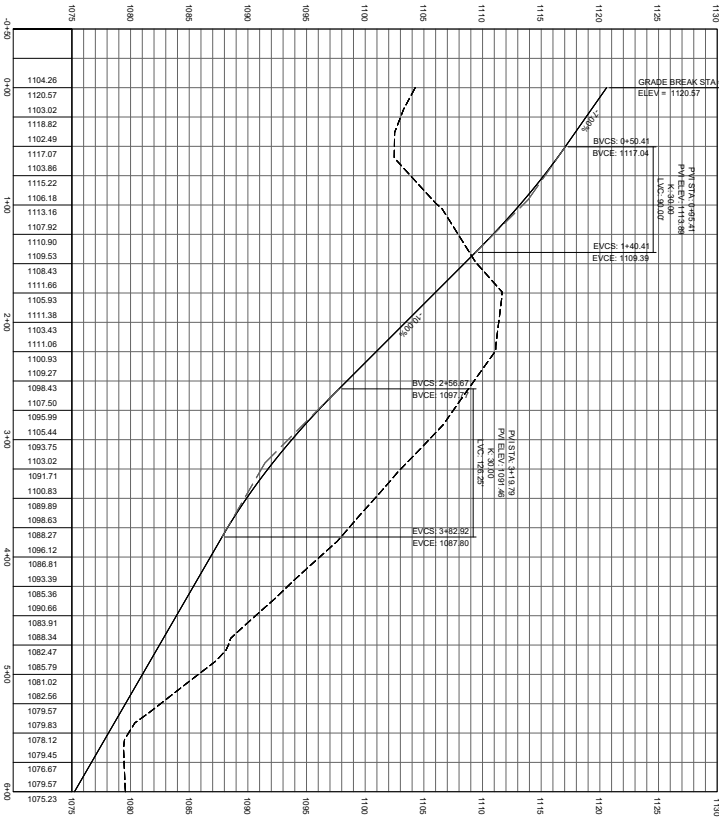


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FILE # 6-C-26-DP

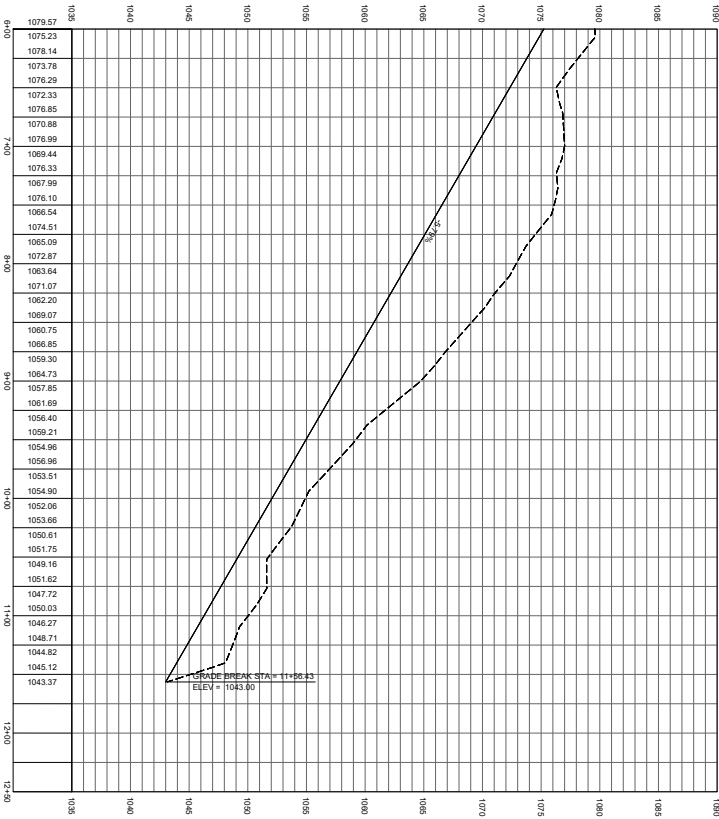
MAIN ROAD PLAN & PROFILE  
DEVELOPMENT PLAN  
HORIZON VIEW  
8703 & 8707 JOE DANIELS ROAD  
KNOXVILLE, TN 37931

REV	DATE	BY	CHK	DESCRIPTION
0				ISSUE FOR CONSTRUCTION

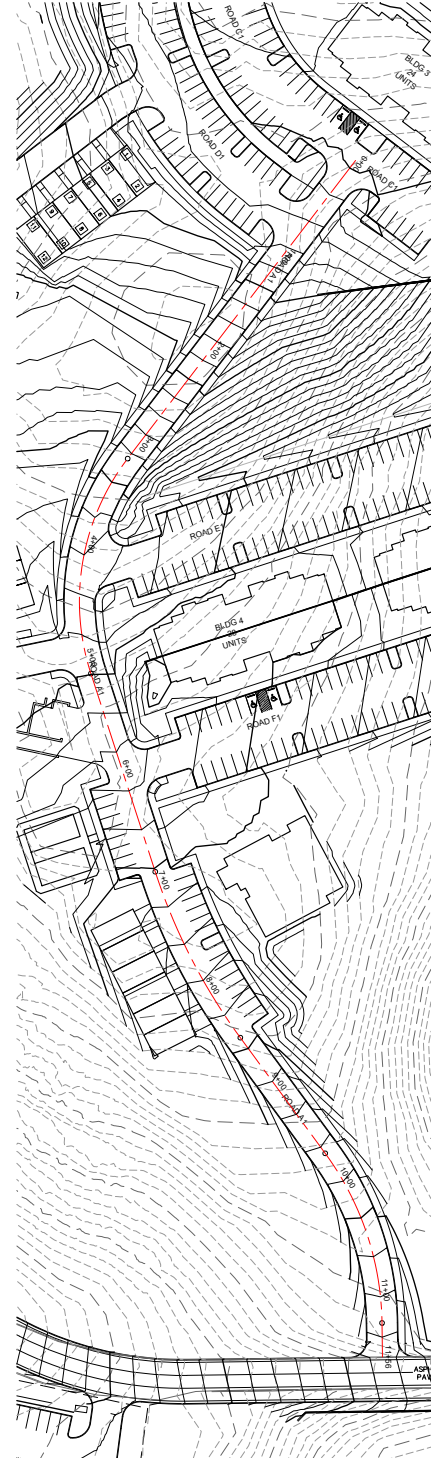
C4.01  
FILE NO. 37122-78



ROAD A1 PROFILE STA. 0+00 TO 6+00  
 SCALE: 1"=50' H  
 ASSUMED DESIGN SPEED: 30 MPH



ROAD A1 PROFILE STA. 6+00 TO 12+50  
 SCALE: 1"=50' H  
 ASSUMED DESIGN SPEED: 30 MPH



REVISION INFORMATION			
REV	DR	CHK	DESCRIPTION
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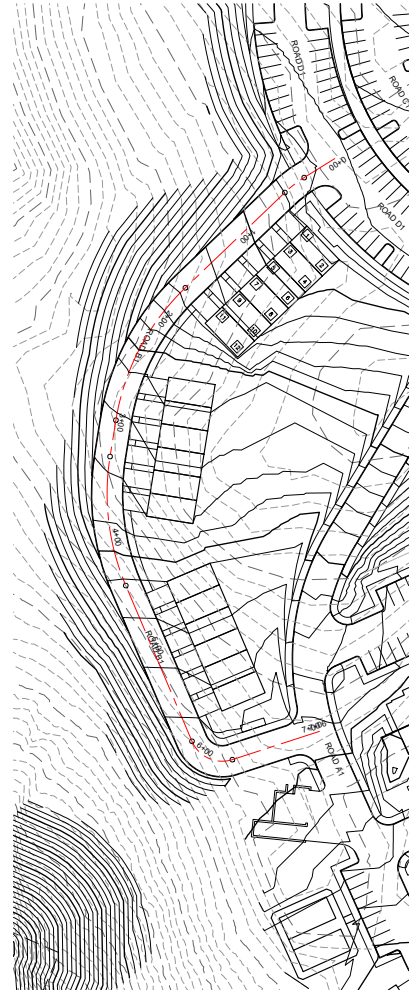
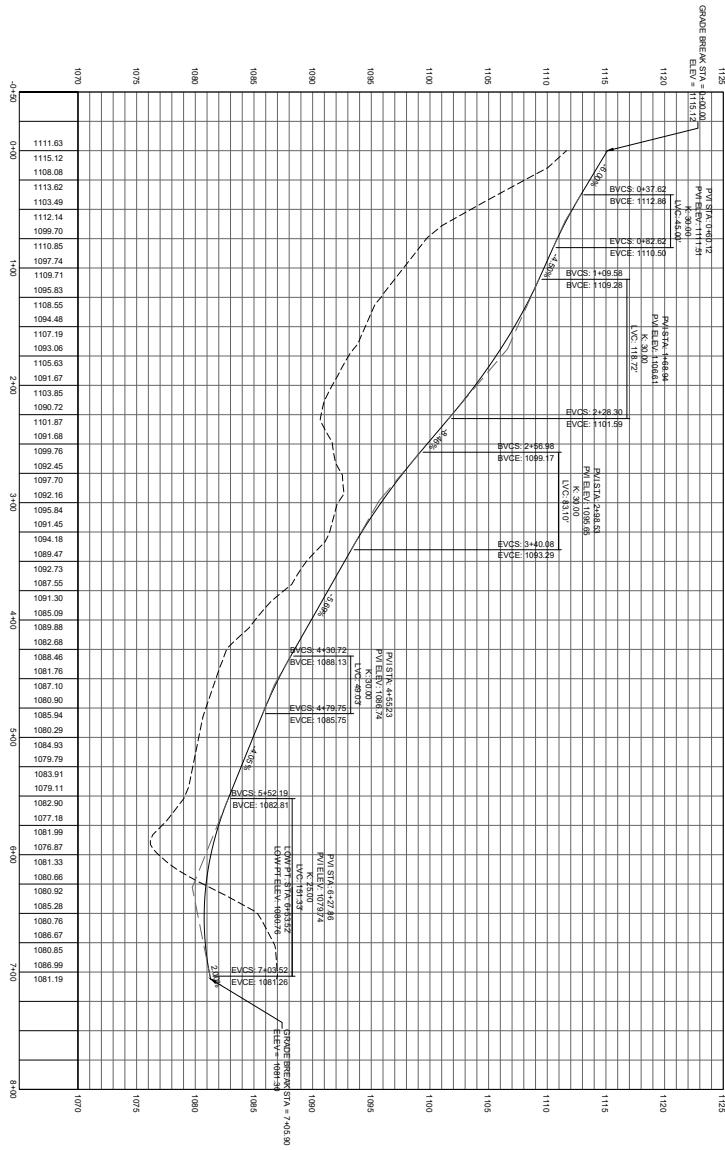
**ROAD A1 PLAN & PROFILE**  
 DEVELOPMENT PLAN  
 HORIZON VIEW  
 8703 & 8707 JOE DANIELS ROAD  
 KNOXVILLE, TN 37931

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 FILE # 6-C-26-DP



500 West Summit Hill Drive # Suite 1002 Knoxville, Tennessee 37902  
 PHONE: 865.629.1313 FAX: 865.629.4584

ROAD B1 PROFILE STA. 0+50 TO 8+00  
 SCALE: 1"=50' H  
 ASSUMED DESIGN SPEED: 30 MPH



FILE NO. 372278  
**C4.03**

REVISION INFORMATION			
REV	DR	CHK	DESCRIPTION
0	BKS	U	DEVELOPMENT PLAN

**ROAD B1 PLAN & PROFILE**  
 DEVELOPMENT PLAN  
 HORIZON VIEW  
 8703 & 8707 JOE DANIELS ROAD  
 KNOXVILLE, TN 37931

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 FILE # 6-C-28-DP



**BARGE**  
 DESIGN SOLUTIONS  
 500 West Summit Hill Drive # Suite 2022 J Knoxville, Tennessee 37902  
 PHONE: 865.627.0110 FAX: 865.627.0184













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LANDSCAPE DETAILS  
DEVELOPMENT PLAN  
HORIZON VIEW  
8703 & 8707 JOE DANIELS ROAD  
KNOXVILLE, TN 37931

NO.	DATE	DESCRIPTION

L7.02  
FILE NO. 37122-78

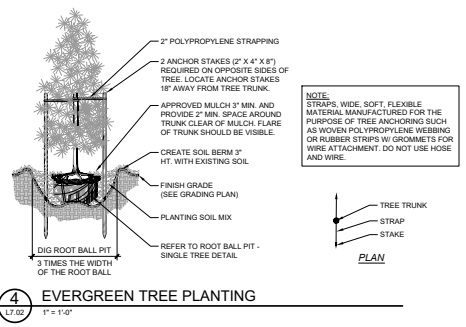
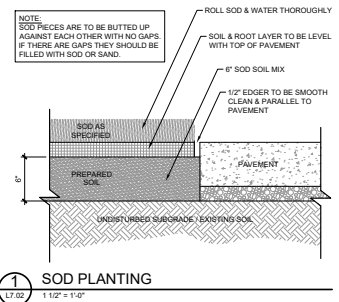
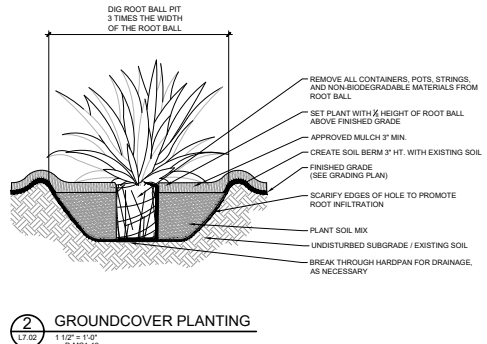
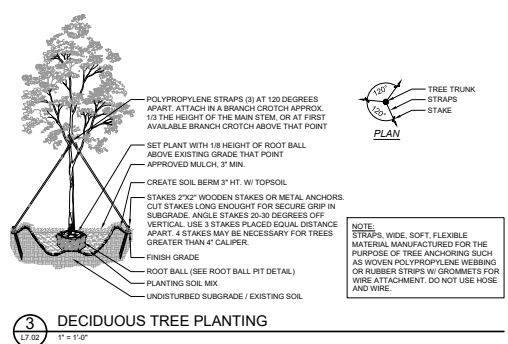
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PERMIT NUMBERS:

DATUM:  
NAVD83  
GEOID03

BENCHMARK:  
811

SCALE: 1 INCH = 100 FEET





DEVELOPMENT PLAN  
ROADWAY AND SITE LIGHTING  
DESIGN NARRATIVE - HORIZON VIEW

BY: Thomas Williams



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## EXECUTIVE SUMMARY

### 1.0 INTRODUCTION

The Horizon View project consists of a proposed new development that will include internal roadways, pedestrian walkways, parking areas, and associated site infrastructure. The purpose of the roadway and site lighting design is to provide safe, functional, and energy-efficient illumination for vehicular and pedestrian circulation throughout the development. The lighting system is intended to enhance nighttime visibility, improve safety for motorists and pedestrians, and provide consistent illumination along the internal roadway network, parking areas, and adjacent walkways.

Lighting and facility design for the buildings indicated on these concept plans shall be excluded; however, architectural lighting will be incorporated as part of the individual building designs (by others), including façade lighting and required egress illumination.

### 2.0 DESIGN CRITERIA

The lighting design for the Horizon View development has been developed in accordance with industry accepted site lighting practices and recommended illumination levels for low-volume roadways within private developments.

- The roadway lighting system along the primary development roadway is designed to achieve an average maintained horizontal illumination level between **0.5 and 1.0 foot-candles (fc)** along the driving surface.
- Lighting systems located within parking lots and in proximity to mixed-use buildings shall achieve an average maintained horizontal illumination level between **1 and 2 foot-candles (fc)**.

These illumination ranges provide adequate visibility while maintaining an efficient lighting system that minimizes glare and excessive light spill.

### 2.1 BASIS OF DESIGN – ROADWAY LIGHTING

The basis of design for the primary roadway lighting system utilizes the following components:

- **Pole Height:** 25-foot mounting height
- **Luminaire:** Lithonia DSX0 LED roadway luminaire
- **Distribution Type:** Type III (forward throw distribution suitable for roadway and pathway applications)
- **Color Temperature:** 3000K LED
- **Mounting Configuration:** Pole-mounted luminaires along the roadway corridor

The Lithonia DSX0 fixture has been selected for its energy efficiency, durability, and optical performance. The Type III distribution provides a forward-throw lighting pattern well suited for roadway applications where fixtures are located along one side or staggered along both sides of the roadway.

Typical spacing between poles shall be approximately **80 feet**, allowing light to effectively reach across travel lanes and adjacent pedestrian areas while maintaining controlled light levels and reducing unnecessary spill light.

Final lighting fixtures may be altered or substituted with comparable fixtures that provide similar performance characteristics and optical distribution. Street lighting will be powered from various load centers distributed throughout the development.

## **2.2 BASIS OF DESIGN – PARKING LOT AND SITE LIGHTING**

Lighting for parking areas, residential streets, and mixed-use portions of the development will utilize a similar LED lighting approach designed to provide safe and uniform illumination while maintaining a pedestrian-friendly scale.

The basis of design for parking lot and site lighting includes:

- **Pole Height:** 20-foot mounting height
- **Luminaire:** Lithonia DSX0 (or approved equal)
- **Distribution Type:** To be determined based on final layout and photometric analysis (anticipated Types III, IV, or V as appropriate)
- **Color Temperature:** 3000K LED
- **Mounting Configuration:** Pole-mounted luminaires throughout parking and site circulation areas

Final luminaire distribution types will be selected during the detailed design phase to provide appropriate light coverage for parking stalls, internal drive aisles, and pedestrian circulation areas while maintaining uniformity and minimizing glare. Final lighting fixtures may be altered or substituted with comparable fixtures that provide similar performance characteristics and optical distribution.

Parking lot lighting will be powered from the electrical system of the associated building that the parking area serves. These systems will include provisions for emergency lighting where required to satisfy applicable egress and life safety requirements.

### 2.3 BASIS OF DESIGN – BUILDING LIGHTING

Lighting for building exteriors, entry conditions, and adjacent outdoor areas will utilize a coordinated LED lighting approach that enhances architectural character while providing safe and effective illumination for occupants and visitors. The design emphasizes a balance between decorative façade lighting, secure egress illumination, and general-purpose downlighting, all at a pedestrian-friendly scale. Overall, building-mounted lighting will be relatively minimal in comparison to site lighting; outside of required egress and localized architectural applications, the majority of site illumination will be provided by the pole-mounted fixtures previously described.

The basis of design for exterior building-mounted lighting includes:

- **WP1 – Lithonia WMCL4**  
This fixture will be used as an architectural cylinder luminaire at primary building entries and along decorative façade elements. It will provide up/down or directional accent lighting (as applicable) to highlight vertical surfaces, enhance wayfinding, and contribute to the overall visual identity of the development.
- **WP2 – Lithonia WPX2**  
This forward-throw wall pack will be utilized for egress pathways, service areas, and select building perimeters requiring enhanced security lighting. The fixture distribution will be selected to provide adequate horizontal and vertical illumination while minimizing glare and light trespass.
- **D1 – Gotham 6"Wet Rated Downlight**  
These recessed downlights will be installed in soffits and covered exterior conditions, including balconies and entry overhangs. They will provide general ambient lighting with a clean, integrated appearance suitable for residential and mixed-use applications.

#### General Design Criteria:

- **Color Temperature:** 3000K LED throughout for a warm, cohesive appearance
- **Mounting Conditions:** Wall-mounted and soffit-integrated fixtures coordinated with architectural elements. Exact mounting heights, locations, and outputs to be determined in detailed design phase.
- **Lighting Performance:** Designed to achieve appropriate illumination levels for entries, balconies, and egress paths while maintaining visual comfort and minimizing glare
- **Controls:** Fixtures will be controlled via building lighting control systems, including photocells and/or timeclock scheduling for energy efficiency and code compliance

Final fixture configurations, optical distributions, and mounting details will be refined during the detailed design phase to ensure appropriate light levels, visual comfort, and compliance with applicable codes and standards. Equivalent fixtures may be considered, provided they meet the design intent and performance requirements

## 2.4 POLE PLACEMENT AND SPACING

Light poles along the primary roadway will generally be spaced to achieve the target illumination levels while maintaining uniform lighting conditions. The approximate spacing between poles will be **80 feet on center**, with final spacing and placement verified through photometric analysis during the detailed design phase.

Poles throughout the site will be positioned to minimize conflicts with driveways, sidewalks, utilities, landscaping, and other site features while maintaining consistent coverage of roadway, parking, and pedestrian areas.

## 2.5 LIGHTING CONTROLS AND EFFICIENCY

All luminaires will utilize LED technology with a **3000K color temperature**, providing a warm white light that enhances visual comfort while reducing harsh glare often associated with higher color temperatures. LED fixtures offer long service life, reduced maintenance requirements, and improved energy efficiency compared to traditional lighting sources.

Fixtures will be controlled through integral photocells that automatically activate lighting during low ambient light conditions and deactivate the system during daylight hours.

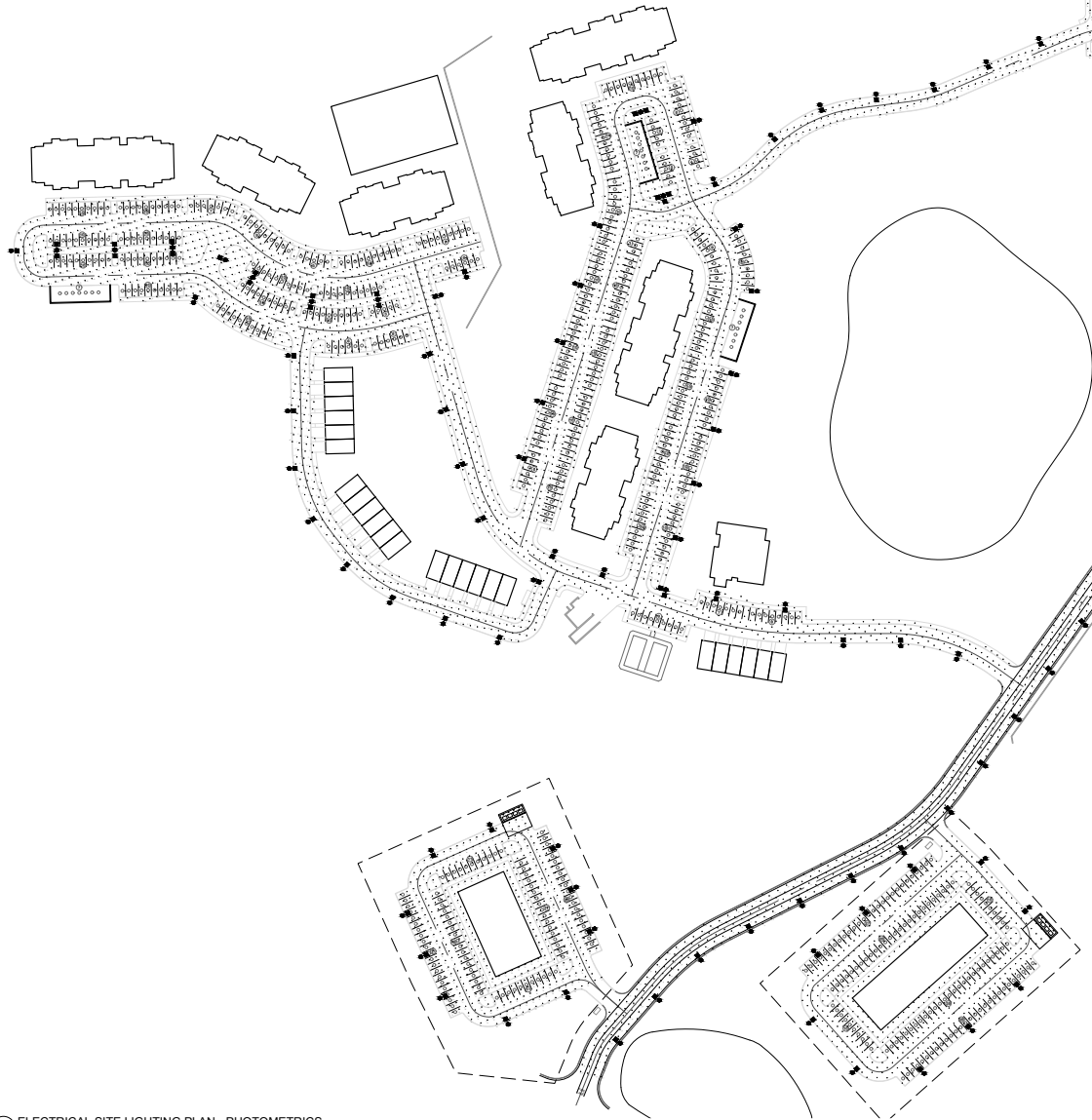
## 2.6 GLARE, LIGHT TRESPASS, AND SHIELDING CONSIDERATIONS

Lighting throughout the development will be positioned and aimed at minimizing light trespass onto adjacent properties and buildings. Where feasible, luminaires will be oriented away from building facades and directed toward roadways, parking areas, and pedestrian paths to maintain effective illumination while reducing unwanted light spill.

In areas where fixtures are located near buildings or property boundaries, house-side shielding will be incorporated as necessary to further control light distribution and limit glare and spill light. These measures help maintain nighttime visual comfort for residents and occupants while preserving overall lighting performance.

# **APPENDIX A – CONCEPT DRAWINGS**





NO.	DESCRIPTION	DATE	BY	CHKD	APP'D
1	ISSUED FOR PERMIT	08/20/2025	J. BARGE	J. BARGE	J. BARGE
2	REVISED PER PLAN COMMENTS	08/20/2025	J. BARGE	J. BARGE	J. BARGE
3	REVISED PER PLAN COMMENTS	08/20/2025	J. BARGE	J. BARGE	J. BARGE
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13	REVISED PER PLAN COMMENTS	08/20/2025	J. BARGE	J. BARGE	J. BARGE
14	REVISED PER PLAN COMMENTS	08/20/2025	J. BARGE	J. BARGE	J. BARGE
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19	REVISED PER PLAN COMMENTS	08/20/2025	J. BARGE	J. BARGE	J. BARGE
20	REVISED PER PLAN COMMENTS	08/20/2025	J. BARGE	J. BARGE	J. BARGE

MATCHLINE  
SEE SHEET ES102

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1 ELECTRICAL SITE LIGHTING PLAN - PHOTOMETRICS

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PERMIT NUMBERS:

DATUM: NAVD83  
GEOID03

BENCHMARK:

SCALE: 1 INCH = 80 FEET

0' 40' 80' 160'

**BARGE**  
DESIGN SOLUTIONS

603 SHAWNEE DRIVE, SUITE 200, KNOXVILLE, TN 37931  
PH: 615.584.1111 FAX: 615.584.1112



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ELECTRICAL SITE LIGHTING PLAN - PHOTOMETRICS  
DEVELOPMENT PLAN  
HORIZON VIEW  
8707 JOE DANIEL RD.  
KNOXVILLE, TN 37931

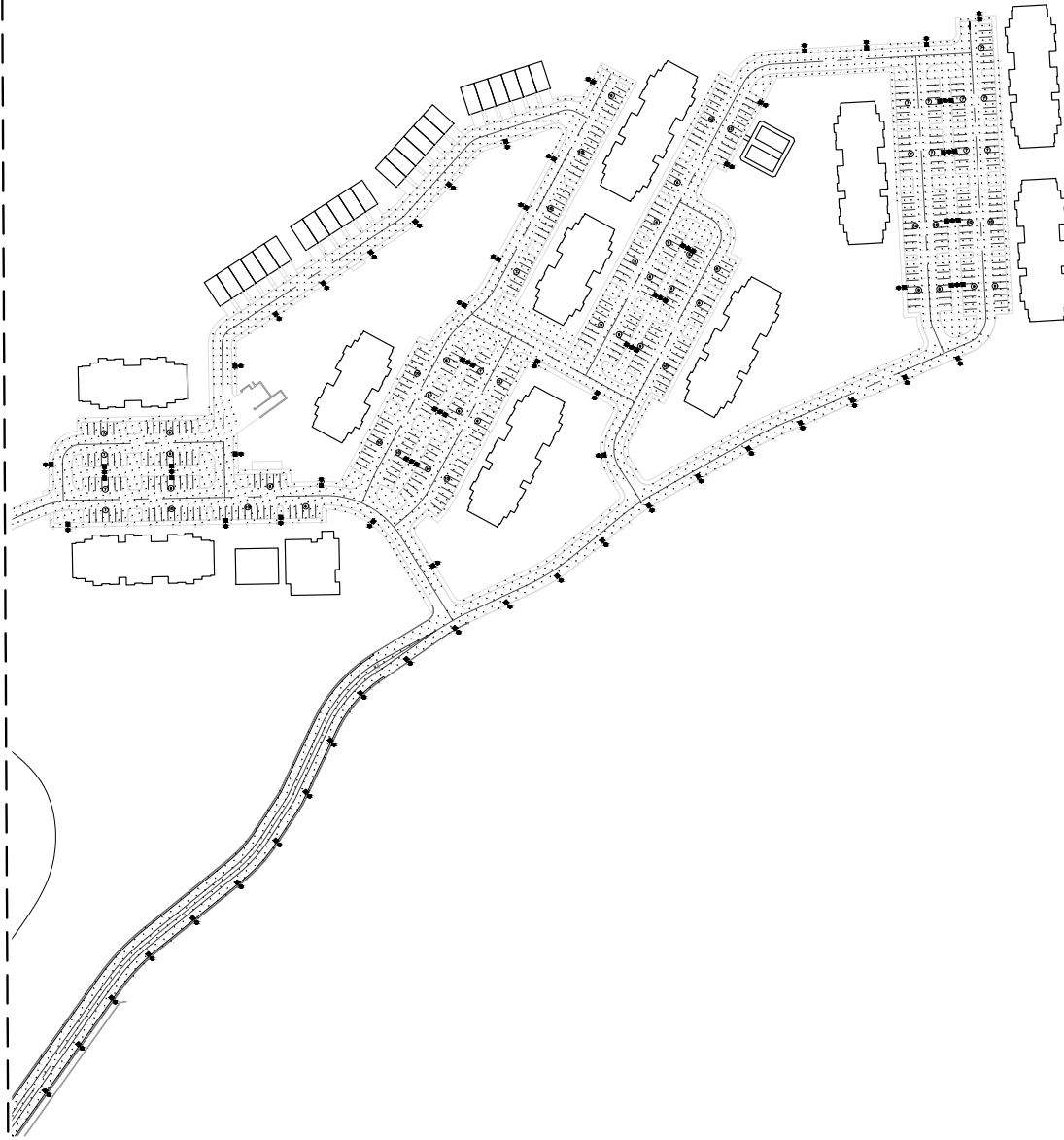
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20	REVISED PER PLAN COMMENTS	08/20/2025	J. BARGE	J. BARGE	J. BARGE

ES101  
FILE NO. 37122-78

UNRECORDED LUMENS  
FILED BY: J. BARGE  
DATE: 08/20/2025  
PROJECT: 37122-78

ES102.dwg  
 8/15/2025 10:30 AM  
 8/15/2025 10:30 AM  
 8/15/2025 10:30 AM

MATCHLINE  
 SEE SHEET ES101



① ELECTRICAL SITE LIGHTING PLAN - PHOTOMETRICS

ITEM	DESCRIPTION	QUANTITY	UNIT	PRICE	TOTAL
1	10' TALL STREET LIGHT	10	EA	150.00	1500.00
2	15' TALL STREET LIGHT	5	EA	200.00	1000.00
3	20' TALL STREET LIGHT	3	EA	250.00	750.00
4	25' TALL STREET LIGHT	2	EA	300.00	600.00
5	30' TALL STREET LIGHT	1	EA	350.00	350.00
6	40' TALL STREET LIGHT	1	EA	450.00	450.00
7	50' TALL STREET LIGHT	1	EA	550.00	550.00
8	60' TALL STREET LIGHT	1	EA	650.00	650.00
9	70' TALL STREET LIGHT	1	EA	750.00	750.00
10	80' TALL STREET LIGHT	1	EA	850.00	850.00
11	90' TALL STREET LIGHT	1	EA	950.00	950.00
12	100' TALL STREET LIGHT	1	EA	1050.00	1050.00
13	110' TALL STREET LIGHT	1	EA	1150.00	1150.00
14	120' TALL STREET LIGHT	1	EA	1250.00	1250.00
15	130' TALL STREET LIGHT	1	EA	1350.00	1350.00
16	140' TALL STREET LIGHT	1	EA	1450.00	1450.00
17	150' TALL STREET LIGHT	1	EA	1550.00	1550.00
18	160' TALL STREET LIGHT	1	EA	1650.00	1650.00
19	170' TALL STREET LIGHT	1	EA	1750.00	1750.00
20	180' TALL STREET LIGHT	1	EA	1850.00	1850.00
21	190' TALL STREET LIGHT	1	EA	1950.00	1950.00
22	200' TALL STREET LIGHT	1	EA	2050.00	2050.00
23	210' TALL STREET LIGHT	1	EA	2150.00	2150.00
24	220' TALL STREET LIGHT	1	EA	2250.00	2250.00
25	230' TALL STREET LIGHT	1	EA	2350.00	2350.00
26	240' TALL STREET LIGHT	1	EA	2450.00	2450.00
27	250' TALL STREET LIGHT	1	EA	2550.00	2550.00
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29	270' TALL STREET LIGHT	1	EA	2750.00	2750.00
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70	680' TALL STREET LIGHT	1	EA	6850.00	6850.00
71	690' TALL STREET LIGHT	1	EA	6950.00	6950.00
72	700' TALL STREET LIGHT	1	EA	7050.00	7050.00
73	710' TALL STREET LIGHT	1	EA	7150.00	7150.00
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86	840' TALL STREET LIGHT	1	EA	8450.00	8450.00
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89	870' TALL STREET LIGHT	1	EA	8750.00	8750.00
90	880' TALL STREET LIGHT	1	EA	8850.00	8850.00
91	890' TALL STREET LIGHT	1	EA	8950.00	8950.00
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99	970' TALL STREET LIGHT	1	EA	9750.00	9750.00
100	980' TALL STREET LIGHT	1	EA	9850.00	9850.00
101	990' TALL STREET LIGHT	1	EA	9950.00	9950.00
102	1000' TALL STREET LIGHT	1	EA	10050.00	10050.00



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ELECTRICAL SITE LIGHTING PLAN - PHOTOMETRICS  
 DEVELOPMENT PLAN  
 HORIZON VIEW  
 8707 JOE DANIEL RD.  
 KNOXVILLE, TN 37931



PERMIT NUMBERS:

DATUM: NAVD83 GEOD03

BENCHMARK:

SCALE: 1 INCH = 80 FEET

80' 40' 0' 80' 160'

NOT FOR CONSTRUCTION

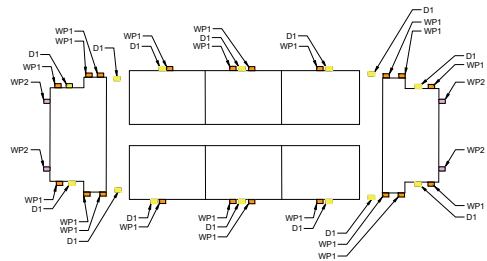
ES102  
 FILE NO. 37122-78



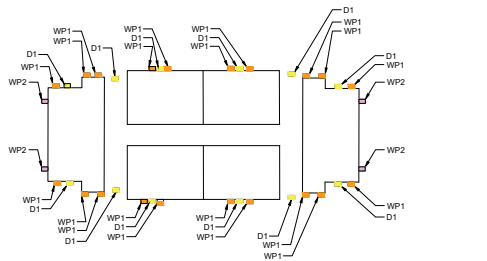
FOR PLANNING COMMISSION APPROVAL ONLY. NOT TO BE USED FOR CONSTRUCTION.

ELECTRICAL LIGHTING PLANS - BUILDINGS  
DEVELOPMENT PLAN  
HORIZON VIEW  
8707 JOE DANIEL RD.  
KNOXVILLE, TN 37931

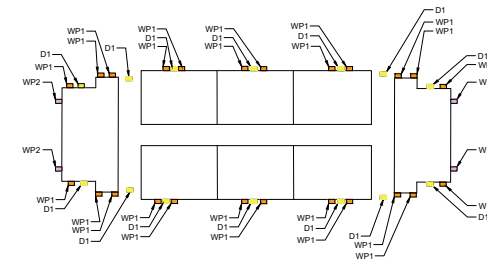
**GENERAL NOTES:**  
1. LIGHTING LAYOUT IS CONCEPTUAL. REFER TO ARCHITECTURAL DRAWINGS AND ELEVATIONS FOR ADDITIONAL DETAILS. FINAL CONSTRUCTION MAY VARY AND IS SUBJECT TO THE FINALIZED BUILDING DESIGN.



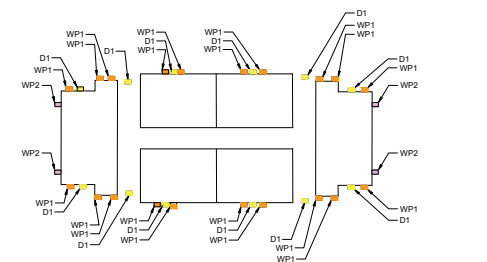
1 LIGHTING - BUILDING TYPE 'A'



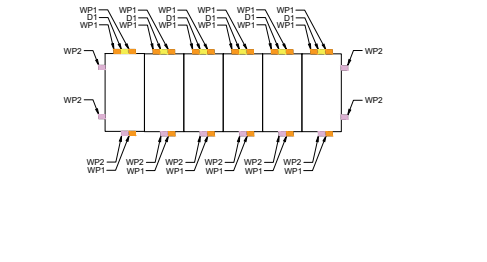
2 LIGHTING - BUILDING TYPE 'B'



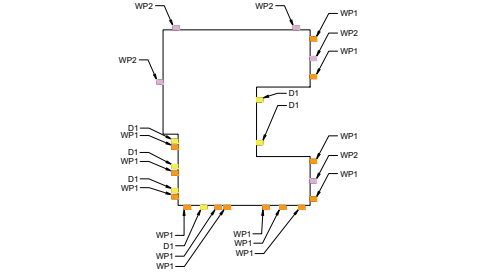
3 LIGHTING - BUILDING TYPE 'C'



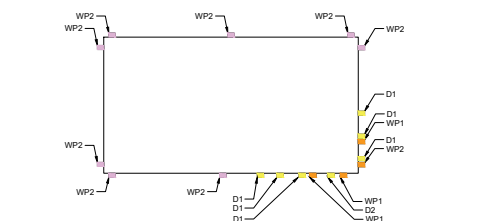
4 LIGHTING - BUILDING TYPE 'D'



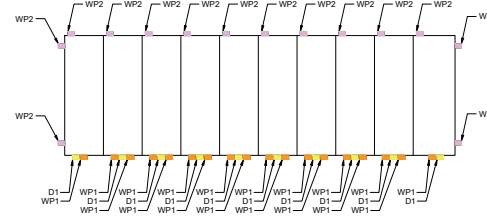
5 LIGHTING - TOWNHOUSES



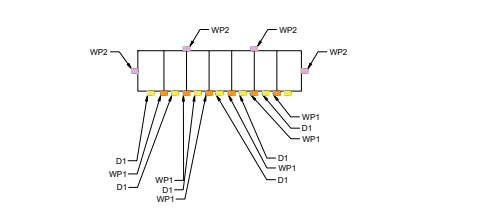
6 LIGHTING - LEASING OFFICE



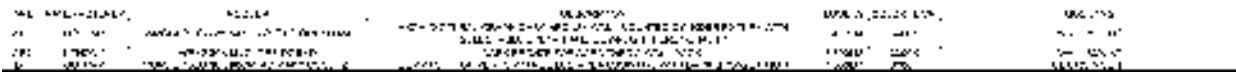
7 LIGHTING - COMMERCIAL BUILDING '1'



8 LIGHTING - COMMERCIAL BUILDING '2'



9 LIGHTING - GARAGE BUILDINGS



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PERMIT NUMBERS:  
DATUM:  
NAVD83  
GEOID03  
BENCHMARK:  
SCALE: 1 INCH = 80 FEET

NOT FOR CONSTRUCTION

ES103  
FILE NO. 37122-78

# **APPENDIX B – CUTSHEETS AND BROCHURES**



# D-Series LED Area Luminaires

Next Level Area Lighting Solutions

**FIXTURES:  
A1,A2,A3**





## A New Standard of Excellence and Performance

For over 10 years, the legacy D-Series family has been a favorite of industry professionals for use on exterior lighting projects. Now, the fully redesigned D-Series, is once again changing the game and bringing area lighting to a new level of excellence and performance.

D-Series blends seamlessly into any environment with its continuous body design and combination of fully integrated nLight® AIR network controls to create a refined and contemporary look while providing the lumens you need.

## D-Series LED Area Luminaire Family

An unmatched combination of features, options, and performance to take your design to the next level.

Available in three sizes with excellent scale to mounting height ratios, the D-Series family can meet the full range of application requirements and your projects most demanding needs.



**DSX2**  
20,000 to 60,000 lumens

**DSX1**  
7,000 to 35,000 lumens

**DSX0**  
5,000 to 21,000 lumens

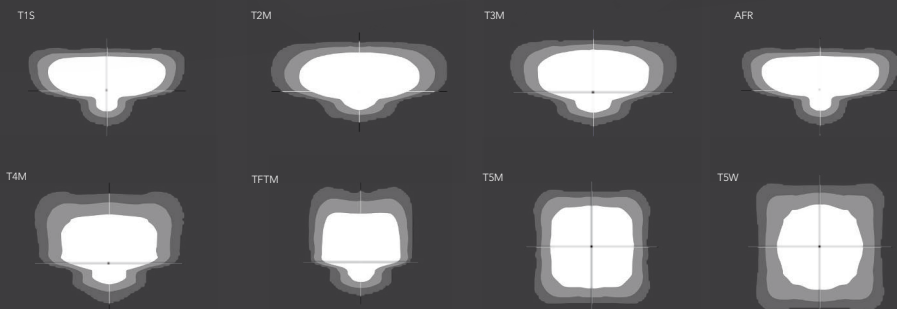


## Leading-Edge Optical Performance

Fifteen distribution patterns offering designers everything needed to effectively illuminate even the most challenging sites. The D-Series precision-designed optics provide wider pole spacings, superior uniformity and unmatched corner and backlight control near property lines.

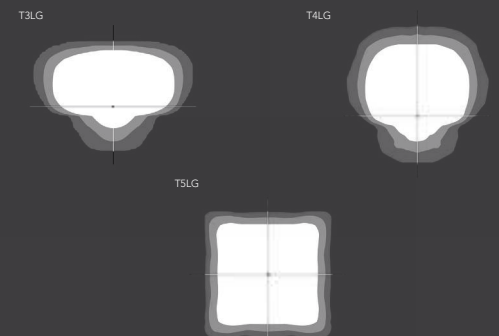
### Standard Optics

Largest light patterns that maximize pole spacings and provide exceptional uniformity.



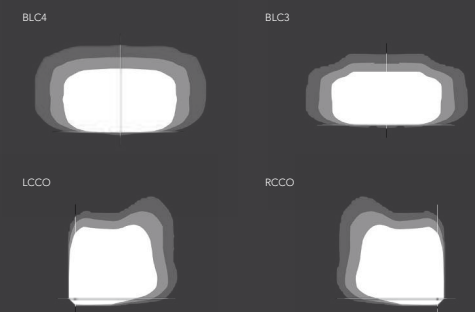
### Low G Optics

Controls high angle light and maximizes lumens while maintaining a Low G in the BUG rating.



### Backlight and Corner Control Optics

Unmatched corner and backlight control solutions for applications where precision control is required behind the pole, at property lines and perimeters.





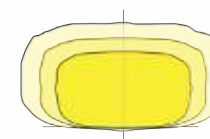
## Backlight Control

The state-of-the-art BLC optics reduce light behind poles while providing excellent forward and lateral projection. Poles can be strategically placed near adjacent property or boundary lines while achieving optimal curb line results.

### D-Series BLC Backlight Control Benefits

- As little as 0.5% of total light behind pole
- Shortest distance to zero foot-candles
- BUG – B=0 with up to 43,000 lumens

BLC4



## Ultimate Configurability

Exterior lighting demands a product that can perform and be configured to exact needs. The fully configurable D-Series provides the necessary standard features and a large breadth of key options allowing industry professionals to tailor their designs to the needs of the project.

### Configurations

- Three sizes offering 5,000 to 60,000 lumens for front-to-back site design
- Fifteen photometric distributions provide solutions for a large array of standard and specialty applications
- Large range of standard CCT's available: 2700K/3000K/3500K/4000K/5000K
- Standard 70/80 CRI and optional 90 CRI
- Four standard colors with textured and non-textured finish and over 120 RAL colors and custom match options available

### Features and Specialty Options

- Durable and long-lasting silicone lens is resistant to elements and will not yellow
- Integral arm universal mount option fits a range of pole drillings
- Optional added corrosion protection for applications in coastal areas
- Two amber LED solutions available including turtle-friendly
- Solar configurations offer ability to reduce carbon footprint and placement of luminaires in remote areas

### Control Options

- NLTAIR2 PIRHN: nLight® AIR network based wireless controls offering group dimming
- PIR: Integral motion/ambient sensor
- DS: Dual switching provides luminaire wired with two circuits allowing for 50/50 operation
- BL30/BL50: Integral bi-level dimming device allows for a second circuit to switch the luminaire to either 30% or 50% light output
- FAO: Field adjustable output device allows dimming through an internal switch



### nLight™

- Site-wide controls solution
- Motion sensing dusk-to-dawn photocontrol
- Wireless grouping
- Smart phone commissioning

From a trusted brand with over 75 years of lighting history, discover what's next with the all-new D-Series from Lithonia Lighting®.





To learn more about D-Series Area Luminaires,  
visit [www.LithoniaLighting.com](http://www.LithoniaLighting.com)



Join the conversation - follow us on social media.



## IVO™ Shallow Recessed Downlight

### Small in Size, Big in Impact

The next generation of downlighting starts with the shallowest recessed downlight family that fits in any space as shallow as 2-inches, while pushing the boundaries that goes beyond fitting into tight ceiling spaces.

### Empowering Better Lighting

- Introducing our new perfect color consistency as a standard option which will lead the industry with a 0.5-step MacAdam ellipse from fixture to fixture.
- Proprietary optics coupled with an advanced light engine and Bounding Ray™ Optical Design delivers a true uniformed, batwing distribution for smooth illumination and a comfortable experience for occupants in the space.

### Low Profile with Ease of Installation

- This compact downlight is designed to fit into spaces as shallow as 2" of plenum depth fitting a 4" aperture, or 3.5" of plenum depth fitting a 6" aperture.
- Even in tight spaces, installation is effortless from below the ceiling with LED quick connects and patented constant tension springs.

### Experience Unlimited Adaptability

- Interchangeable trims and optics are designed for field-serviceability from below the ceiling with our twist and lock mechanism.
- Choose between remodel and new construction installation in a 4" and 6" aperture size in round or square, open cone or lensed wall wash, and flange or flangeless in a variety of finishes and trim colors.

### Sizeable Performance

- This compact downlighting family delivers up to 3,000 lumens from a 4-inch aperture, and up to 5,000 lumens from a 6-inch aperture.
- Supports universal dimming to 1% through 0-10V, 120V Triac, and ELV protocols, and is available with nLight® wired or wireless lighting controls to further enhances control options.

### FIXTURE: D1



New Construction



Remodel

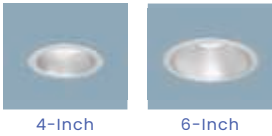
## Empowering Better Lighting

Achieving perfect color consistency is essential for creating visually appealing and harmonious environments in architectural spaces. It ensures that every light source seamlessly matches in color temperature, enhancing overall aesthetics and providing a high-quality and uniform illumination experience across various applications. IVO™ will set a new industry standard with a 0.5-step MacAdam ellipse rather than a 3-step MacAdam ellipse among typical specification downlights.



## Unlimited Adaptability & Sizeable Performance

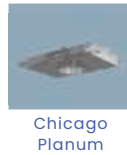
### Size



### Flange Style



### Other



### Color Temperature



### Lumen Output

500LM | 750LM | 1000LM | 1500LM  
2000LM | 2500LM | 3000LM  
3500LM (6") | 4000LM (6") | 5000LM (6")

### Color Rendering

80CRI | 90CRI  
95+CRI

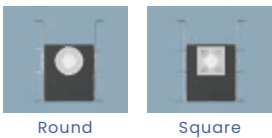
### Distributions

- Medium (0.8)
- Medium Wide (1.0)
- Wide (1.2)

### Control Options

- Dimming from 10%, 1% and 0.1%
- MVOLT, 120V, 277V, 347V (integral)
- Drivers ZT, EZT, DMX, DALI, EVL
- nLight®, nLight® AIR

### Shape



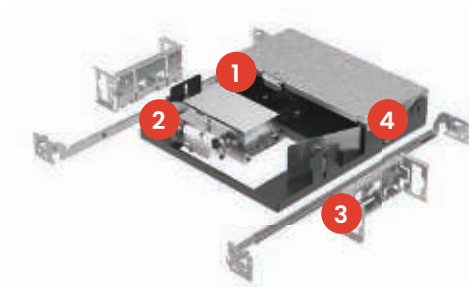
### Function



### Emergency Battery Backup Options

- Integral 6W Emergency Battery

## Keeping a Low Profile With Ease of Installation



1. Patent pending locking mechanism holds driver in place and enables ease of serviceability.
2. Easy access to driver which is on sled with a guiding tab to allow for easy insert.
3. Easy to use access door to store wiring and lock in place.
4. Junction box design with extra room for ease in wiring.



1. The junction box hinge unites driver box with junction box and hinges to allow driver box to easily get through ceiling openings with plenum height restriction as shallow as 2".
2. Junction box design with extra room for ease in wiring.



1. Self contained springs create consistent force that pulls the module and trim against the ceiling for a secure installation experience.
2. Optics and trims are easily field interchangeable using a twist lock mechanism.
3. Strain relief connection and enhance flexibility of the whip enable ease of movement while protecting light engine wires.



## WMCL Wall Mount Cylinders, 4" and 6"

**FIXTURE:  
WP1**

### 36 Configurations, One Lighting Solution

Lithonia Lighting® WMCL Wall Mount Cylinders seamlessly blend style and function, offering 36 configurations in one SKU for customizable, effortless illumination.

Available in two sizes—WMCL4 (2,400 lumens) and WMCL6 (4,700 lumens)—these cylinders provide optimal lighting for residential and commercial projects alike. Built-in switches allow you to choose light direction—up, down, or both, color temperature and an on/off photocell, giving you full control. Luminaire is rated IP66 to ensure longevity even during harsh conditions.

Designed for walkways, entryways, or general illumination, WMCL Wall Mount Cylinders deliver a tailored, professional wall mount lighting solution.

#### Features & Benefits:

- Easily adjust lighting direction with a built-in switch to choose Up, Down, or Both
- Switchable CCT of 3000K, 4000K and 5000K for adaptable lighting
- Available in 45° and 75° beam angles to suit various applications
- Integrated dusk-to-dawn functionality with a built-in photocell for automatic operation
- Optional emergency battery backup for reliable illumination during power outages



# WMCL Wall Mount Cylinders, 4" and 6"

## Switchable Features for Customizable Illumination

With Lithonia Lighting® Wall Mount Cylinders, you can effortlessly customize your lighting to suit any space. The switchable options for color temperature, lighting direction, and photocell functionality make it easy to adapt to any application, ensuring the perfect light for every environment.



Catalog Number	Size	Wattage	Lumens @50K	LPW	Beam Spread	Color	CCT	Voltage	Photocell	Emergency Battery	CI Code	Lead Time
WMCL4 P1 SWW2 A45 UVOLT PE DDBXD M4	4"	19	2,479	130	45°	Dark Bronze	30K 40K 50K	UVOLT	On/Off	No	2877PY	Stock
WMCL6 P1 SWW2 A45 UVOLT PE DDBXD M4	6"	31	4,728	153	45°	Dark Bronze	30K 40K 50K	UVOLT	On/Off	No	2877R1	Stock
WMCL4 P1 SWW2 A75 UVOLT PE DDBXD M4	4"	19	2,433	128	75°	Dark Bronze	30K 40K 50K	UVOLT	On/Off	No	2903FT	Stock
WMCL6 P1 SWW2 A75 UVOLT PE DDBXD M4	6"	31	4,520	146	75°	Dark Bronze	30K 40K 50K	UVOLT	On/Off	No	2903FU	Stock
WMCL4 P1 SWW2 A75 MVOLT PE E4WC DDBXD M4	4"	19	2,479	130	75°	Dark Bronze	30K 40K 50K	MVOLT	On/Off	Yes	291271	10 Days
WMCL6 P1 SWW2 A75 MVOLT PE E4WC DDBXD M4	6"	31	4,520	146	75°	Dark Bronze	30K 40K 50K	MVOLT	On/Off	Yes	291273	10 Days
WMCL4 P1 SWW2 A45 MVOLT PE E4WC DDBXD M4	4"	19	2,433	128	45°	Dark Bronze	30K 40K 50K	MVOLT	On/Off	Yes	291277	10 Days
WMCL6 P1 SWW2 A45 MVOLT PE E4WC DDBXD M4	6"	31	4,728	153	45°	Dark Bronze	30K 40K 50K	MVOLT	On/Off	Yes	29127G	10 Days



FIXTURE:  
WP2

# WPX LED Full Cut-off Wall Packs

Customer Training – July 2020

---



Note: Product Specifications subject to change without notice.



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## Elevator Pitch – Architectural Looks at Stock Prices

LED wall packs provide significant energy-savings when replacing existing HID wall packs. To date, your customers have had to sacrifice aesthetics and performance in order to get the desired low initial cost. The Lithonia Lighting® WPX family of LED wall packs is the only solution that meets customers' need for an aesthetically appealing form, photometric performance and low initial cost. The result are installations that your customers can be proud of for both their sustainability and their architecture.

With three sizes and lumen packages of 1,550 – 9,200 lumens the Lithonia Lighting® WPX family is a site-wide solution, replacing up to 400W HID wall packs. And since the WPX footprints are larger than that of typical HID glass wall packs, they fully cover unsightly stains, resulting in a neat application without the need for additional patch and repair. Emergency egress battery, photocell, CCT and finish options make the WPX configurable to meet the needs of any application.

The Lithonia Lighting® WPX is the new standard in wall-mounted lighting providing customers with the architectural form and photometric performance they want at the low initial cost they need.





# The Lithonia Lighting® WPX Story: Features and Benefits Video





## Lithonia WPX LED Wall Packs



*The Better Distributor Stock Solution*





## A Complete Wall Pack Solution



	WPX1 P1	WPX1 P2	WPX2	WPX3
Lumen Output	1,550	2,900	6,000	9,200
Input Power	11W	24W	47W	69W
Efficacy	136	121	127	133
HID Replacement	35W - 70W	100W - 175W	250W	400W
Dimensions	11.1" x 8.1" x 3.2"	11.1" x 8.1" x 3.2"	12.3" x 9.1" x 4.1"	13" x 9.5" x 5.5"

- Architectural design
- Covers HID wall pack stains
- Superior illumination
- Easy to install
- Integral emergency battery options
- DLC Listed
- Affordably priced
- Always in stock





## Lithonia WPX – Better Wall-Mounted Lighting

### Architectural Design:

Clean lines seamlessly blend with the architecture of any building

### More Options:

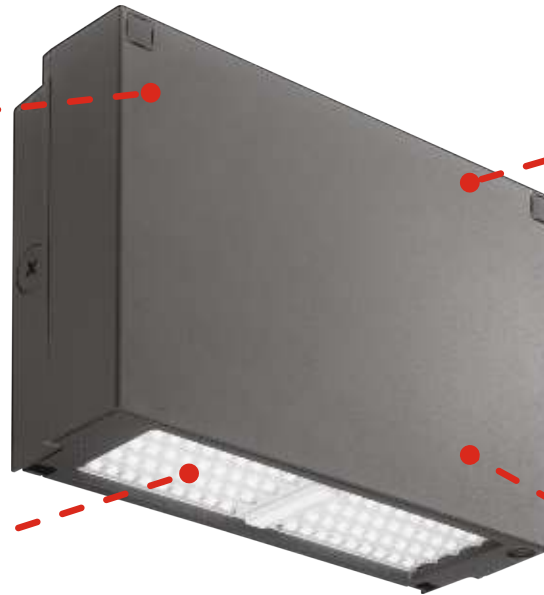
CCT, photocell, emergency egress battery options

### Better Illumination:

Wider spacing and less glare than COB-based products

### Easy to Install:

Integrated wiring compartment, Footprint covers stains



Clean lines and a simple geometric shape is preferred by lighting designers and architects.





A uniform, wide lighting distribution provides an illumination upgrade with greater luminaire spacing.



## Better Illumination

- Wide, uniform distribution; Great for HID replacement and value engineered design-build
- LED array for minimal glare and visually pleasing illumination; No high intensity chip-on-board LEDs that cause discomfort glare

# The Better Solution for HID Glass Wall Pack Replacement



## LED Glass Wall Packs

- Decades-old HID design
- Covers the stains
- Unwanted uplight - not cut-off



## Yesterday's Solution

- Dated finned aesthetic
- Does not cover stains
- COB is extremely glary

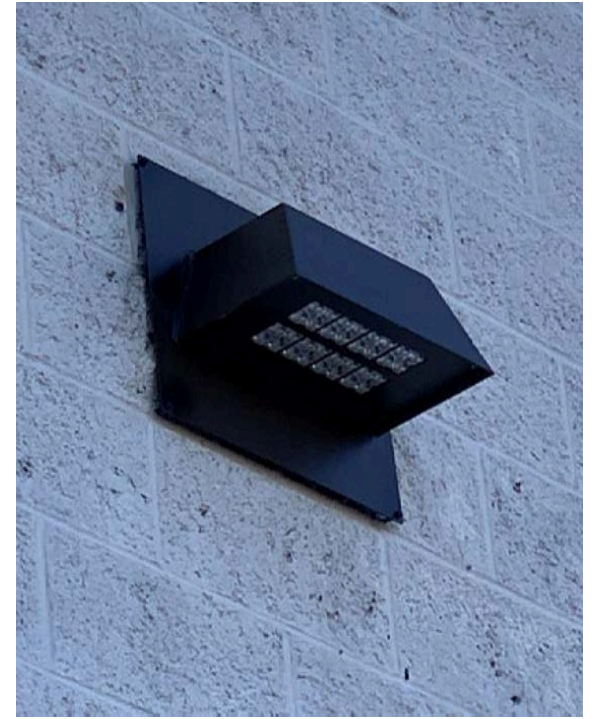


## Lithonia WPX

- Architectural design
- Fully covers the stains
- Superior illumination



## The Better Solution for HID Glass Wall Pack Replacement





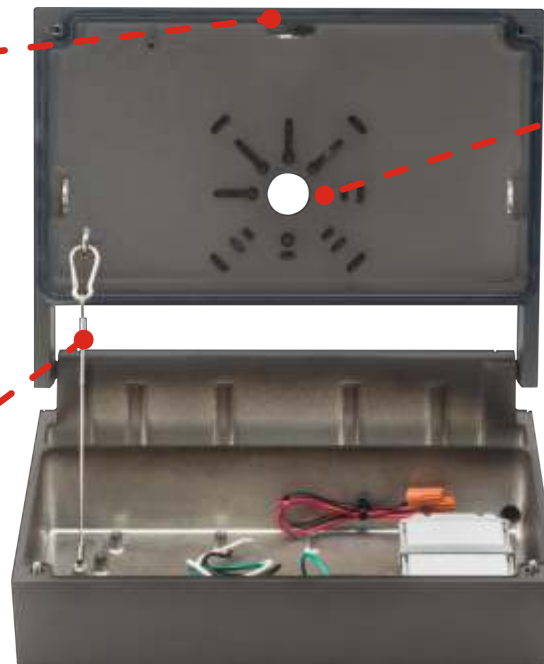
## Easy Installation

Three integral ½" NPT threaded conduit hubs for surface conduit

Contractor-friendly tether holds the WPX during installation

Mounts directly over standard recessed or surface-mount junction boxes

Emergency egress battery option is self-contained





## Easy Installation



1. Remove and set aside the beauty plugs. Loosen the screws. Detach the front half of the luminaire.



2. WPX installs directly on junction boxes, or with poke-through wiring.



3. Mount the back plate using the junction box screw hole pattern.



4. Attach the front half using the cable and hook.



5. Make connections in the integral wiring compartment.



6. Close the luminaire. Fasten the screws, replace beauty plugs. Your WPX wall pack is ready to use!

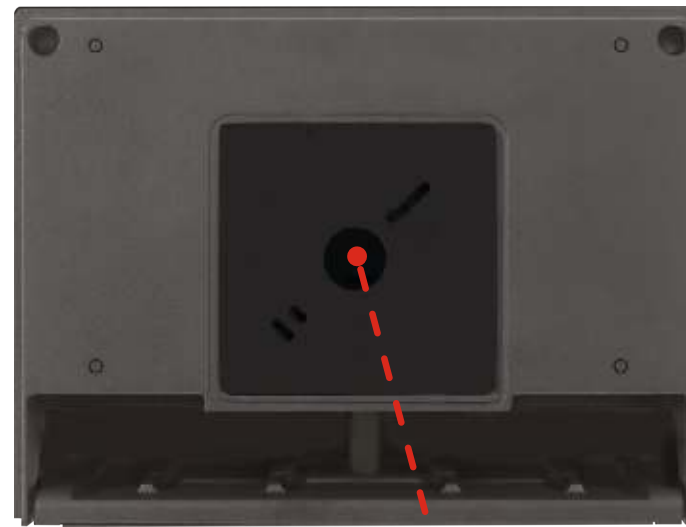
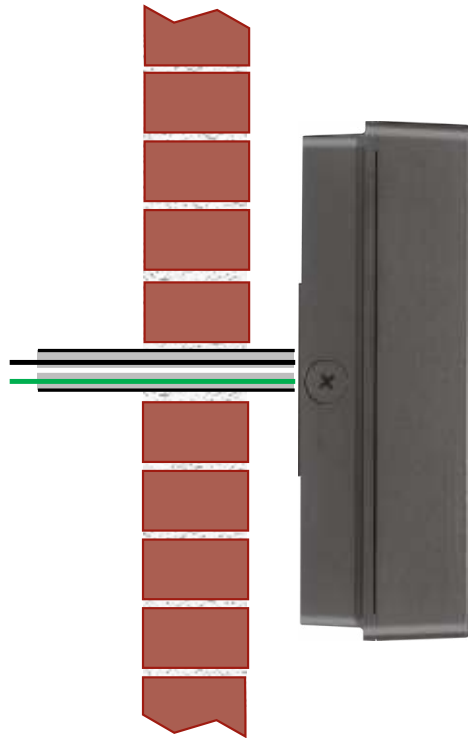


## The Lithonia Lighting® WPX: Installation Video





## Easy Installation – Poke-Through Wiring



Integral junction box allows for easy installation with “poke-through” wiring found in corrugated metal buildings



# Emergency Battery Pack Options



Test Switch

	Standard (0°C min)	Cold (-20°C min)
WPX1	4W (E4WH)	14W (E14WC)
WPX2	4W (E4WH)	14W (E14WC)

### Sample Nomenclatures:

WPX2 LED 40K MVOLT **E4WH** DDBXD

WPX2 LED 40K MVOLT **E14WC** DDBXD





## Multi-Volt (120V – 277V) Photocell Option



Photocell

Multi-volt (120-277V) button photocell option for dusk-to-dawn operation.

**Sample Nomenclature:**  
WPX2 LED 40K MVOLT **PE** DDBXD



# Specification Sheet Ordering Tree

WPX LED				
Series & Lumen Output	Color Temperature	Voltage	Options	Finish
<b>WPX1 LED P1</b> <sup>1</sup> 1,550 Lumens, 11W	<b>30K</b> 3000K	<b>MVOLT</b> 120-277V	<b>(blank)</b> None	<b>DDBXD</b> Dark Bronze
<b>WPX1 LED P2</b> 2,900 Lumens, 24W	<b>40K</b> 4000K	<b>347</b> 347V <sup>2</sup>	<b>E4WH</b> Emergency battery backup, CEC compliant (4W, 0°C min) (available with WPX1 and WPX2) <sup>2</sup>	<b>DWHXD</b> White
<b>WPX2 LED</b> 6,000 Lumens, 47W	<b>50K</b> 5000K		<b>E14WC</b> Emergency battery backup, CEC compliant (14W, 20°C min) (available with WPX1 and WPX2) <sup>2</sup>	<b>DBLBXD</b> Black
<b>WPX3 LED</b> 9,200 Lumens, 69W			<b>PE</b> Photocell for dusk-to-dawn operation <sup>3</sup>	<i>Consult factory for other finish options</i>

Note: The lumen output and input power shown in the ordering tree are average representations of all coinfiguration options. Specific values are available upon request.

1. All WPX wall packs come with 6kV surge protection standard, except WPX1 LED P1 package which comes with 2.5kV surge protection standard. Add SPD6KV option to get WPX1 LED P1 with 6kV surge protection.
2. 347V and PE options not offered with any battery pack options. WPX3 is not available with any battery options.
3. Battery pack options not available with 347V and PE options.





## DLC Listing

- All MVOLT (120V-277V) configurations of WPX wall packs are DLC Premium listed, including:
  - Any lumen package (WPX1 P1, WPX1 P2, WPX2, WPX3)
  - Any color temperature (3000K, 4000K, 5000K)
  - With or without photocell option
  - With or without any emergency battery pack options
  - Any color finish
  
- For **347V versions only**, the DLC listing status is shown below:
  - WPX1 (P1 and P2) are not DLC listed
  - WPX2 is DLC Standard
  - WPX3 is not DLC listed





# Stock Product List

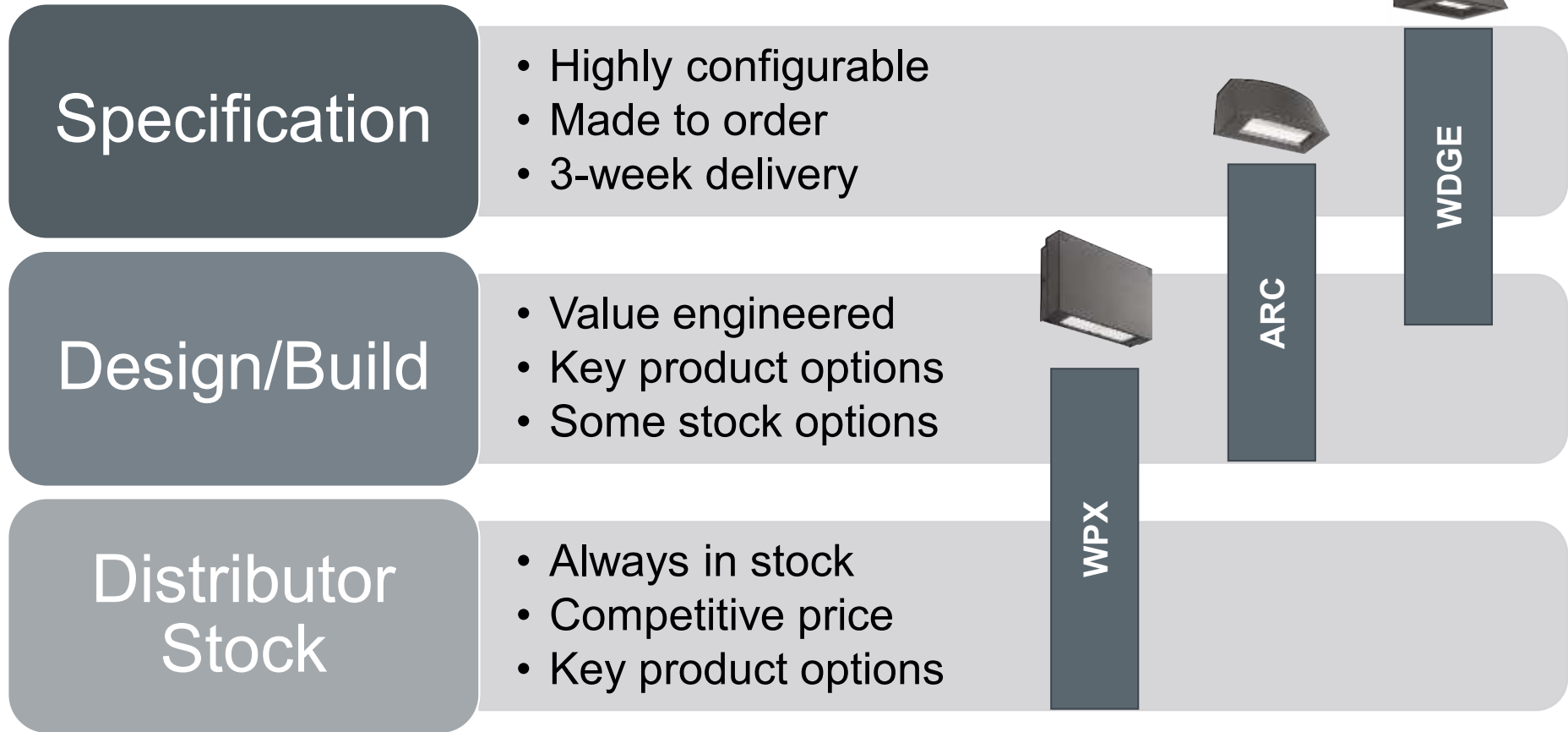
Note: All products in stock are MVOLT (120V – 277V) and DDBXD (Dark Bronze)

	Lumen Output	Color Temp	Description	CI Code	UPC Code	Contractor Select?	In Stock?	
							California (WRDC) Illinois (MWDC) Georgia (SEDC)	Texas (SWDC) Pennsylvania (NEDC)
WPX1 P1	1,550	3000K	WPX1 LED P1 30K MVOLT DDBXD	*266CN3	00194994017684	-	Yes	-
		4000K	WPX1 LED P1 40K MVOLT DDBXD	*266CN9	00194994017714	-	Yes	Yes
		5000K	WPX1 LED P1 50K MVOLT DDBXD	*266CNC	00194994017929	-	Yes	Yes
WPX1 P2	2,900	3000K	WPX1 LED P2 30K MVOLT DDBXD	*265SWH	00193048870541	-	Yes	-
		4000K	WPX1 LED P2 40K MVOLT DDBXD	*265SWK	00193048870589	Yes	Yes	Yes
		5000K	WPX1 LED P2 50K MVOLT DDBXD	*265SWM	00193048870572	Yes	Yes	Yes
WPX2	6,000	3000K	WPX2 LED 30K MVOLT DDBXD	*265SX2	00193048870725		Yes	-
		4000K	WPX2 LED 40K MVOLT DDBXD	*265SX3	00193048870756	Yes	Yes	Yes
		5000K	WPX2 LED 50K MVOLT DDBXD	*265SX6	00193048870770	Yes	Yes	Yes
WPX3	9,200	3000K	WPX3 LED 30K MVOLT DDBXD	*265SX8	00193048870800	-	Yes	-
		4000K	WPX3 LED 40K MVOLT DDBXD	*265SX9	00193048870794	-	Yes	Yes
		5000K	WPX3 LED 50K MVOLT DDBXD	*265SXC	00193048870824	-	Yes	Yes





## Product Positioning





## Product Positioning

	WPX	ARC	WDGE
Market Focus	Distributor Stock	Design/Build	Specification
Optical Approach	Refractive	Visual Comfort	Visual Comfort
Lumen Range	1,550 – 9,200	1,500 – 6,500	1,200 – 25,000
CRI	70	80	80 or 90
EM Option	Yes	Yes	Yes
Motion Sensor	No	No	Standard, nLight® AIR



**Thank You!**



**AcuityBrands.**



d<sup>s</sup>series

# D-Series Size 0 LED Area Luminaire



Catalog  
Number

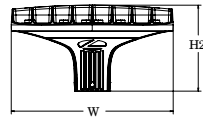
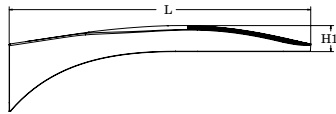
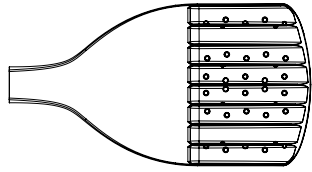
Notes

Type

Hit the Tab key or mouse over the page to see all interactive elements.

## Specifications

EPA:	0.44 ft <sup>2</sup> (0.04 m <sup>2</sup> )
Length:	26.18" (66.5 cm)
Width:	14.06" (35.7 cm)
Height H1:	2.26" (5.7 cm)
Height H2:	7.46" (18.9 cm)
Weight:	23 lbs (10.4 kg)



**FIXTURES:  
A1, A2, A3**

**ds** Design Select options indicated by this color background.

## Introduction

The modern styling of the D-Series features a highly refined aesthetic that blends seamlessly with its environment. The D-Series offers the benefits of the latest in LED technology into a high performance, high efficacy, long-life luminaire.

The photometric performance results in sites with excellent uniformity, greater pole spacing and lower power density. D-Series outstanding photometry aids in reducing the number of poles required in area lighting applications, with typical energy savings of 70% and expected service life of over 100,000 hours.



Items marked by a shaded background qualify for the Design Select program and ship in 15 days or less. To learn more about Design Select, visit [www.acuitybrands.com/designselect](http://www.acuitybrands.com/designselect). \*See ordering tree for details

## Ordering Information

**EXAMPLE: DSX0 LED P6 40K 70CRI T3M MVOLT SPA NLTAIR2 PIRHN DDBXD**

DSX0 LED	Series	LEDs	Color temperature <sup>2</sup>	Color Rendering Index <sup>2</sup>	Distribution	Voltage	Mounting	
DSX0 LED	<b>Forward optics</b>	(this section 70CRI only)						
	P1	P5	30K 3000K	70CRI	AFR Automotive front row	T5M Type V medium	MVOLT (120V-277V) <sup>4</sup>	<b>Shipped included</b> SPA Square pole mounting (#8 drilling, 3.5" min. SQ pole) RPA Round pole mounting (#8 drilling, 3" min. RND pole) SPA5 Square pole mounting (#5 drilling, 3" min. SQ pole) <sup>9</sup> RPA5 Round pole mounting (#5 drilling, 3" min. RND pole) <sup>9</sup> SPA8N Square narrow pole mounting (#8 drilling, 3" min. SQ pole) WBA Wall bracket <sup>10</sup> MA Mast arm adapter (mounts on 2 3/8" OD horizontal tenon)
	P2	P6	40K 4000K	70CRI	T1S Type I short	T5LG Type V low glare	HVOLT (347V-480V) <sup>5,6</sup>	
	P3	P7	50K 5000K	70CRI	T2M Type II medium	T5W Type V wide	XVOLT (277V-480V) <sup>7,8</sup>	
	P4				T3M Type III medium	BLC3 Type III backlight control <sup>3</sup>	120 <sup>16, 24</sup>	
	<b>Rotated optics</b>		27K 2700K	80CRI	T3LG Type III low glare <sup>3</sup>	BLC4 Type IV backlight control <sup>3</sup>	208 <sup>16, 24</sup>	
	P10 <sup>1</sup>	P12 <sup>1</sup>	30K 3000K	80CRI	T4M Type IV medium	LCCO Left corner cutoff <sup>3</sup>	240 <sup>16, 24</sup>	
	P11 <sup>1</sup>	P13 <sup>1</sup>	35K 3500K	80CRI	T4LG Type IV low glare <sup>3</sup>	RCCO Right corner cutoff <sup>3</sup>	277 <sup>16, 24</sup>	
			40K 4000K	80CRI	TFTM Forward throw medium		347 <sup>16, 24</sup>	
			50K 5000K	80CRI			480 <sup>16, 24</sup>	

Control options	Other options	Finish (required)
<b>Shipped installed</b> NLTAIR2 PIRHN nLight AIR gen 2 enabled with bi-level motion / ambient sensor, 8-40' mounting height, ambient sensor enabled at 2fc. <sup>11, 12, 18, 19</sup> PIR High/low, motion/ambient sensor, 8-40' mounting height, ambient sensor enabled at 2fc. <sup>13, 18, 19</sup> PER NEMA twist-lock receptacle only (controls ordered separate) <sup>14</sup> PERS Five-pin receptacle only (controls ordered separate) <sup>14, 19</sup>	PER7 Seven-pin receptacle only (controls ordered separate) <sup>14, 19</sup> FAO Field adjustable output <sup>15, 19</sup> BL30 Bi-level switched dimming, 30% <sup>16, 19</sup> BL50 Bi-level switched dimming, 50% <sup>16, 19</sup> DMG 0-10v dimming wires pulled outside fixture (for use with an external control, ordered separately) <sup>17</sup>	<b>Shipped installed</b> HS Houseside shield (black finish standard) <sup>20</sup> L90 Left rotated optics <sup>1</sup> R90 Right rotated optics <sup>1</sup> CCE Coastal Construction <sup>21</sup> HA 50°C ambient operation <sup>22</sup> BAA Buy America(n) Act and/or Build America Buy America Qualified SF Single fuse (120, 277, 347V) <sup>24</sup> DF Double fuse (208, 240, 480V) <sup>24</sup> <b>Shipped separately</b> EGSR External Glare Shield (reversible, field install required, matches housing finish) BSDB Bird Spikes (field install required)
		DDBXD Dark Bronze DBLXD Black DNAXD Natural Aluminum DWHXD White DDBTXD Textured dark bronze DBLBXD Textured black DNATXD Textured natural aluminum DWHGXD Textured white



## Ordering Information

### Accessories

Ordered and shipped separately.

DLL127F 1.5 JU	Photocell - SSL twist-lock (120-277V) <sup>23</sup>
DLL347F 1.5 CUL JU	Photocell - SSL twist-lock (347V) <sup>23</sup>
DLL480F 1.5 CUL JU	Photocell - SSL twist-lock (480V) <sup>23</sup>
DSHORT SBK	Shorting cap <sup>23</sup>
DSXOHS P#	House-side shield (enter package number P1-7, P10-13 in place of #)
DSXRPA (FINISH)	Round pole adapter (#8 drilling, specify finish)
DSXRPA5 (FINISH)	Round pole adapter #5 drilling (specify finish)
DSXSPA5 (FINISH)	Square pole adapter #5 drilling (specify finish)
DSXOEGSR (FINISH)	External glare shield (specify finish)
DSXOBSDB (FINISH)	Bird spike deterrent bracket (specify finish)

### NOTES

- Rotated optics available with packages P10, P11, P12 and P13. Must be combined with option L90 or R90.
- 30K, 40K, and 50K available in 70CRI and 80CRI. 27K and 35K only available with 80CRI. Contact Technical Support for other possible combinations.
- T3LG, T4LG, BLC3, BLC4, LCCO, RCCO not available with option HS.
- MVOLT driver operates on any line voltage from 120-277V (50/60 Hz).
- HVOLT driver operates on any line voltage from 347-480V (50/60 Hz).
- HVOLT not available with package P1, P2 and P10 when combined with option NLTAIR2 PIRHN or option PIR.
- XVOLT operates with any voltage between 277V and 480V (50/60 Hz).
- XVOLT not available in packages P1, P2, or P10. XVOLT not available with fusing (SF or DF). XVOLT also not available in packages P3, P4, P5, P7, P11, P13 when combined with NLTAIR2 PIRHN or PIR.
- SPA5 and RPA5 for use with #5 drilling only (Not for use with #8 drilling).
- WBA cannot be combined with Type 5 distributions plus photocell (PER).
- NLTAIR2 and PIRHN must be ordered together. For more information on nLight Air 2.
- NLTAIR2 PIRHN not available with other controls including PIR, PER, PER5, PER7, FAO, BL30, BL50 and DMG. NLTAIR2 PIRHN not available with P1, P2 and P10 using HVOLT. NLTAIR2 PIRHN not available with P1 using MVOLT.
- PIR not available with NLTAIR2, PER, PER5, PER7, FAO BL30, BL50 and DMG. PIR not available with P1, P2 and P10 using HVOLT. PIR not available with P1 using MVOLT.
- PER/PER5/PER7 not available with NLTAIR2, PIR, BL30, BL50. Photocell ordered and shipped as a separate line item from Acuity Brands Controls. See accessories. Shorting Cap included.
- FAO not available with other dimming control options NLTAIR2 PIRHN, PIR, PER5, PER7, BL30, BL50, or DMG.
- BL30 and BL50 are not available with NLTAIR2 PIRHN, PIR, PER, PER5, PER7, FAO and DMG. BL30 or BL50 must specify 120 or 277V.
- DMG not available with NLTAIR2 PIRHN, PIR, PER, PER5, PER7, BL30, BL50 and FAO.
- Reference Motion Sensor Default Settings table on page 4 to see functionality.
- Reference Controls Options table on page 4.
- Option HS not available with T3LG, T4LG, BLC3, BLC4, LCCO and RCCO distribution. Also available as a separate accessory; see Accessories information.
- CCE option not available with option B5 and EGSR. Contact Technical Support for availability.
- Option HA not available with performance packages P6, P7, P12 and P13.
- Requires luminaire to be specified with PER, PER5 or PER7 option. See Controls Table on page 4.
- Single fuse (SF) requires 120V, 277V, or 347V. Double fuse (DF) requires 208V, 240V or 480V. XVOLT not available with fusing (SF or DF).

## Shield Accessories



External Glare Shield (EGSR)

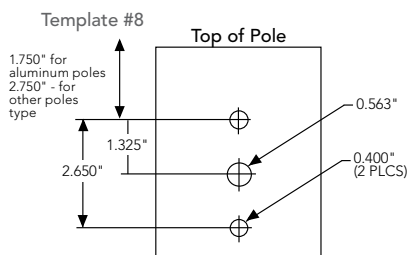
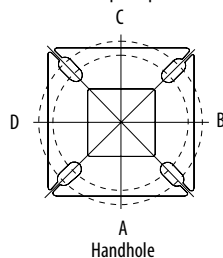


House Side Shield (HS)

## Drilling

### HANDHOLE ORIENTATION

(from top of pole)



### Tenon Mounting Slipfitter

Tenon O.D.	Mounting	Single Unit	2 @ 180	2 @ 90	3 @ 90	3 @ 120	4 @ 90
2-3/8"	RPA	AS3-5 190	AS3-5 280	AS3-5 290	AS3-5 390	AS3-5 320	AS3-5 490
2-7/8"	RPA	AST25-190	AST25-280	AST25-290	AST25-390	AST25-320	AST25-490
4"	RPA	AST35-190	AST35-280	AST35-290	AST35-390	AST35-320	AST35-490

Mounting Option	Drilling Template	Single	2 @ 180	2 @ 90	3 @ 90	3 @ 120	4 @ 90
Head Location		Side B	Side B & D	Side B & C	Side B, C & D	Round Pole Only	Side A, B, C & D
Drill Nomenclature	#8	DM19AS	DM28AS	DM29AS	DM39AS	DM32AS	DM49AS
Minimum Acceptable Outside Pole Dimension							
SPA	#8	3.5"	3.5"	3.5"	3.5"		3.5"
RPA	#8	3"	3"	3"	3"	3"	3"
SPA5	#5	3"	3"	3"	3"		3"
RPA5	#5	3"	3"	3"	3"	3"	3"
SPA8N	#8	3"	3"	3"	3"		3"

### DSX0 Area Luminaire - EPA

\*Includes luminaire and integral mounting arm. Other tenons, arms, brackets or other accessories are not included in this EPA data.

Fixture Quantity & Mounting Configuration	Single DM19	2 @ 180 DM28	2 @ 90 DM29	3 @ 90 DM39	3 @ 120 DM32	4 @ 90 DM49
Mounting Type						
DSX0 with SPA	0.44	0.88	0.96	1.18	---	1.16
DSX0 with SPA5, SPA8N	0.51	1.02	1.06	1.26	---	1.29
DSX0 with RPA, RPA5	0.51	1.02	1.06	1.26	1.24	1.29
DSX0 with MA	0.64	1.28	1.24	1.67	1.70	1.93

# Photometric Diagrams

To see complete photometric reports or download .ies files for this product, visit Lithonia Lighting's [homepage](#).

Isofootcandle plots for the DSX0 LED P7 40K 70CRI. Distances are in units of mounting height (20').



## Performance Data

### Lumen Ambient Temperature (LAT) Multipliers

Use these factors to determine relative lumen output for average ambient temperatures from 0-40°C (32-104°F).

Ambient	Lumen Multiplier	
0°C	32°F	1.04
5°C	41°F	1.04
10°C	50°F	1.03
15°C	59°F	1.02
20°C	68°F	1.01
<b>25°C</b>	<b>77°C</b>	<b>1.00</b>
30°C	86°F	0.99
35°C	95°F	0.98
40°C	104°F	0.97

### Projected LED Lumen Maintenance

Data references the extrapolated performance projections for the platforms noted in a **25°C ambient**, based on 10,000 hours of LED testing (tested per IESNA LM-80-08 and projected per IESNA TM-21-11).

To calculate LLF, use the lumen maintenance factor that corresponds to the desired number of operating hours below. For other lumen maintenance values, contact factory.

Operating Hours	Lumen Maintenance Factor
0	1.00
25,000	0.94
50,000	0.89
100,000	0.80

### FAO Dimming Settings

FAO Position	% Wattage	% Lumen Output
8	100%	100%
7	93%	95%
6	80%	85%
5	66%	73%
4	54%	61%
3	41%	49%
2	29%	36%
1	15%	20%

\*Note: Calculated values are based on original performance package data. When calculating new values for given FAO position, use published values for each package based on input watts and lumens by optic type.

### Electrical Load

	Performance Package	LED Count	Drive Current (mA)	Wattage	Current (A)					
					120V	208V	240V	277V	347V	480V
Forward Optics (Non-Rotated)	P1	20	530	34	0.28	0.16	0.14	0.12	0.10	0.07
	P2	20	700	45	0.38	0.22	0.19	0.16	0.13	0.09
	P3	20	1050	69	0.57	0.33	0.29	0.25	0.20	0.14
	P4	20	1400	94	0.78	0.45	0.39	0.34	0.27	0.19
	P5	40	700	89	0.75	0.43	0.38	0.33	0.26	0.19
	P6	40	1050	136	1.14	0.66	0.57	0.49	0.39	0.29
	P7	40	1300	170	1.42	0.82	0.71	0.62	0.49	0.36
Rotated Optics (Requires L90 or R90)	P10	30	530	51	0.42	0.24	0.21	0.18	0.15	0.11
	P11	30	700	67	0.57	0.33	0.28	0.25	0.20	0.14
	P12	30	1050	103	0.86	0.50	0.43	0.37	0.30	0.22
	P13	30	1300	129	1.07	0.62	0.54	0.46	0.37	0.27

### LED Color Temperature / Color Rendering Multipliers

	70 CRI		80CRI		90CRI	
	Lumen Multiplier	Availability	Lumen Multiplier	Availability	Lumen Multiplier	Availability
5000K	102%	Standard	92%	Extended lead-time	71%	(see note)
4000K	100%	Standard	92%	Extended lead-time	67%	(see note)
3500K	100%	(see note)	90%	Extended lead-time	63%	(see note)
3000K	96%	Standard	87%	Extended lead-time	61%	(see note)
2700K	94%	(see note)	85%	Extended lead-time	57%	(see note)

Note: Some LED types are available as per special request. Contact Technical Support for more information.

### Motion Sensor Default Settings

Option	Unoccupied Dimmed Level	High Level (when occupied)	Photocell Operation	Dwell Time	Ramp-up Time	Dimming Fade Rate
PIR	30%	100%	Enabled @ 2FC	7.5 min	3 sec	5 min
NLTAIR2 PIRHN	30%	100%	Enabled @ 2FC	7.5 min	3 sec	5 min

### Controls Options

Nomenclature	Description	Functionality	Primary control device	Notes
FAO	Field adjustable output device installed inside the luminaire; wired to the driver dimming leads.	Allows the luminaire to be manually dimmed, effectively trimming the light output.	FAO device	Cannot be used with other controls options that need the 0-10V leads
DS (not available on DSX0)	Drivers wired independently for 50/50 luminaire operation	The luminaire is wired to two separate circuits, allowing for 50/50 operation.	Independently wired drivers	Requires two separately switched circuits. Consider nLight AIR as a more cost effective alternative.
PERS or PER7	Twist-lock photocell receptacle	Compatible with standard twist-lock photocells for dusk to dawn operation, or advanced control nodes that provide 0-10V dimming signals.	Twist-lock photocells such as DLL Elite or advanced control nodes such as ROAM.	Pins 4 & 5 to dimming leads on driver, Pins 6 & 7 are capped inside luminaire. Cannot be used with other controls options that need the 0-10V leads.
PIR	Motion sensor with integral photocell. Sensor suitable for 8' to 40' mounting height.	Luminaires dim when no occupancy is detected.	Acuity Controls rSBG	Cannot be used with other controls options that need the 0-10V leads.
NLTAIR2 PIRHN	nLight AIR enabled luminaire for motion sensing, photocell and wireless communication.	Motion and ambient light sensing with group response. Scheduled dimming with motion sensor over-ride when wirelessly connected to the nLight Eclipse.	nLight Air rSBG	nLight AIR sensors can be programmed and commissioned from the ground using the CIAIRity Pro app. Cannot be used with other controls options that need the 0-10V leads.
BL30 or BL50	Integrated bi-level device that allows a second control circuit to switch all light engines to either 30% or 50% light output	BLC device provides input to 0-10V dimming leads on all drivers providing either 100% or dimmed (30% or 50%) control by a secondary circuit	BLC UVOLT1	BLC device is powered off the 0-10V dimming leads, thus can be used with any input voltage from 120 to 480V

# Performance Data

## Lumen Output

Lumen values are from photometric tests performed in accordance with IESNA LM-79-08. Data is considered to be representative of configurations shown within the tolerances described within LM-79. Contact factory for performance data on any configurations not shown here.

Forward Optics																							
Performance Package	System Watts	LED Count	Drive Current (mA)	Distribution Type	30K					40K					50K								
					(3000K, 70 CRI)					(4000K, 70 CRI)					(5000K, 70 CRI)								
					Lumens	B	U	G	LPW	Lumens	B	U	G	LPW	Lumens	B	U	G	LPW				
P1	33W	20	530	T1S	4,906	1	0	1	148	5,113	1	0	1	154	5,213	1	0	1	157				
				T2M	4,545	1	0	2	137	4,736	1	0	2	143	4,829	1	0	2	145				
				T3M	4,597	1	0	2	138	4,791	1	0	2	144	4,885	1	0	2	147				
				T3LG	4,107	1	0	1	124	4,280	1	0	1	129	4,363	1	0	1	131				
				T4M	4,666	1	0	2	141	4,863	1	0	2	146	4,957	1	0	2	149				
				T4LG	4,244	1	0	1	128	4,423	1	0	1	133	4,509	1	0	1	136				
				TFTM	4,698	1	0	2	141	4,896	1	0	2	147	4,992	1	0	2	150				
				T5M	4,801	3	0	1	145	5,003	3	0	1	151	5,101	3	0	1	154				
				T5W	4,878	3	0	1	147	5,084	3	0	2	153	5,183	3	0	2	156				
				T5LG	4,814	2	0	1	145	5,018	2	0	1	151	5,115	2	0	1	154				
				BLC3	3,344	0	0	1	101	3,485	0	0	1	105	3,553	0	0	1	107				
				BLC4	3,454	0	0	2	104	3,599	0	0	2	108	3,670	0	0	2	111				
				RCCO	3,374	0	0	1	102	3,517	0	0	1	106	3,585	0	0	1	108				
				LCCO	3,374	0	0	1	102	3,517	0	0	1	106	3,585	0	0	1	108				
				AFR	4,906	1	0	1	148	5,113	1	0	1	154	5,213	1	0	1	157				
				P2	45W	20	700	T1S	6,328	1	0	1	140	6,595	1	0	1	146	6,724	1	0	1	149
								T2M	5,862	1	0	2	130	6,109	1	0	2	135	6,228	1	0	2	138
T3M	5,930	1	0					3	131	6,180	1	0	3	137	6,301	1	0	3	140				
T3LG	5,297	1	0					1	117	5,521	1	0	1	122	5,628	1	0	1	125				
T4M	6,018	1	0					3	133	6,272	1	0	3	139	6,395	1	0	3	142				
T4LG	5,474	1	0					1	121	5,705	1	0	1	126	5,816	1	0	1	129				
TFTM	6,060	1	0					3	134	6,316	1	0	3	140	6,439	1	0	3	143				
T5M	6,192	3	0					1	137	6,453	3	0	2	143	6,579	3	0	2	146				
T5W	6,293	3	0					2	139	6,558	3	0	2	145	6,686	3	0	2	148				
T5LG	6,210	2	0					1	138	6,472	3	0	1	143	6,598	3	0	1	146				
BLC3	4,313	0	0					2	96	4,495	0	0	2	100	4,583	0	0	2	102				
BLC4	4,455	0	0					2	99	4,643	0	0	2	103	4,733	0	0	2	105				
RCCO	4,352	0	0					2	96	4,536	0	0	2	100	4,624	0	0	2	102				
LCCO	4,352	0	0					2	96	4,536	0	0	2	100	4,624	0	0	2	102				
AFR	6,328	1	0					1	140	6,595	1	0	1	146	6,724	1	0	1	149				
P3	69W	20	1050					T1S	9,006	1	0	2	131	9,386	1	0	2	136	9,569	1	0	2	139
								T2M	8,343	2	0	3	121	8,694	2	0	3	126	8,864	2	0	3	129
				T3M	8,439	2	0	3	122	8,795	2	0	3	128	8,967	2	0	3	130				
				T3LG	7,539	1	0	2	109	7,857	1	0	2	114	8,010	1	0	2	116				
				T4M	8,565	2	0	3	124	8,926	2	0	3	129	9,100	2	0	3	132				
				T4LG	7,790	1	0	2	113	8,119	1	0	2	118	8,277	1	0	2	120				
				TFTM	8,624	1	0	3	125	8,988	1	0	3	130	9,163	2	0	3	133				
				T5M	8,812	3	0	2	128	9,184	4	0	2	133	9,363	4	0	2	136				
				T5W	8,955	4	0	2	130	9,333	4	0	2	135	9,515	4	0	2	138				
				T5LG	8,838	3	0	1	128	9,211	3	0	1	134	9,390	3	0	1	136				
				BLC3	6,139	0	0	2	89	6,398	0	0	2	93	6,522	0	0	2	95				
				BLC4	6,340	0	0	3	92	6,607	0	0	3	96	6,736	0	0	3	98				
				RCCO	6,194	1	0	2	90	6,455	1	0	2	94	6,581	1	0	2	95				
				LCCO	6,194	1	0	2	90	6,455	1	0	2	94	6,581	1	0	2	95				
				AFR	9,006	1	0	2	131	9,386	1	0	2	136	9,569	1	0	2	139				
				P4	93W	20	1400	T1S	11,396	1	0	2	122	11,877	1	0	2	128	12,109	2	0	2	130
								T2M	10,557	2	0	3	113	11,003	2	0	3	118	11,217	2	0	3	121
T3M	10,680	2	0					3	115	11,130	2	0	3	120	11,347	2	0	3	122				
T3LG	9,540	1	0					2	103	9,942	1	0	2	107	10,136	1	0	2	109				
T4M	10,839	2	0					3	117	11,296	2	0	3	121	11,516	2	0	4	124				
T4LG	9,858	1	0					2	106	10,274	1	0	2	110	10,474	1	0	2	113				
TFTM	10,914	2	0					3	117	11,374	2	0	3	122	11,596	2	0	3	125				
T5M	11,152	4	0					2	120	11,622	4	0	2	125	11,849	4	0	2	127				
T5W	11,332	4	0					3	122	11,811	4	0	3	127	12,041	4	0	3	129				
T5LG	11,184	3	0					1	120	11,656	3	0	2	125	11,883	3	0	2	128				
BLC3	7,768	0	0					2	83	8,096	0	0	2	87	8,254	0	0	2	89				
BLC4	8,023	0	0					3	86	8,362	0	0	3	90	8,524	0	0	3	92				
RCCO	7,838	1	0					2	84	8,169	1	0	2	88	8,328	1	0	2	90				
LCCO	7,838	1	0					2	84	8,169	1	0	2	88	8,328	1	0	2	90				
AFR	11,396	1	0					2	122	11,877	1	0	2	128	12,109	2	0	2	130				

# Performance Data

## Lumen Output

Lumen values are from photometric tests performed in accordance with IESNA LM-79-08. Data is considered to be representative of configurations shown within the tolerances described within LM-79. Contact factory for performance data on any configurations not shown here.

Forward Optics																			
Performance Package	System Watts	LED Count	Drive Current (mA)	Distribution Type	30K					40K					50K				
					(3000K, 70 CRI)					(4000K, 70 CRI)					(5000K, 70 CRI)				
					Lumens	B	U	G	LPW	Lumens	B	U	G	LPW	Lumens	B	U	G	LPW
P5	90W	40	700	T1S	12,380	2	0	2	137	12,902	2	0	2	143	13,154	2	0	2	146
				T2M	11,468	2	0	3	127	11,952	2	0	3	133	12,185	2	0	3	135
				T3M	11,601	2	0	3	129	12,091	2	0	3	134	12,326	2	0	4	137
				T3LG	10,363	2	0	2	115	10,800	2	0	2	120	11,011	2	0	2	122
				T4M	11,774	2	0	4	131	12,271	2	0	4	136	12,510	2	0	4	139
				T4LG	10,709	1	0	2	119	11,160	2	0	2	124	11,378	2	0	2	126
				TFTM	11,856	2	0	3	132	12,356	2	0	4	137	12,596	2	0	4	140
				T5M	12,114	4	0	2	134	12,625	4	0	2	140	12,871	4	0	2	143
				T5W	12,310	4	0	3	137	12,830	4	0	3	142	13,080	4	0	3	145
				T5LG	12,149	3	0	2	135	12,662	3	0	2	141	12,908	3	0	2	143
				BLC3	8,438	0	0	2	94	8,794	0	0	2	98	8,966	0	0	2	99
				BLC4	8,715	0	0	3	97	9,083	0	0	3	101	9,260	0	0	3	103
				RCCO	8,515	1	0	2	94	8,874	1	0	2	98	9,047	1	0	2	100
				LCCO	8,515	1	0	2	94	8,874	1	0	2	98	9,047	1	0	2	100
				AFR	12,380	2	0	2	137	12,902	2	0	2	143	13,154	2	0	2	146
				P6	137W	40	1050	T1S	17,545	2	0	3	128	18,285	2	0	3	133	18,642
T2M	16,253	3	0					4	119	16,939	3	0	4	124	17,269	3	0	4	126
T3M	16,442	2	0					4	120	17,135	3	0	4	125	17,469	3	0	4	128
T3LG	14,687	2	0					2	107	15,306	2	0	2	112	15,605	2	0	2	114
T4M	16,687	2	0					4	122	17,391	3	0	5	127	17,730	3	0	5	129
T4LG	15,177	2	0					2	111	15,817	2	0	2	115	16,125	2	0	2	118
TFTM	16,802	2	0					4	123	17,511	2	0	4	128	17,852	2	0	5	130
T5M	17,168	4	0					2	125	17,893	5	0	3	131	18,241	5	0	3	133
T5W	17,447	5	0					3	127	18,183	5	0	3	133	18,537	5	0	3	135
T5LG	17,218	4	0					2	126	17,944	4	0	2	131	18,294	4	0	2	134
BLC3	11,959	0	0					3	87	12,464	0	0	3	91	12,707	0	0	3	93
BLC4	12,352	0	0					4	90	12,873	0	0	4	94	13,124	0	0	4	96
RCCO	12,067	1	0					3	88	12,576	1	0	3	92	12,821	1	0	3	94
LCCO	12,067	1	0					3	88	12,576	1	0	3	92	12,821	1	0	3	94
AFR	17,545	2	0					3	128	18,285	2	0	3	133	18,642	2	0	3	136
P7	171W	40	1300					T1S	20,806	2	0	3	122	21,683	2	0	3	127	22,106
				T2M	19,273	3	0	4	113	20,086	3	0	4	118	20,478	3	0	4	120
				T3M	19,497	3	0	5	114	20,319	3	0	5	119	20,715	3	0	5	121
				T3LG	17,416	2	0	2	102	18,151	2	0	2	106	18,504	2	0	2	108
				T4M	19,787	3	0	5	116	20,622	3	0	5	121	21,024	3	0	5	123
				T4LG	17,997	2	0	2	105	18,756	2	0	2	110	19,121	2	0	2	112
				TFTM	19,924	3	0	5	117	20,765	3	0	5	122	21,170	3	0	5	124
				T5M	20,359	5	0	3	119	21,217	5	0	3	124	21,631	5	0	3	127
				T5W	20,689	5	0	3	121	21,561	5	0	3	126	21,982	5	0	3	129
				T5LG	20,418	4	0	2	120	21,279	4	0	2	125	21,694	4	0	2	127
				BLC3	14,182	0	0	3	83	14,780	0	0	3	87	15,068	0	0	3	88
				BLC4	14,647	0	0	4	86	15,265	0	0	4	89	15,562	0	0	4	91
				RCCO	14,309	1	0	3	84	14,913	1	0	3	87	15,204	1	0	3	89
				LCCO	14,309	1	0	3	84	14,913	1	0	3	87	15,204	1	0	3	89
				AFR	20,806	2	0	3	122	21,683	2	0	3	127	22,106	2	0	3	129

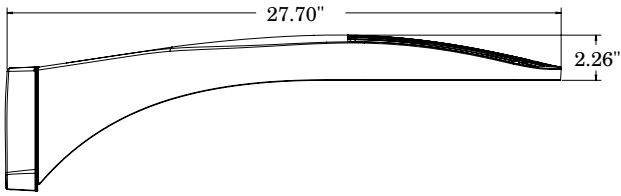
# Performance Data

## Lumen Output

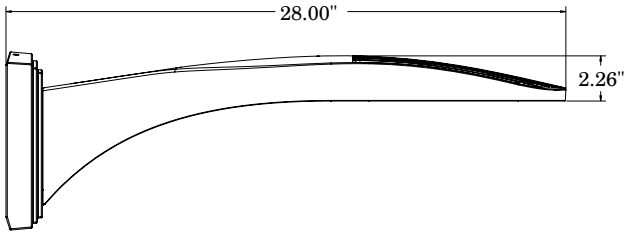
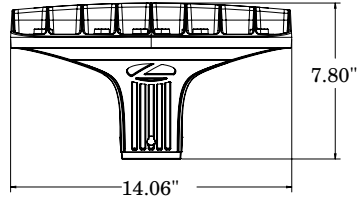
Lumen values are from photometric tests performed in accordance with IESNA LM-79-08. Data is considered to be representative of configurations shown within the tolerances described within LM-79. Contact factory for performance data on any configurations not shown here.

Rotated Optics																							
Performance Package	System Watts	LED Count	Drive Current (mA)	Distribution Type	30K					40K					50K								
					(3000K, 70 CRI)					(4000K, 70 CRI)					(5000K, 70 CRI)								
					Lumens	B	U	G	LPW	Lumens	B	U	G	LPW	Lumens	B	U	G	LPW				
P10	51W	30	530	T1S	7,399	3	0	3	145	7,711	3	0	3	151	7,862	3	0	3	154				
				T2M	6,854	3	0	3	135	7,144	3	0	3	140	7,283	3	0	3	143				
				T3M	6,933	3	0	3	136	7,225	3	0	3	142	7,366	3	0	3	145				
				T3LG	6,194	2	0	2	122	6,455	2	0	2	127	6,581	2	0	2	129				
				T4M	7,036	3	0	3	138	7,333	3	0	3	144	7,476	3	0	3	147				
				T4LG	6,399	2	0	2	126	6,669	2	0	2	131	6,799	2	0	2	134				
				TFTM	7,086	3	0	3	139	7,385	3	0	3	145	7,529	3	0	3	148				
				T5M	7,239	3	0	2	142	7,545	3	0	2	148	7,692	3	0	2	151				
				T5W	7,357	3	0	2	145	7,667	3	0	2	151	7,816	4	0	2	154				
				T5LG	7,260	3	0	1	143	7,567	3	0	1	149	7,714	3	0	1	152				
				BLC3	5,043	3	0	3	99	5,256	3	0	3	103	5,358	3	0	3	105				
				BLC4	5,208	3	0	3	102	5,428	3	0	3	107	5,534	3	0	3	109				
				RCCO	5,089	0	0	2	100	5,303	0	0	2	104	5,407	0	0	2	106				
				LCCO	5,089	0	0	2	100	5,303	0	0	2	104	5,407	0	0	2	106				
				AFR	7,399	3	0	3	145	7,711	3	0	3	151	7,862	3	0	3	154				
				P11	68W	30	700	T1S	9,358	3	0	3	138	9,753	3	0	3	143	9,943	3	0	3	146
								T2M	8,669	3	0	3	127	9,034	3	0	3	133	9,211	3	0	3	135
T3M	8,768	3	0					3	129	9,138	3	0	3	134	9,316	3	0	3	137				
T3LG	7,833	3	0					3	115	8,164	3	0	3	120	8,323	3	0	3	122				
T4M	8,899	3	0					3	131	9,274	3	0	3	136	9,455	3	0	3	139				
T4LG	8,093	3	0					3	119	8,435	3	0	3	124	8,599	3	0	3	126				
TFTM	8,962	3	0					3	132	9,340	3	0	3	137	9,522	3	0	3	140				
T5M	9,156	4	0					2	135	9,542	4	0	2	140	9,728	4	0	2	143				
T5W	9,304	4	0					2	137	9,696	4	0	2	143	9,885	4	0	2	145				
T5LG	9,182	3	0					1	135	9,569	3	0	1	141	9,756	3	0	1	143				
BLC3	6,378	3	0					3	94	6,647	3	0	3	98	6,777	3	0	3	100				
BLC4	6,587	3	0					3	97	6,865	3	0	3	101	6,999	3	0	3	103				
RCCO	6,436	0	0					2	95	6,707	0	0	2	99	6,838	0	0	2	101				
LCCO	6,436	0	0					2	95	6,707	0	0	2	99	6,838	0	0	2	101				
AFR	9,358	3	0					3	138	9,753	3	0	3	143	9,943	3	0	3	146				
P12	103W	30	1050					T1S	13,247	3	0	3	128	13,806	3	0	3	134	14,075	3	0	3	136
								T2M	12,271	4	0	4	119	12,789	4	0	4	124	13,038	4	0	4	126
				T3M	12,412	4	0	4	120	12,935	4	0	4	125	13,187	4	0	4	128				
				T3LG	11,089	3	0	3	107	11,556	3	0	3	112	11,782	3	0	3	114				
				T4M	12,597	4	0	4	122	13,128	4	0	4	127	13,384	4	0	4	129				
				T4LG	11,457	3	0	3	111	11,940	3	0	3	116	12,173	3	0	3	118				
				TFTM	12,686	4	0	4	123	13,221	4	0	4	128	13,479	4	0	4	130				
				T5M	12,960	4	0	2	125	13,507	4	0	2	131	13,770	4	0	2	133				
				T5W	13,170	4	0	3	127	13,726	4	0	3	133	13,994	4	0	3	135				
				T5LG	12,998	3	0	2	126	13,546	3	0	2	131	13,810	3	0	2	134				
				BLC3	9,029	3	0	3	87	9,409	3	0	3	91	9,593	3	0	3	93				
				BLC4	9,324	4	0	4	90	9,718	4	0	4	94	9,907	4	0	4	96				
				RCCO	9,110	1	0	2	88	9,495	1	0	2	92	9,680	1	0	2	94				
				LCCO	9,110	1	0	2	88	9,494	1	0	2	92	9,680	1	0	2	94				
				AFR	13,247	3	0	3	128	13,806	3	0	3	134	14,075	3	0	3	136				
				P13	129W	30	1300	T1S	15,704	3	0	3	122	16,366	3	0	3	127	16,685	4	0	4	130
								T2M	14,547	4	0	4	113	15,161	4	0	4	118	15,457	4	0	4	120
T3M	14,714	4	0					4	114	15,335	4	0	4	119	15,634	4	0	4	121				
T3LG	13,145	3	0					3	102	13,700	3	0	3	106	13,967	3	0	3	108				
T4M	14,933	4	0					4	116	15,563	4	0	4	121	15,867	4	0	4	123				
T4LG	13,582	3	0					3	105	14,155	3	0	3	110	14,431	3	0	3	112				
TFTM	15,039	4	0					4	117	15,673	4	0	4	122	15,979	4	0	4	124				
T5M	15,364	4	0					2	119	16,013	4	0	2	124	16,325	4	0	2	127				
T5W	15,613	5	0					3	121	16,272	5	0	3	126	16,589	5	0	3	129				
T5LG	15,409	3	0					2	120	16,059	3	0	2	125	16,372	4	0	2	127				
BLC3	10,703	4	0					4	83	11,155	4	0	4	87	11,372	4	0	4	88				
BLC4	11,054	4	0					4	86	11,520	4	0	4	89	11,745	4	0	4	91				
RCCO	10,800	1	0					2	84	11,256	1	0	2	87	11,475	1	0	3	89				
LCCO	10,800	1	0					2	84	11,255	1	0	2	87	11,475	1	0	3	89				
AFR	15,704	3	0					3	122	16,366	3	0	3	127	16,685	4	0	4	130				

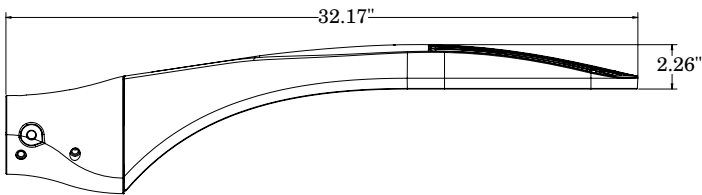
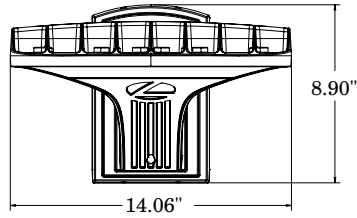
# Dimensions



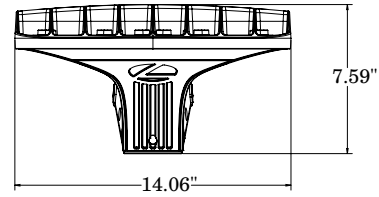
**DSX0 with RPA, RPA5, SPA5, SPA8N mount**  
**Weight: 25 lbs**



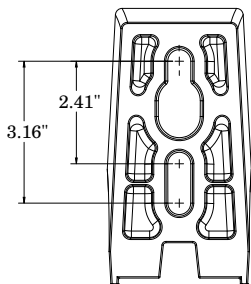
**DSX0 with WBA mount**  
**Weight: 27 lb**



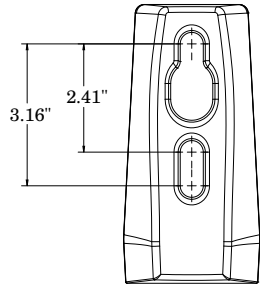
**DSX0 with MA mount**  
**Weight: 28 lbs**



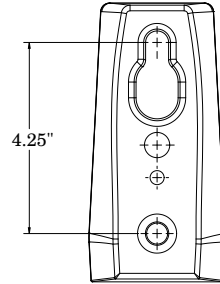
**SPA (STANDARD ARM)**



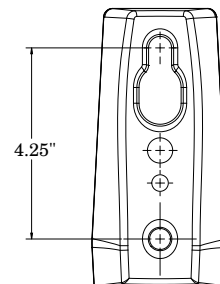
**RPA**



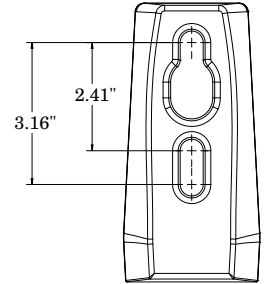
**SPA5**



**RPA5**

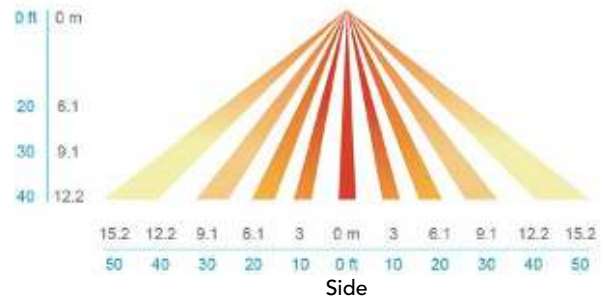
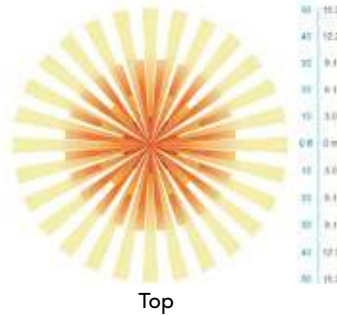


**SPA8N**



## nLight Sensor Coverage Pattern

### NLTAIR2 PIRHN



## FEATURES & SPECIFICATIONS

### INTENDED USE

The sleek design of the D-Series Size 0 reflects the embedded high performance LED technology. It is ideal for many commercial and municipal applications, such as parking lots, plazas, campuses, and pedestrian areas.

### CONSTRUCTION

Single-piece die-cast aluminum housing has integral heat sink fins to optimize thermal management through conductive and convective cooling. Modular design allows for ease of maintenance and future light engine upgrades. The LED driver is mounted in direct contact with the casting to promote low operating temperature and long life. Housing driver compartment is completely sealed against moisture and environmental contaminants (IP66). Vibration rated per ANSI C136.31 for 3G. Low EPA (0.44 ft<sup>2</sup>) for optimized pole wind loading.

### FINISH

Exterior parts are protected by a zinc-infused Super Durable TGIC thermoset powder coat finish that provides superior resistance to corrosion and weathering. A tightly controlled multi-stage process ensures a minimum 3 mils thickness for a finish that can withstand extreme climate changes without cracking or peeling. Available in both textured and non-textured finishes.

### COASTAL CONSTRUCTION (CCE)

Optional corrosion resistant construction is engineered with added corrosion protection in materials and/or pre-treatment of base material under super durable paint. Provides additional corrosion protection for applications near coastal areas. Finish is salt spray tested to over 5,000 hours per ASTM B117 with scribe rating of 10. Additional lead-times may apply.

### OPTICS

Precision-molded proprietary silicone lenses are engineered for superior area lighting distribution, uniformity, and pole spacing. Light engines are available in 3000 K, 4000 K or 5000 K (70 CRI) configurations. 80CRI configurations are also available. The D-Series Size 0 has zero uplight and qualifies as a Nighttime Friendly™ product, meaning it is consistent with the LEED® and Green Globes™ criteria for eliminating wasteful uplight.

### ELECTRICAL

Light engine(s) configurations consist of high-efficacy LEDs mounted to metal-core circuit boards to maximize heat dissipation and promote long life (up to L80/100,000 hours at 25°C). Class 1 electronic drivers are designed to have a power factor >90%, THD <20%, and an expected life of 100,000 hours with <1% failure rate. Easily serviceable 10kV surge protection device meets a minimum Category C Low operation (per ANSI/IEEE C62.41.2).

### STANDARD CONTROLS

The DSX0 LED area luminaire has a number of control options. DSX Size 0, comes standard with 0-10V dimming driver. Dusk to dawn controls can be utilized via optional NEMA twist-lock photocell receptacles. PIR integrated motion sensor with on-board photocell feature field-adjustable programming and are suitable for mounting heights up to 40 feet. Control option BL features a bi-level device that allows a second control circuit to switch all light engines to either 30% or 50% light output.

### nLIGHT AIR CONTROLS

The DSX0 LED area luminaire is also available with nLight® AIR for the ultimate in wireless control. This powerful controls platform provides out-of-the-box basic motion sensing and photocontrol functionality and is suitable for mounting heights up to 40 feet. Once commissioned using a smartphone and the easy-to-use CLAIRITY app, nLight AIR equipped luminaires can be grouped, resulting in motion sensor and photocell group response without the need for additional equipment. Scheduled dimming with motion sensor over-ride can be achieved when used with the nLight Eclipse. Additional information about nLight Air can be found [here](#).

### INSTALLATION

Integral mounting arm allows for fast mounting using Lithonia standard #8 drilling and accommodates pole drilling's from 2.41 to 3.12" on center. The standard "SPA" option for square poles and the "RPA" option for round poles use the #8 drilling. For #5 pole drillings, use SPA5 or RPA5. Additional mountings are available including a wall bracket (WBA) and mast arm (MA) option that allows luminaire attachment to a 2 3/8" horizontal mast arm.

### LISTINGS

UL listed to meet U.S. and Canadian standards. UL Listed for wet locations. Light engines are IP66 rated; luminaire is IP66 rated. Rated for -40°C minimum ambient.

DesignLights Consortium® (DLC) Premium qualified product and DLC qualified product. Not all versions of this product may be DLC Premium qualified or DLC qualified. Please check the DLC Qualified Products List at [www.designlights.org/QPL](http://www.designlights.org/QPL) to confirm which versions are qualified.

International Dark-Sky Association (IDA) Fixture Seal of Approval (FSA) is available for all products on this page utilizing 3000K color temperature only.

### GOVERNMENT PROCUREMENT

BAA – Buy America(n) Act: Product with the BAA option qualifies as a domestic end product under the Buy American Act as implemented in the FAR and DFARS. Product with the BAA option also qualifies as manufactured in the United States under DOT Buy America regulations.

BABA – Build America Buy America: Product with the BAA option also qualifies as produced in the United States under the definitions of the Build America, Buy America Act.

Please refer to [www.acuitybrands.com/buy-american](http://www.acuitybrands.com/buy-american) for additional information.

### WARRANTY

5-year limited warranty. This is the only warranty provided and no other statements in this specification sheet create any warranty of any kind. All other express and implied warranties are disclaimed. Complete warranty terms located at: [www.acuitybrands.com/support/warranty/terms-and-conditions](http://www.acuitybrands.com/support/warranty/terms-and-conditions)

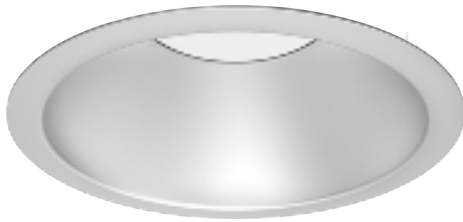
**Note:** Actual performance may differ as a result of end-user environment and application. All values are design or typical values, measured under laboratory conditions at 25 °C. Specifications subject to change without notice.

# IVO™ 6" Round Shallow Recessed Downlight

## New Construction & Remodel

**FIXTURE:  
D1**

TRIM STYLES AND COLORS



Parabolic



3-1/2" x 13-1/8" x 12-1/2"

New construction housing shown. Please see pages 5-6 for full set of dimensional drawings.

### Flange Styles



Flanged



Flangeless



Flangeless in Millwork

### Reflector Colors



Clear Alzak



Gold



Pewter



Wheat



Black



White



White  
Anti-Microbial



Soft White



Bronze

### Feature Set

- Ultra Shallow recessed downlight fits in plenums as small as 3.5 inches above ceiling
- Perfect Color™ consistency within ½-step MacAdam Ellipse
- Exceptional color rendering with 80 CRI, 90 CRI, or 95 CRI minimum
- Bounding Ray™ optical design delivers low brightness apertures for a comfortable lighting experience
- 65° cutoff to source and source image
- Batwing distributions with feathered edges to provide even illumination fixture-to-fixture
- Field adaptable with interchangeable optics and trims
- Up to 90% lumen maintenance at 55,000 hours
- Wet Location optional, covered ceiling
- ICAT is Spray Foam Compatible
- ENERGY STAR® Certified product
- Title 24, JA8 compliant

### Distribution / Beam Angles



### Superior Performance\*

Nominal Lumens	05LM	07LM	10LM	15LM	20LM	25LM	30LM	35LM	40LM	45LM	50LM
Delivered Lumens	563	838	1063	1541	2046	2569	3106	3474	3965	4464	4966
Wattage	5.1	7.5	9.2	13.3	17.5	22.1	26.6	31.8	37.2	43.1	49.9
Lumens per Watt	110	112	116	116	117	116	117	109	107	104	100

\*Based on 3500K AR LSS MWD 80CRI

\*\* E7WR option add 3.8 watts

QUICK SPECIFICATIONS

### IVO 6" Round Product Family



Downlight



Lensed WW



Surface Cylinder



Pendant Cylinder



Wall Cylinder



Wall Adjustable Cylinder



Luminaire Type:

Catalog Number:

ORDERING INFORMATION

EXAMPLE: IVO6S D 10LM 35K 80CRI MWD MIN10 MVOLT ZT NCH P AR LSS F

Series	Function	Lumen Packages	Kelvin Temperature	Color Rendering Index <sup>2</sup>	Distribution	Dimming Level
IVO6S Round Shallow Recessed	D Downlight	05LM <sup>1</sup> 500 Lumens	27K 2700K	80CRI 80+ CRI	MD Medium Batwing (0.8 s/mh, 60°) MWD Medium Wide Batwing (1.0 s/mh, 65°) WD Wide Batwing (1.2 s/mh, 75°)	MIN10 Min 10% Dim Level
		07LM 750 Lumens	30K 3000K	90CRI 90+ CRI		MIN1 Min 1% Dim Level
		10LM 1000 Lumens	35K 3500K	95CRI 95+ CRI		DARK Min 0.1% Dim Level, Dim-to-Dark
		15LM 1500 Lumens	40K 4000K			
		20LM 2000 Lumens	50K 5000K			
		25LM 2500 Lumens				
		30LM 3000 Lumens				
		35LM 3500 Lumens				
		40LM 4000 Lumens				
		45LM 4500 Lumens				
50LM 5000 Lumens						

Voltage	Control Input <sup>4</sup>	Emergency Option	Housing Style	Options
MVOLT 120V-277V	ZT <sup>5</sup> Generic 0-10V	(Blank) No Emergency	NCH Non-IC Housing (new construction only)	BAA Buy America(n) Act or Build America By America Qualified
120 120V	EZT EldoLED 0-10V	E7WR <sup>8</sup> IOTA 7W Emergency battery pack, Constant Power, Title 20 compliant, remote test switch 4500LM Max.	ICAT IC/Airtight Housing (new construction only). 2500LM max. Spray foam compatible.	SF <sup>9</sup> Single Fuse. Specify 120 or 277.
277 277V	ELV <sup>6</sup> Phase Dimming (Forward/Reverse) (120V only)	GTD <sup>8</sup> Generator Transfer Device	CP Chicago Plenum CCEA Housing (new construction only).	WL Wet Location
347 <sup>3</sup> 347V	DMX <sup>7</sup> DMX		RM Non-IC Remodel Housing (install from below). Not available with Emergency Pack options.	
	DALI <sup>7</sup> DALI-2			
	NLIGHT Wired controls by nLight			
	NLTAIR2 Wireless controls by nLight Air			
	NLIGHTER Wired controls by nLight with UL924 listed emergency operation			
	NLTAIREM2 Wireless controls by nLight Air with UL924 listed emergency operation			

Trim Style	Trim Color	Trim Finish	Flange Option
P Open Reflector	AR Clear Anodized	LD Matte Diffuse	F Self Flanged (color matches trim)
	BR Black Anodized	LS Specular	FL Flangeless (Drywall)
	GR Gold Anodized	LSS Semi Specular	FLM Flangeless Millwork
	PR Pewter Anodized		FBL <sup>12</sup> Flange Only Black
	WTR Wheat Anodized		FWR <sup>13</sup> Flange Only White
	WR <sup>10,14</sup> White Gloss (painted)		FRALTB <sup>11</sup> Flange Only RAL
	WMR <sup>10</sup> Soft White Matte (painted)		FCPC Flange Only Custom Paint Color
	WRAMF <sup>10</sup> White Gloss with Anti-Microbial (painted)		
	BZR <sup>10,14</sup> Dark Bronze Gloss (painted)		
	TRALTB <sup>10,11</sup> Trim RAL # (TBD for pricing only)		
TCPC <sup>10</sup> Trim Custom Paint Color			

ACCESSORIES – order as separate catalog numbers (shipped separately)

IVO6SOPTC D MD U	Field Replaceable Optic, Medium Distribution
IVO6SOPTC D MWD U	Field Replaceable Optic, Medium Wide Distribution
IVO6SOPTC D WD U	Field Replaceable Optics, Wide Distribution
GRA6/9.5IVO JZ	Round goof ring adapter 6" ID, 9.5" OD
SCA6	Sloped ceiling adaptor. Degree of slope must be specified (5D, 10D, 15D, 20D, 25D, 30D). Ex: SCA6 10D. Refer to TECH-190 for details.
IVO6FLMKIT	IVO 6" Round Flangeless in Millwork Ceiling Cutout Template (min. 1 required per install)
IVOFLMBIT	IVO Flangeless in Millwork Straight Router Bit, 1/4" Shank with Bearing (optional)



**ORDERING NOTES**

- |  |  |
|--|--|
| <ol style="list-style-type: none"> <li>1. 05LM only available with ELV or ZT. Not available with 347V.</li> <li>2. 50K CCT is not available with 90CRI. 35K, 40K or 50K is not available with 95CRI.</li> <li>3. 347 only available with ZT at MIN1 or MIN10, 400LM max. Not available with nLight devices or Emergency Options.</li> <li>4. Refer to <a href="#">Tech-240</a> for compatible dimmers.</li> <li>5. ZT is not available with DARK.</li> <li>6. ELV only is only available with MIN1..</li> <li>7. DMX and DALI are only available with DARK.</li> <li>8. E7WR not available with 30LM; 45LM max. E7WR and GTD are not available with DMX, NLIGHTER, NLTAIREM2, or with RM housing.</li> </ol> | <ol style="list-style-type: none"> <li>9. RM with SF is not available with DMX or nLight, or 40LM-50LM with ELV.</li> <li>10. Not available with Trim Finish.</li> <li>11. Replace with applicable RAL number and finish when ready to order. See <a href="#">RAL BROCHURE</a> for available color options.</li> <li>12. For use with different reflector flange colors only (i.e. AR, BZR, GR, PR, WTR, WR, WMR, WRAMF options). Not applicable with BR (black reflector) or FL (flangeless), TRALTBD or TCPC options.</li> <li>13. For use with different reflector flange colors only (i.e. AR, BR, BZR, GR, PR, WTR options). Not applicable with WR, WMR, WRAMF (white reflector) or FL (flangeless), TRALTBD or TCPC options.</li> <li>14. Corrosion Resistant Powder Coat.</li> </ol> |
|--|--|

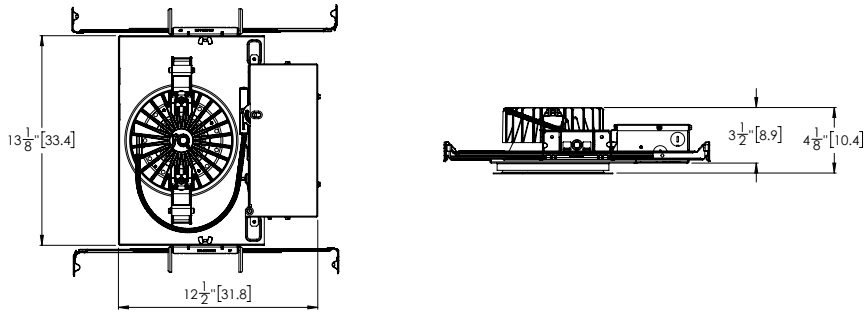


**New Construction Dimensions**

Dimensions in inches [centimeters]  
1/2" clearance on all sides required from non-combustible materials in non-IC applications, unless marked spacing noted otherwise. Marked Spacing requires min clearance center-to-center x center to side building member x overhead to building member.

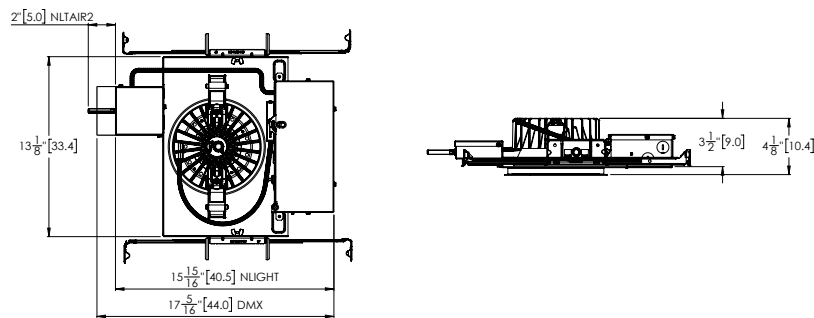
Trim Aperture: 6-5/16" (16)	Ceiling Cutout (flanged): 7-1/8" (18.1)
Trim Flange OD: 7-1/2" (19)	Ceiling Cutout (flangeless): 7-3/8" (18.7)

**Standard New Construction Housing (NCH)**



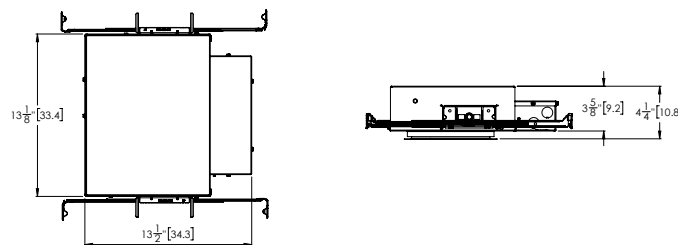
Shipping Weight: 8.3 lbs

**NCH with NLIGHT, NLTAIR2, NLIGHTER, NLTAIREM2, or DMX**



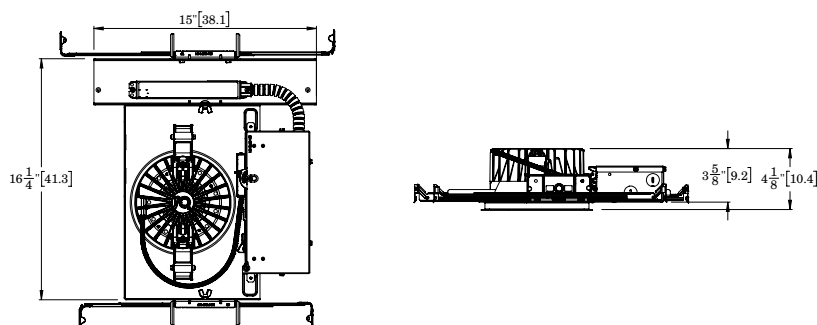
Shipping Weight: 9.8 lbs

**IC Airtight (ICAT) or Chicago Plenum (CP)  
(dimensions are the same when E7WR added)**



Shipping Weight: 11.2 lbs

**Generator Transfer Device (GTD) Housing**

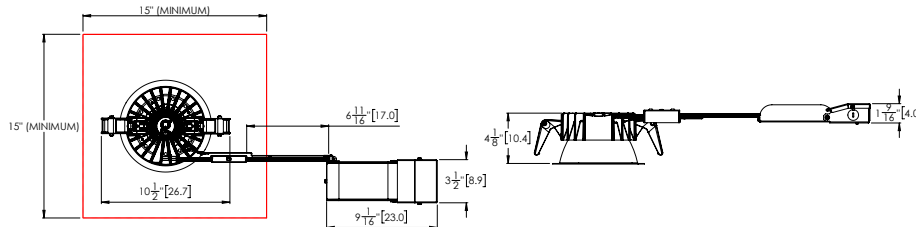


**Remodel Dimensions**

Dimensions in inches [centimeters]  
1/2" clearance on all sides required from non-combustible materials in non-IC applications, unless marked spacing noted otherwise.

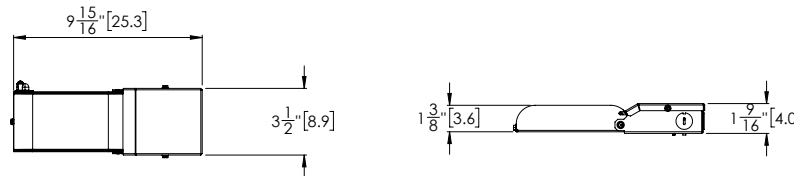
Trim Aperture: 6-5/16" (16)	Ceiling Cutout (flanged): 7" (17.8)
Overlap trim: 7-1/2" (19)	Ceiling Cutout (flangeless): 7-3/8" (18.7)

**Remodel Construction (RM)**  
Requires 3.5" of plenum height



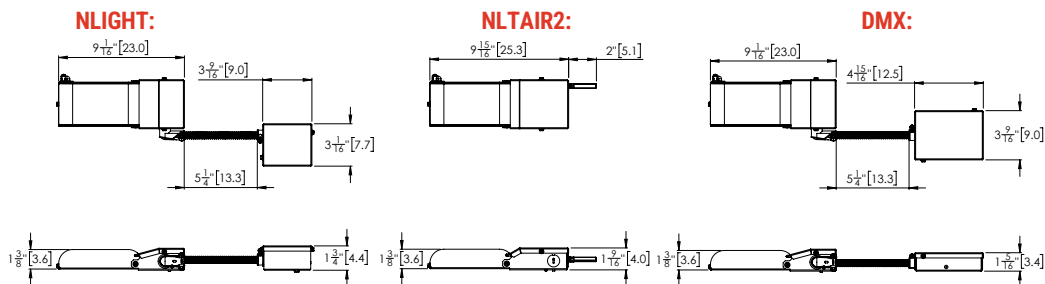
Shipping Weight: 4.9 lbs

**Remodel Construction (RM) Driver Enclosure with Fuse (SF)**  
Requires 3.5" of plenum height



Shipping Weight: 5.6 lbs

**Remodel Construction (RM) Driver Enclosures with Control Options**  
Requires 3.5" of plenum height



Shipping Weight: 5.6 lbs

Marked Spacing (min. required)				
Configuration	Lumen Package	Center-to-Center	Center to Side Building Member	Overhead to Building Member
IVO6S CP	35LM - 45LM	24"	12"	1/2"
IVO6S RM	50LM	24"	12"	1/2"

**How to Estimate Delivered Lumens in Emergency Mode**

**Delivered Lumens = 1.25 x P x LPW**

P = Output Power/Wattage of Emergency Battery Driver (E7WR\* = 7W, E10WR\* = 10W, E15WR\* = 15W)

LPW = Lumen per Watt rating of luminaire based on Ordering Code selections



### Optical System

Bounding Ray™ optical design delivers top-down flash for superior brightness control. Source and source image present simultaneously.

Unitized optical system has mechanical attachment of the light engine to the trim for optimized optical alignment.

Source regression delivers 65 degrees of visual cutoff to source and source image.

Patent pending optics are available in three (3) batwing distributions for optimal uniformity, free of shadows, hot spots or striations.

Optics are field interchangeable without tools via twist-lock feature.

### LED Light Engine

Proprietary light engines are custom binned to deliver perfect color consistency of 0.5-step MacAdam Ellipse fixture to fixture.

LED light engine is rated for L90 / 55,000 hours.

Available in 80, 90, or 95 CRI minimum. 90 CRI has an R9 greater than 50. 95 CRI has an R9 greater than 80.

### Trims

Trims are field interchangeable via twist-lock mechanism.

Trims are available in nine (9) standard colors and three standard finishes that can be customized.

### Electrical

Luminaire operates from a 50 or 60 Hz ±3 Hz AC line over a voltage ranging from 120 VAC to 347 VAC. The fluctuations of line voltage have no visible effect on the luminous output.

Luminaire has a power factor of 85% or greater at all standard operating voltages and full luminaire output.

EMI/RFI per FCC Title 47 CFR, Part 15, Class A rated. ELV Phase dimming Driver is Class B rated except when used with E7WR or at 30LM and above. Input wires are 18AWG, 600V minimum, solid copper.

### Controls (Optional)

Luminaire is equipped with interface for nLight wired, meaning it has the ability to communicate over an nLight network. When wired, using CAT-5 cabling, with other nLight-enabled sensors, power packs, or WallPods, an nLight control zone is created. Once linked to a Gateway, directly or via a Bridge, the zone becomes capable of remote status monitoring and control via SensorView software. Luminaire is equipped with interface for nLight Air, meaning it can communicate over the wireless nLight control platform. It pairs to other luminaires and wall switches through our mobile app, CLAIRITY+, which allows for single fixture control.

### Dimming

The luminaire is capable of continuous dimming without perceivable stroboscopic flicker as measured by flicker index (ANSI/IES RP-16-10) over a range of 100 – 10%, 100 – 1.0% or 100 – 0.1% of rated lumen output with a smooth shut off function to step to 0%.

eldoLED LED drivers (EZT) conforms to IEEE P1789 standards.

The driver is inaudible in 24dB environment, and stable when input voltage conditions fluctuate over what is typically experienced in a commercial environment.

### Emergency Battery (Optional)

Self testing integral emergency battery (E7WR) provides a emergency lighting for a duration of 90 minutes to meet egress code requirements.

Emergency battery is accessible from below the ceiling.

Emergency battery is CEC T20 Compliant.

### Installation

Luminaire installs in 3 1/2" plenum depth ceiling (unless noted otherwise).

Fixture is suitable for installation in ceilings from 5/8" to 2" in ceiling thickness via patented retention spring design.

Luminaire has telescopic mounting bars with maximum 24" and minimum 10 1/2" extension and 1 1/8" vertical adjustment (supplied separated).

Mounting brackets also work with C-Channel from 3/4" to 1-1/2", Flat Strap from 1/2" to 3/4", Conduit up to 3/4" in diameter, and 1/2" angle bar.

Luminaire is rated for up to (8) No. 12 AWG 90°C through branch circuit conductors.

Non-IC rated luminaires shall be installed with 3" of clearance on all sides from insulation or 1/2" clearance on all sides from non-combustible materials (unless marked spacing noted otherwise.)

IC rated luminaires can be installed in direct contact with insulation.

### Construction

Luminaire features LED module with quick-disconnect harness and strain relief for ease of inspection and service.

Servicing and maintaining the light engine, driver and branch circuit conductors is possible without tools from below the ceiling.

Luminaire is constructed with 20 gauge galvanized steel.

### Listings

Fixtures are CSA certified to meet US and Canadian Standards. All fixtures manufactured in strict accordance with the appropriate and current requirements of the "Standards for Safety" to UL, damp location standard, or UL wet location, covered ceiling only, optional.

### Photometrics

All photometry is conducted by IESNA standard LM-79-08 in an accredited lab. LEDs are tested to LM-80 standards. Lumen maintenance is calculated via TM-21.

### GOVERNMENT PROCUREMENT

BAA – Product with the BAA option qualifies as a domestic end product under the Buy American Act as implemented in the FAR and DFARS. Product with the BAA option also qualifies as manufactured in the United States under DOT Buy America regulations.

BABA – Build America Buy America: Product with the BAA option also qualifies as produced in the United States under the definitions of the Build America, Buy America Act.

Please refer to [www.acuitybrands.com/buy-american](http://www.acuitybrands.com/buy-american) for additional information.

### Warranty

5-year limited warranty. This is the only warranty provided and no other statements in this specification sheet create any warranty of any kind. All other express and implied warranties are disclaimed. Complete warranty terms located at: [www.acuitybrands.com/support/warranty/terms-and-conditions](http://www.acuitybrands.com/support/warranty/terms-and-conditions)

### Note:

Actual performance may differ as a result of end-user environment and application.

All values are design or typical values, measured under laboratory conditions at 25 °C.

The product images shown are for illustration purposes only and may not be an exact representation of the product.

## A+ Capable Luminaire

This item is an A+ capable luminaire, which has been designed and tested to provided consistent color appearance and out-of-the-box control capability with simple commissioning when used with Acuity Brands controls products.

All configurations of this luminaire are calibrated and tested meet the Acuity Brands' specification for chromatic consistency - including color rendering, color fidelity and color temperature tolerance around standard CIE chromaticity coordinates.

To learn more about A+, visit [www.acuitybrands.com/aplus](http://www.acuitybrands.com/aplus).

FLANGELESS

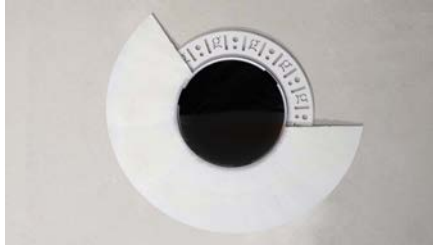
**Flangeless Installation**

Gotham's flangeless option utilizes a micro-thin polymer mud ring that minimizes the amount of drywall compound required to finish the ceiling. The end result is a virtually undetectable flangeless downlight installation.

The polymer mud ring is installed independent of the recessed frame, therefore floating with the ceiling. This innovation minimizes any surface cracks during reflector installation, ceiling movement and any future service to the recessed frame, wiring, electronics, etc.



Partially finished mud ring, showing cross-section detail.



An IVO downlight requires only approximately 3" of plaster to finish.



IVO with flangeless trim

**Flangeless Millwork Installation**

IVO's Flangeless in Millwork solution makes installation easy and precise. First, cut a hole in the Wood Ceiling using the Millwork Cutout Template (sold separately). Second, once Housing and ceiling are mounted in place, insert sheet metal Millwork Adapter (provided) lining up edge of tab with bottom of ceiling. Third, secure in place using finishing nails (provided) then remove tabs from Millwork Adapter. Last, install Trim!



Insert Millwork Adapter into precision-cut hole.



Secure with finishing nails.



Insert Trim and Module.

TABLES OF USE

Dimming Configurations	Dimming Level	Control Input	Dimming Level	Driver Dim Curve	Recommended Control Dim Curve
	MIN10	+	ZT	100% to 10%	Linear
+		EZT	100% to 10%	Linear	Linear/Logarithmic
MIN1	+	ZT	100% to 1%	Linear	Linear/Logarithmic
	+	EZT	100% to 1%	Linear	Linear/Logarithmic
	+	ELV	100% to 1%*	n/a	n/a
DARK	+	EZT	100% to 0.1%	Logarithmic	Linear
	+	DMX	100% to 0.1%	Square	Linear
	+	DALI	100% to 0.1%	Logarithmic	Linear

\* ELV Minimum Dimming level depends on dimmer and dimmer load

Embedded Nlight Configurations	Dimming Level	Control Input	Dimming Level	Control Provided	Driver Provided
	MIN10	+	NLIGHT	100% to 10%	NIO EZDXA
+		NLIGHTER	100% to 10%	NIO EZDCL ER	eldoLED ECOdrive
+		NLTAIR2	100% to 10%	RIO EZDL G2	eldoLED ECOdrive
+		NLTAIREM2	100% to 10%	RIO EZDL EM G2	eldoLED ECOdrive
MIN1	+	NLIGHT	100% to 1%	NIO EZDXA	eldoLED ECOdrive
	+	NLIGHTER	100% to 1%	NIO EZDCL ER	eldoLED ECOdrive
	+	NLTAIR2	100% to 1%	RIO EZDL G2	eldoLED ECOdrive
	+	NLTAIREM2	100% to 1%	RIO EZDL EM G2	eldoLED ECOdrive
DARK	+	NLIGHT	100% to 0.1%	NIO EZDXA	eldoLED SOLOdrive
	+	NLIGHTER	100% to 0.1%	NIO EZDCL ER	eldoLED SOLOdrive
	+	NLTAIR2	100% to 0.1%	RIO EZDL G2	eldoLED SOLOdrive
	+	NLTAIREM2	100% to 0.1%	RIO EZDL EM G2	eldoLED SOLOdrive

IVO6S D <sup>1</sup>	Title 24, JA8 <sup>2</sup>		Energy Star
	DRIVERS:	EZT <sup>3</sup> , ZT, ELV	EZT, ZT, ELV, DALI, DMX
CRI	CCT		
80 CRI	2700K		✓ <sup>4</sup>
	3000K		✓ <sup>4</sup>
	3500K		✓ <sup>4</sup>
	4000K		✓ <sup>4</sup>
	5000K		✓ <sup>4</sup>
90 CRI	2700K		✓ <sup>5</sup>
	3000K		✓ <sup>5</sup>
	3500K	✓	✓ <sup>5</sup>
	4000K	✓	✓ <sup>5</sup>
	5000K		✓ <sup>5</sup>
95 CRI	2700K		
	3000K		
	3500K		
	4000K		
	5000K		

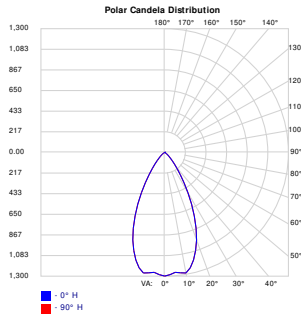
- 1 - E7WR, GTD are not Energy Star or T24 compliant.
- 2 - Only ICAT housing at 05LM, 10LM, 15LM, 20LM, 25LM is T24 compliant.
- 3 - EZT+MIN1/MIN10 drivers are T24 compliant at 07LM, 10LM only
- 4 - 05M lumen package is not Energy Star compliant.
- 5 - 05LM, 07LM lumen packages are not Energy Star compliant.



**MD Medium Beam**

IVO6S D 20LM 35K 80CRI MD P AR LSS

Wattage: 17.5, Lumens: 2025.8, LPW: 116, S/MH: .85, Test No: 23-471-6P351



Candela Summary	
0°	2501
10°	2475
20°	1885
30°	940
40°	307
50°	85
60°	9
70°	2
80°	1
90°	0

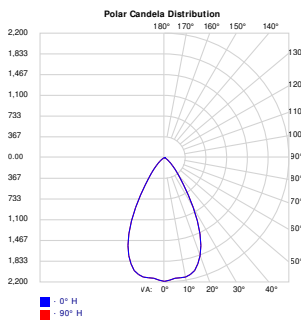
Zonal Lumen Summary		
Zone	Lumens	%
0-30	1497.3	73.9%
0-40	1852.5	91.4%
0-60	2020.7	99.7%
0-90	2025.8	100%

Cone of Light			
Mounting Height	Initial FC Center Beam	Beam Diameter (ft)	
		Horizontal	Vertical
8'	39.07	8.1	8.1
10'	25.01	10.1	10.1
12'	17.36	12.1	12.1
14'	12.76	14.1	14.1
16'	9.77	16.1	16.1

**MWD Medium Wide Beam**

IVO6S D 20LM 35K 80CRI MWD P AR LSS

Wattage: 17.5, Lumens: 2046.5, LPW: 117, S/MH: 0.94, Test No:23-560-1P351



Candela Summary	
0°	2190
10°	2146
20°	1845
30°	1018
40°	352
50°	114
60°	9
70°	1
80°	0
90°	0

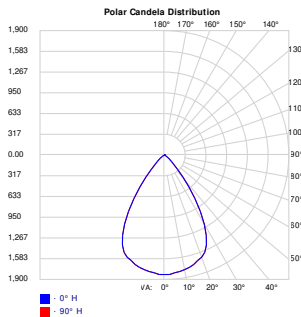
Zonal Lumen Summary		
Zone	Lumens	%
0-30	1444.2	70.6%
0-40	1830	89.4%
0-60	2042.2	99.8%
0-90	2046.5	100%

Cone of Light			
Mounting Height	Initial FC Center Beam	Beam Diameter (ft)	
		Horizontal	Vertical
8'	34.21	8.9	8.9
10'	21.9	11.2	11.2
12'	15.21	13.4	13.4
14'	11.17	15.7	15.7
16'	8.55	17.9	17.9

**WD Wide Beam**

IVO6S D 20LM 35K 80CRI WD P AR LSS

Wattage: 17.5, Lumens: 2068.1, LPW:118, S/MH: 1.08, Test No: 23-560-4P351



Candela Summary	
0°	1825
10°	1777
20°	1662
30°	1217
40°	441
50°	108
60°	9
70°	1
80°	0
90°	0

Zonal Lumen Summary		
Zone	Lumens	%
0-30	1340.5	64.8%
0-40	1845	89.2%
0-60	2063.8	99.8%
0-90	2068.1	100%

Cone of Light			
Mounting Height	Initial FC Center Beam	Beam Diameter (ft)	
		Horizontal	Vertical
8'	28.52	10.7	10.7
10'	18.25	13.4	13.3
12'	12.68	16.1	16
14'	9.31	18.7	18.7
16'	7.13	21.4	21.4

CRI/CCT Multiplier Table		
CRI	CCT	Multiplier
80	2700K	0.92
	3000K	0.96
	3500K	1.00
	4000K	1.01
90	5000K	1.04
	2700K	0.80
	3000K	0.85
	3500K	0.85
95	4000K	0.89
	2700K	0.68
	3000K	0.75

Reflector Finish Multiplier		
Trim Color	Optical Finish	Multiplier
AR	LSS	1.00
AR	LS	1.01
AR	LD	0.97
GR	LSS	0.98
GR	LS	0.97
GR	LD	0.95
PR	LSS	0.94
PR	LS	0.95
PR	LD	0.90
WTR	LSS	0.93
WTR	LS	0.92
WTR	LD	0.91
WR		1.02
BZR		0.78
BR		0.77

Lumen Package	UGR (70% 50% 20% reflectance using a 4H x 8H room size)					
	Crosswise			Endwise		
	MD	MWD	WD	MD	MWD	WD
05LM	0	1.1	0.8	0	1.1	0.8
07LM	0.6	2.4	2.2	0.6	2.4	2.2
10LM	1.4	3.3	3.1	1.4	3.3	3.1
15LM	2.7	4.6	4.3	2.7	4.6	4.3
20LM	3.7	5.5	5.3	3.7	5.5	5.3
25LM	4.5	6.3	6.1	4.5	6.3	6.1
30LM	5.2	7	6.8	5.2	7	6.8
35LM	5.5	7.4	7.2	5.5	7.4	7.2
40LM	6	7.8	7.6	6	7.8	7.6
45LM	6.4	8.3	8	6.4	8.3	8
50LM	6.8	8.6	8.4	6.8	8.6	8.4

\*UGR varies based on luminaire options and is affected by application dependent parameters. Numbers depicted here are considered "Luminaire-UGR" and/or "Point-UGR" values. To determine a more precise maximum UGR value ("Application-UGR"), a full lighting design layout should be completed with the selected luminaire configuration for each application.

\*\*Calculated using an AR (Clear reflector) with LSS (Semi-Specular) finish



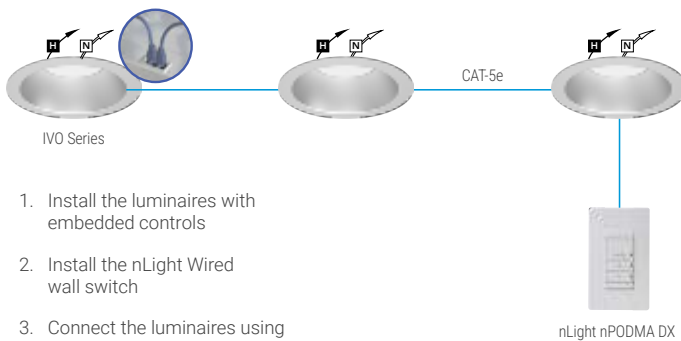


### Single Lighting Controls Platform for Indoor & Outdoor Spaces

nLight® is your networked lighting controls platform, for indoor and outdoor applications, providing wired or wireless options. Scaling from room to campus-wide applications, it is the one platform that grows with your business today and tomorrow; to seamlessly address energy cost optimization, building code compliance, improved occupant comfort, and much more. nLight also interfaces with DALI®, BACnet®, DMX and additional third-party devices.

[nlightcontrols.com](http://nlightcontrols.com)

#### Wired Embedded Controls



1. Install the luminaires with embedded controls
2. Install the nLight Wired wall switch
3. Connect the luminaires using standard CAT-5e cables and the controls devices will automatically discover each other and work (plug and play)

#### Wireless Embedded Controls



1. Install the luminaires with embedded controls
2. Install the nLight AIR battery-powered wall switch
3. Use **CLAIRITY+** mobile app to pair the fixtures with the wall switch and if desired, customize the sensor settings

#### UL924 Sequence of Operation

The below information applies to all nLight AIR devices with an EM option.

- EM devices will remain at their high-end trim and ignore wireless lighting control commands, unless a normal-power-sensed (NPS) broadcast is received at least every 8 seconds.
- Using the **CLAIRITY+** mobile app, EM devices must be associated with a group that includes a normal power sensing device to receive NPS broadcasts.
- Only non-emergency rPP20, rLSXR, rSBOR, rSDGR, and nLight AIR luminaires with version 3.4 or later firmware can provide normal power sensing for EM devices. See specification sheets for control devices and luminaires for more information on options that support normal power sensing.





Catalog Number
Notes
Type

**FIXTURE:  
WP1**

Contractor Select™

# WMCL4/6

## LED WALL CYLINDER LIGHT

Lithonia Lighting

**FEATURES**

- Switchable CCT (30K/40K/50K) offers warm, cool, and daylight in a single fixture
- Selectable Light Direction (Up/Down/Both)
- Integrated On/Off photocell
- UVOLT Driver (120-347)



Factory Settings	
Light Output	Up/Down
CCT	4000K
Photocell	On



Selectable Light Direction



Switchable CCT  
SWW2



Integrated Photocell



Catalog	Size	Wattage	Lumens @50K	LPW	Beam Spread	Color	CCT	Voltage	Photocell	Emergency Battery	Cicode	Lead Time
WMCL4 P1 SWW2 A45 UVOLT PE DDBXD M4	4"	19	2,479	130	45 Degree	Dark Bronze	30/40/50K	UVOLT	On/Off	No	2877PY	Stock
WMCL6 P1 SWW2 A45 UVOLT PE DDBXD M4	6"	31	4,728	153	45 Degree	Dark Bronze	30/40/50K	UVOLT	On/Off	No	2877R1	Stock
WMCL4 P1 SWW2 A75 UVOLT PE DDBXD M4	4"	19	2,433	128	75 Degree	Dark Bronze	30/40/50K	UVOLT	On/Off	No	2903FT	Stock
WMCL6 P1 SWW2 A75 UVOLT PE DDBXD M4	6"	31	4,520	146	75 Degree	Dark Bronze	30/40/50K	UVOLT	On/Off	No	2903FU	Stock



## Specifications

### INTENDED USE:

Provides years of maintenance-free illumination for outdoor use in residential & commercial applications. Ideal for applications such as lighting walkways and stairways for safety and security.

### CONSTRUCTION:

Cast-aluminum housing with corrosion-resistant paint in dark bronze. Other colors available upon request

### OPTICS:

80 CRI

Switchable CCTs 30K/40K/50K

Uplight and Downlight standard on unit and is field adjustable

Photocell is standard and can be turned on/off via switch

Glass lens protects the LED from moisture, dirt and other contaminants.

### LUMEN MAINTENANCE:

The LED will deliver 70% of its initial lumens at 50,000 hour average LED life.

### ELECTRICAL:

UVOLT driver operates on any line voltage from 120-347V

Operating temperature -40°C to 40°C.

4KV surge protection standard.

It is 0-10v dimmable.

### INSTALLATION:

Surface mounts to universal junction box (provided by others).

### LISTINGS:

UL Listed to U.S. and Canadian safety standards for wet locations.

Tested in accordance with IESNA LM-79 and LM-80 standards.

Fixture is IP66 rated for wet locations.

### WARRANTY:

5-year limited warranty. This is the only warranty provided and no other statements in this specification sheet create any warranty of any kind. All other express and implied warranties are disclaimed. Complete warranty terms located at: [www.acuitybrands.com/support/warranty/terms-and-conditions](http://www.acuitybrands.com/support/warranty/terms-and-conditions)

**Note:** Actual performance may differ as a result of end-user environment and application.

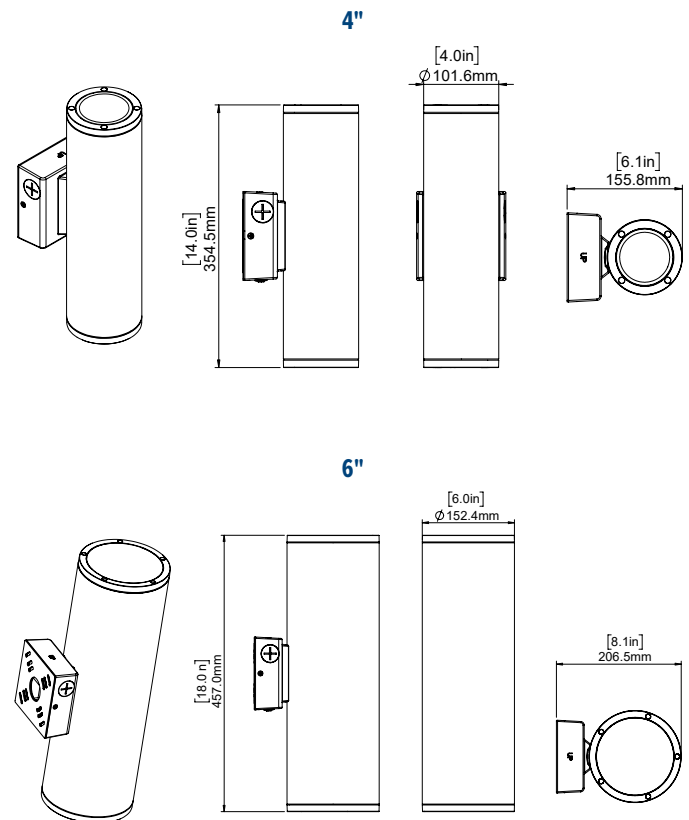
All values are design or typical values, measured under laboratory conditions at 25 °C.

The product images shown are for illustration purposes only and may not be an exact representation of the product.

Specifications subject to change without notice.

## Dimensions

	4"	6"
Length (inches)	14.0	18.0
Diameter (inches)	4.0	6.0
Depth (inches)	6.1	8.1
Weight (lbs)	5.0	7.5





Catalog Number
Notes
Type

**FIXTURE:  
WP2**

Contractor Select™  
**WPX LED**  
Wall packs

The WPX LED wall packs are energy-efficient, cost-effective, and aesthetically appealing full-cut off solution for both new construction and HID wall pack replacement/renovation opportunities. Reliable IP66 construction and excellent LED lumen maintenance ensure a long service life.

**FEATURES:**

- Architectural design at very economical prices
- Energy efficient - payback in less than two years
- Wide range of configuration options available

Note : WPX3 lumen package and all the WPX configuration options are not included in the Contractor Select program. For more information, please visit [WPX LED](#).



Luminaire	CCT	Lumens	Input Watts	Photocell	Finish	Voltage	Catalog Number	CI Code	UPC	Pallet qty.	Replaces Up To
WPX0	SWW2 3000K/ 4000K/ 5000K	850 - 1,650	6.4-13W	Switchable On/Off	DARK BRONZE	120-277V	WPX0 LED ALO SWW2 MVOLT PE DDBXD M2	*276U4U	196182511806	280	70W Metal Halide
WPX1	4000K	2,900	24W	N/A	DARK BRONZE	120-277V	WPX1 LED P2 40K MVOLT DDBXD M4	*265SWK	193048870589	160	150W Metal Halide
WPX2	4000K	6,000	47W	N/A	DARK BRONZE	120-277V	WPX2 LED 40K MVOLT DDBXD M2	*265SX3	193048870756	120	250W Metal Halide
	5000K	6,000	47W	N/A	DARK BRONZE	120-277V	WPX2 LED 50K MVOLT DDBXD M2	*265SX6	193048870770	120	250W Metal Halide

More configurations are available. [Click here](#) or visit [www.acuitybrands.com](http://www.acuitybrands.com) and search for [WPX LED](#).



## Specifications

### INTENDED USE:

The WPX LED wall packs are designed to provide a cost-effective, energy-efficient solution for the one-for-one replacement of existing HID wall packs. The WPX0, WPX1, WPX2 and WPX3 are ideal for replacing up to 70W, 150W, 250W, and 400W HID luminaires respectively. WPX luminaires deliver a uniform, wide distribution. WPX is rated for -40°C to 40°C.

### CONSTRUCTION:

WPX feature a die-cast aluminum main body with optimal thermal management that both enhances LED efficacy and extends component life. The luminaires are IP66 rated, and sealed against moisture or environmental contaminants.

### ELECTRICAL:

Light engine(s) configurations consist of high-efficacy LEDs with a min LED lumen maintenance of L86/100,000 hours. Color temperature (CCT) options of 3000K, 4000K and 5000K with minimum CRI of 70 (80 for WPX0). Electronic drivers ensure system power factor >90% and THD <20%. All luminaires have 6kV surge protection (Note: WPX1 LED P1 package and WPX0 comes with a standard surge protection rating of 2.5kV).

### INSTALLATION:

WPX can be mounted directly over a standard electrical junction box. A port on the back surface allows poke-through conduit wiring on surfaces that don't have an electrical junction box. WPX1, WPX2 and WPX3 come with three 1/2 inch conduit ports on three sides that allow for surface conduit wiring. Wiring can be made in the integral wiring compartment in all cases. WPX is only recommended for installations with LEDs facing downwards. The WPX is intended for installation on flat wall surfaces. Other applications may void warranty

### LISTINGS:

CSA Certified to meet U.S. and Canadian standards. Suitable for wet locations. IP66 Rated. DesignLights Consortium® (DLC) Premium qualified product and DLC qualified product. Not all versions of this product may be DLC Premium qualified or DLC qualified. Please check the DLC Qualified Products List at [www.designlights.org/OPL](http://www.designlights.org/OPL) to confirm which versions are qualified.

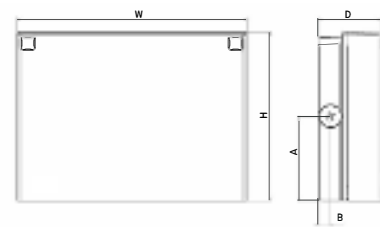
### WARRANTY:

5-year limited warranty. This is the only warranty provided and no other statements in this specification sheet create any warranty of any kind. All other express and implied warranties are disclaimed. Complete warranty terms located at: [www.acuitybrands.com/support/warranty/terms-and-conditions](http://www.acuitybrands.com/support/warranty/terms-and-conditions)

**Note:** Actual performance may differ as a result of end-user environment and application. All values are design or typical values, measured under laboratory conditions at 25°C. Specifications subject to change without notice.

## Dimensions

All dimensions are inches (centimeters) unless otherwise indicated.



Front View

Side View

Luminaire	Height (H)	Width (W)	Depth (D)	Side Conduit Location		Weight
				A	B	
WPX0	5.75" (14.6 cm)	5.5" (14.0 cm)	2" (5.1 cm)	N/A	N/A	2.5 lbs (1.1kg)
WPX1	8.1" (20.6 cm)	11.1" (28.3 cm)	3.2" (8.1 cm)	4.0" (10.3 cm)	0.6" (1.6 cm)	6.1 lbs (2.8kg)
WPX2	9.1" (23.1 cm)	12.3" (31.1 cm)	4.1" (10.5 cm)	4.5" (11.5 cm)	0.7" (1.7 cm)	8.2 lbs (3.7kg)
WPX3	9.5" (24.1 cm)	13.0" (33.0 cm)	5.5" (13.7 cm)	4.7" (12.0 cm)	0.7" (1.7 cm)	11.0 lbs (5.0kg)

# Traffic Impact Study

## HORIZON VIEW

OAK RIDGE HIGHWAY (SR 62) AT JOE DANIELS ROAD  
KNOXVILLE, TENNESSEE

Prepared for:



Trinity Business Group, LLC  
5800 One Perkins Place, Suite 6A  
Baton Rouge, LA 70808

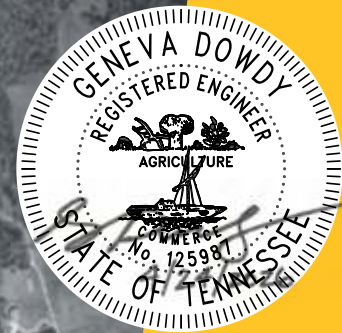
Prepared by:



520 West Summit Hill Drive  
Suite 1202  
Knoxville, TN 37902  
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[www.bargedesign.com](http://www.bargedesign.com)  
File No. 3712278

*Engineer of Record:*  
Geneva Dowdy, PE  
Registered TN PE #125987



**April 24, 2026**

6-C-26-DP  
TIS Version 1  
4/24/2026

**EXHIBIT B**  
**EXECUTIVE SUMMARY**

A traffic impact study has been prepared for Horizon View – a proposed multifamily housing and commercial development located in Knoxville, Tennessee. The proposed development will be located on the north side of Oak Ridge Highway (SR 62) along Joe Daniels Road, just east of the Pellissippi Parkway (SR 162) interchange. The proposed site will consist of one full access driveway along Joe Daniels Road.

The proposed development is anticipated to be built in two phases, partially operational by 2028 and fully operational by 2040. The development will primarily consist of multifamily housing, typically classified as LUC 220 – Multifamily Housing (Low-Rise) per the *ITE Trip Generation Manual*. Per the *Knoxville - Knox County Planning Commission Transportation Impact Analysis Guidelines*, a specific “Local Apartment” trip generation rate is to be applied for all proposed multifamily development including apartments, condos, townhomes, or other attached housing (excluding college student housing) that is proposed in the Knoxville / Knox County area. Additionally, two standalone commercial buildings are proposed towards the front of the site, both of which are anticipated to serve as small grocery/variety stores.

With these requirements, the land uses for the proposed development are as follows:

Phase 1 (2028):

- LUC 220 - Local Apartment (*Knoxville / Knox County*): 249 Dwelling Units.
- LUC 814 – Variety Store: 9,100 s.f.
- LUC 850 – Supermarket: 12,000 s.f.

Phase 2 (2040):

- LUC 220 - Local Apartment (*Knoxville / Knox County*): 249 Dwelling Units.

The purpose of this study is to assess the potential traffic impacts of the proposed development on the transportation network through the study area. Analysis of the existing traffic conditions was conducted, and trips expected to be generated by the proposed development were calculated and assigned to the roadway network. Analysis of the roadway network using Existing 2025, No Build 2028 (Phase 1), Build 2028 (Phase 1), No Build 2040 (Phase 2), and Build 2040 (Phase 2) traffic volumes was conducted. Improvements to the study area network needed to mitigate the impacts of the new development, if any, were then evaluated.

Turning movement counts (TMC) were collected to determine the existing traffic volumes on the roadway network. An 8-hour TMC was collected at the following four study intersections to determine the AM and PM traffic volume peak hour periods:

1. Oak Ridge Highway (SR 62) at W. Emory Road
2. Oak Ridge Highway (SR 62) at Joe Daniels Road
3. Oak Ridge Highway (SR 62) at Solway Road
4. Oak Ridge Highway (SR 62) at U-Turn median

Based on historical growth rates and coordination with the Knoxville MPO, an annual background growth rate of 1.0% per year was applied throughout the study area to determine No Build 2028 and No Build 2040 traffic volume projections.

Using the *Institute of Transportation Engineers (ITE) Trip Generation Manual* and local trip generation rates provided from the City of Knoxville, vehicle trips expected to be generated by the proposed development were calculated. Net new vehicle trips anticipated to be generated from the development were then distributed and assigned to the roadway network throughout the study area.

**EXHIBIT B**

Intersection analysis was conducted for the study area using the methodology outlined in the *HCM Manual, 7<sup>th</sup> Edition*. The results for the using Existing 2025, No Build 2028 (Phase 1), Build 2028 (Phase 1), No Build 2040 (Phase 2), and Build 2040 (Phase 2) scenarios show that the following recommendations will help traffic operations in the study area after the proposed development is open.

**Recommendations**

Based on this study's findings, the following improvements are recommended to better enhance traffic operations within the study area before and/or upon completion of the proposed development. These improvements are defined based on existing or background conditions without the proposed development as well as anticipated conditions once the proposed development is operational. Improvements outlined in Existing or No Build conditions should be considered for improved roadway operations regardless of the proposed development:

**Existing 2025****Oak Ridge Highway (SR 62) at W. Emory Road:**

- **Install one left turn lane with 50 feet of storage** along the eastbound approach of Oak Ridge Highway (SR 62).

**Oak Ridge Highway (SR 62) at U-Turn median:**

- **Consider corridor operational and safety study** along Oak Ridge Highway (SR 62) from Solway Road to Burchfield Drive / Sparks Road to provide potential mitigation for heavy u-turning vehicles.

**Build 2028****Oak Ridge Highway (SR 62) at Joe Daniels Road:**

- **Install a traffic signal** with the following laneage:
  - Oak Ridge Highway (SR 62) - Eastbound approach
    - One left turn lane with a minimum of 100 feet of storage
    - One shared through / right turn lane with full storage
  - Oak Ridge Highway (SR 62) – Westbound approach
    - One shared left turn / through lane with full storage
    - One right turn lane with a minimum of 100 feet of storage
  - Joe Daniels Road – Northbound approach
    - One shared left turn / through / right turn lane with full storage
  - Joe Daniels Road – Southbound approach
    - One shared left turn / through / right turn lane with full storage

*A traffic signal is warranted at the study intersection, however existing interchange geometry presents constraints for adequate vehicle weaving and storage from the interchange of Oak Ridge Highway (SR 62) at Pellissippi Parkway (SR 162) and the study intersection. A traffic signal installation is conditional to the reconstruction of the interchange weaving and merging area between the two highways. Adequate spacing for vehicles to merge across to the eastbound left turn lane at the study intersection is critical to the success of a traffic signal at this location.*

- **Realign Joe Daniels Road to align with site access** along the southbound approach. The site access will operate with one ingress lane and one egress lane per the proposed site plan in Appendix A.

# Public Notice and Community Engagement

Planning strives to provide community members with information about upcoming cases in a variety of ways. In addition to posting public notice signs, our agency encourages applicants to provide information and offer opportunities for dialogue related to their upcoming case(s). The contact information you provide in your application may be used for that purpose. We require applicants to acknowledge their role in this process.

## Sign Posting and Removal

The Administrative Rules and Procedures of the Knoxville-Knox County Planning Commission require a sign to be posted on the property for each application subject to consideration by the Planning Commission.

**Planning staff will post the required sign.** If a replacement sign(s) is needed, the applicant is responsible for picking up the new sign(s) from Planning and will be charged \$10 for each replacement.

### Location and Visibility

The sign must be posted on the nearest adjacent/frontage street and in a location clearly visible to vehicles traveling in either direction. If the property has more than one street frontage, the sign should be placed along the street that carries more traffic. Planning staff may recommend a preferred location for the sign to be posted at the time of application.

### Timing

The sign(s) must be posted not less than 12 days prior to the scheduled Planning Commission public hearing and must remain in place until the day after the meeting. In the case of a postponement, the sign can either remain in place or be removed and reposted not less than 12 days prior to the next Planning Commission meeting. The applicant is responsible for removing the sign after the application has been acted upon by the Planning Commission.

### Acknowledgement

**By signing below,** you acknowledge that public notice signs must be posted and visible on the property consistent with the guidelines above and between the dates listed below.

05/30/2026

06/12/2026

Date to be Posted

Date to be Removed

**Have you engaged the surrounding property owners to discuss your request?**

Yes  No

No, but I plan to prior to the Planning Commission meeting

Ian.Jay@bargedesign.com

Digitally signed by  
Ian.Jay@bargedesign.com  
DN: E=Ian.Jay@bargedesign.com,  
CN=Ian.Jay@bargedesign.com  
Date: 2026.04.23 16:11:48-05'00'

Ian Jay

4/24/2026

Applicant Signature

Applicant Name

Date