



Florida Department of Transportation

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SECRETARY

ROADWAY DESIGN BULLETIN 18-08

(FHWA Approval: 07/17/18)

DATE: July 18, 2018

TO: District Directors of Transportation Operations, District Directors of Transportation Development, District Design Engineers, District Construction Engineers, District Structures Design Engineers, District Maintenance Engineers, District Consultant Project Manager Engineers, District Roadway Design Engineers, District Traffic Operations Engineers, District Program Management Engineers, District Materials Engineers

FROM: Michael Shepard, P.E., State Roadway Design Engineer

COPIES: Brian Blanchard, Tom Byron, Courtney Drummond, Tim Lattner, Rudy Powell, David Sadler, Amy Tootle, Dan Scheer, Vern Danforth, Gregory Schiess, Trey Tillander, Stefanie Maxwell, Dan Hurtado, Robert Robertson, Lora Hollingsworth, Kevin Burgess (FHWA), Nick Finch (FHWA), Chad Thompson (FHWA), Bren George (FHWA)

SUBJECT: **Minimum Mounting Heights for Conventional Lighting based on Maximum Candela**

This bulletin implements new policy for minimum mounting heights for conventional lighting based on the maximum candela of the luminaires. This policy affects the Plans Preparation Manual (PPM) and the FDOT Design Manual (FDM).

REQUIREMENTS

1. After the last paragraph of **FDM 231.2**, add the following:

Specify mounting heights for conventional lighting in accordance with **Table 231.2.2**. Ensure that the maximum candela of the design luminaire does not exceed the maximum candela for the associated minimum mounting height.

Table 231.2.2 Minimum Mounting Heights based on Maximum Candela

Minimum Mounting Height (Ft.)	Maximum Candela of Luminaire		
	Long Distribution	Medium Distribution	Short Distribution
20 or Less	5,000	10,000	15,000
25	10,000	15,000	20,000
30	15,000	20,000	25,000
35	20,000	25,000	30,000
40	25,000	30,000	35,000
45	30,000	35,000	40,000
50	35,000	40,000	45,000
(1) Distribution refers to the longitudinal distribution of the luminaire.			

2. After the last paragraph of *PPM, Volume 1, Chapter 7, Section 7.3.1*, add the following:

Specify mounting heights for conventional lighting in accordance with **Table 7.3.8**. Ensure that the maximum candela of the design luminaire does not exceed the maximum candela for the associated minimum mounting height.

3. After *Table 7.3.7* of *PPM, Volume 1, Chapter 7*, add the following:

Table 7.3.8 Minimum Mounting Heights based on Maximum Candela

Minimum Mounting Height (Ft.)	Maximum Candela of Luminaire		
	Long Distribution	Medium Distribution	Short Distribution
20 or Less	5,000	10,000	15,000
25	10,000	15,000	20,000
30	15,000	20,000	25,000
35	20,000	25,000	30,000
40	25,000	30,000	35,000
45	30,000	35,000	40,000
50	35,000	40,000	45,000
(1) Distribution refers to the longitudinal distribution of the luminaire.			

BACKGROUND

The mounting height will affect the illumination level, relative glare, and uniformity. Increased mounting height may reduce direct glare, discomfort glare, and disabling veiling luminance.

IMPLEMENTATION

These requirements are effective on all projects with a letting date of January 1, 2019 or later.

CONTACT

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