

## GENERAL

## 1. Description

This standard identifies minimum requirements that shall be met for all crosswalks in the design and construction of elements for Arlington County Horizontal Design Standards. The development of this standard is to provide greater guidance in the design and construction of crosswalks while meeting the County's guiding principles for increasing pedestrian safety and accessibility, decreasing county infrastructure costs and balancing the use of the Right-of-Way between all modes of transportation.

## 2. Related Arlington County Standards

- A. Arlington County Construction Standards and Specifications
- B. Arlington County Master Transportation Plan – Pedestrian Element
- C. Arlington County Pavement Marking Specifications (Being Developed)

## 3. Applicable Standards and Specifications

- A. Manual of Uniform Traffic Control Devices (MUTCD)
- B. Code of Virginia
- C. VDOT Road and Bridge Specifications
- D. Americans with Disabilities Act - Accessibility Guidelines for Building and Facilities (ADAAG)
- E. American with Disabilities Accessibility Guidelines for Public Rights-of-Way (PROWAG)

## 4. Quality Assurance

- A. Reserved

## 5. Submittals

- A. Design and placement of all marked crosswalks shall be approved by DES Transportation Engineering and Operations (TE&O) Bureau Chief.

## DESIGN CONSIDERATIONS

## A. Definition

A crosswalk is a portion of a roadway at an intersection or elsewhere designated for pedestrian crossing; and can be either marked or unmarked, flush or raised. Marked crosswalks are indicated by lines or other markings on the surface of the roadway. Unmarked crosswalks are the natural extension of the shoulder, curb line or sidewalk.

## B. Purpose

1. The primary purpose of a marked crosswalk is to identify the preferred path for pedestrians and bicyclist to cross the roadway where there may be potential conflict.
2. At non intersection locations crosswalk markings legally establish the crosswalk.
3. Crosswalks can provide visual and tactile directional guidance to pedestrians when crossing the street.

## DESIGN

## A. Dimensions

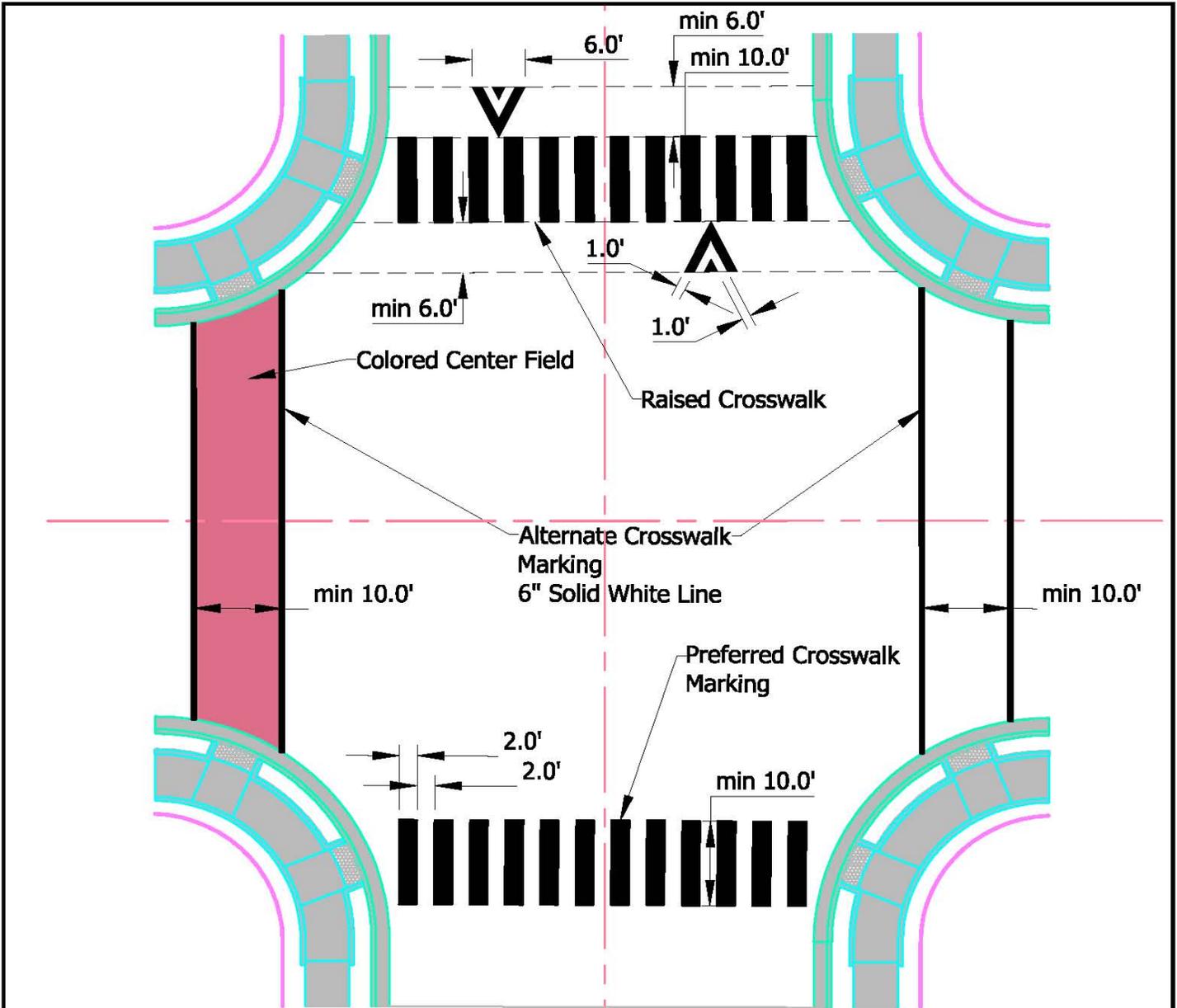
## 1. Marked Crosswalks

- a. Marked crosswalks shall not be less than 10' in width.
- b. The designer shall consider wider crosswalks where the following conditions exists:
  - i. High pedestrian volumes
  - ii. Skewed intersection geometry
  - iii. Wide approaching sidewalks
- c. Preferred crosswalk markings shall consist of high visibility solid white bars 2' wide with 2' gaps between each bar for the length of the crosswalk. The bars shall extend the full width of the crosswalk and be parallel to each other and parallel to the vehicle path on the street being crossed. The width of the crosswalk shall be measured from one end of the marked bar to the other end of the marked bar perpendicular to the crosswalk. Transverse line marking are not used with this type of crosswalk. Existing conflicting markings including transverse lines shall be removed when preferred crosswalks are installed. Refer to detail CW-1.0.
- d. Alternate crosswalk markings shall consist of two solid white transverse lines, a minimum of 6" wide and parallel to each other. The width of the crosswalk shall be measured from the center of marked line to the center of marked line perpendicular to the crosswalk. Refer to Detail CW-1.0.

- e. Raised crosswalks shall consist of a speed table with either of the above crosswalk markings. A raised crosswalk will require that the speed hump be constructed with a 10' wide flat top. Refer to detail CW-1.0.
  - f. Crosswalks do not need to be centered on a curb ramp. However they must be placed to ensure that the accessible path of the ramp is within the crosswalk.
2. Unmarked Crosswalks
    - a. Unmarked crosswalks shall generally be considered the width of the approaching sidewalk and measured from the natural extension of the shoulder, curb line or sidewalk.

#### B. Materials

1. Marked crosswalks shall be designated with solid white lines in a retro reflective material.
2. When two parallel lines are used to define the crosswalk, the center field of the crosswalk may be colored with non-retro reflective coloring providing the finished surface remains smooth for the entire length of the crosswalk and a minimum of 6' in width.
3. Coloring used between crosswalk lines shall not use colors or patterns that degrade the contrast of the white crosswalk lines, or that might be mistaken by road users as a traffic control application.
4. Colors not permitted for use are high intensity traffic yellow, red or yellow/green.
5. Limited alternate material combinations may be considered to designate crosswalks on a case by case basis as identified by the Transportation Director. Materials may include different surface treatments.
6. Decorative markings
  - a. When decorative markings are used the product selected shall have at least a 10 year performance warranty and be shown to perform to withstand the expected vehicle volumes on the street being marked.
  - b. Planners and designers shall also consider life cycle costs and maintainability of the products being reviewed for selection.



Notes: When the alternate crosswalk is used, the center field of the crosswalk may be colored providing the finished surface remains smooth for the entire length of the crosswalk and a minimum of 6' in width. Colors not permitted for use are; high intensity traffic yellow, red or yellow/green.

Existing conflicting markings including transverse lines shall be removed when preferred crosswalks are installed.

**TYPICAL CROSSWALK PLACEMENT and DIMENSIONS**


REVISION & DATE



**ARLINGTON COUNTY, VIRGINIA**  
**DEPARTMENT OF ENVIRONMENTAL SERVICES**

**DRAWING NO.**  
**CW-1.0**  
**SHEET 1 OF 1**