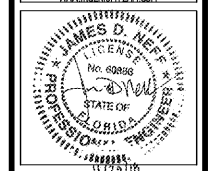


**Ingenium**  
PLANNING & ENGINEERING  
271 ROSWELL ST.  
SUITE 100  
ALPHARETTA, GA 30009  
770.457.8650  
HHKINGENIUM@GMAIL.COM



THIS ITEM HAS BEEN DIGITALLY SIGNED AND SEALED BY JAMES D. NEEFE, PE ON THE DATE ADJACENT TO THE SEAL.  
PRINTED COPIES OF THIS DOCUMENT ARE NOT CONSIDERED SIGNED AND SEALED AND THE SIGNATURE MUST BE VERIFIED ON ANY ELECTRONIC COPIES.

STATE OF FLORIDA  
AUTHORIZATION NUMBER  
8370  
PLANS PREPARED BY INGENIUM ENTERPRISES FORMERLY GRIMAL CRAWFORD

PANDA EXPRESS/CFT PLAZA  
3668 GULF BREEZE PARKWAY  
GULF BREEZE, FLORIDA



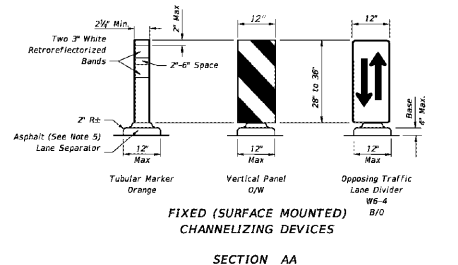
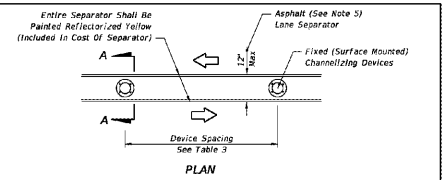
CLIENT:  
CFT NV DEVELOPMENTS, LLC  
1120 N. TOWN CENTER DR., SUITE 150  
LAS VEGAS, NV 89144  
PHONE: (626) 799-8599

NO.	DATE	DESCRIPTION

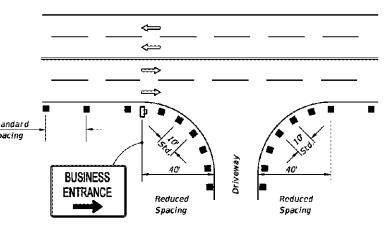
THE CIVIL ENGINEER REGULARLY UPDATES ELECTRONIC FILES DURING THE DEVELOPMENT OF A PROJECT AS A RESULT, THE DATA INCLUDED IN ANY CAD FILE OR DRAWING PRIOR TO ITS FINAL RELEASE DOES NOT NECESSARILY REFLECT THE COMPLETE SCOPE OR CONTENT AS REVISED IN THE CONTRACT. THE CONTENTS IN THESE FILES MAY THEREFORE BE PRELIMINARY, INCOMPLETE, WORK IN PROGRESS, AND SUBJECT TO CHANGE. FURTHERMORE, THE INFORMATION CONTAINED HEREIN IS THE SOLE PROPERTY OF THE CIVIL ENGINEER. THE ORIGINAL SHALL NOT BE LOANED, ALTERED, OR REPRODUCED IN ANY FORMER WITHOUT THE EXPRESS WRITTEN CONSENT OF THE CIVIL ENGINEER. THESE PLANS ARE SUBJECT TO FEDERAL COPYRIGHT LAWS. ANY USE OF THESE MATERIALS WITHOUT THE WRITTEN PERMISSION OF THE CIVIL ENGINEER IS PROHIBITED.

PROJ # 170056  
DWG NAME 170056\_C03.DWG  
ISSUE DATE 11/2/2018  
PROJ MGR EF  
HARDSCAPE DETAILS VIII  
C03.9  
SHEET NUMBER

Speed (mph)	Max. Distance Between Devices (ft.)			
	Tubular Markers		Vertical Panels or Opposing Traffic Lane Dividers	
	Taper	Tangent	Taper	Tangent
25	25	50	25	50
30 to 45	25	50	30	50
50 to 70	25	50	50	100



FIXED (SURFACE MOUNTED) CHANNELIZING DEVICES  
SECTION AA



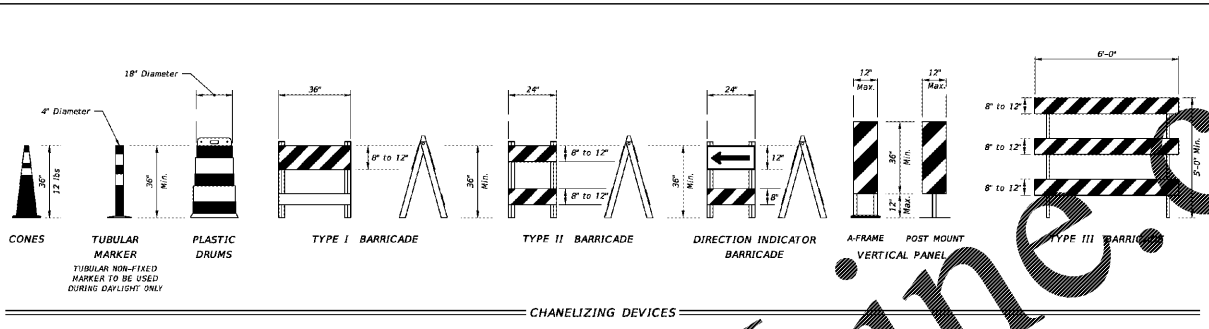
- For single business entrances, place one 24" x 36" business sign for each driveway entrance affected. Signs shall show specific business names. Logs may be provided by business owners. Standard BUSINESS ENTRANCE sign in Index 700-102 may be used when approved by the Engineer.
- When several businesses share a common driveway entrance, place one 24" x 36" standard BUSINESS ENTRANCE sign in accordance with Index 700-102 at the common driveway entrance.
- Channelizing devices shall be placed at a reduced spacing on each side of the driveway entrance, but shall not restrict sight distance for the driveway users.
- Business entrance signs are intended to guide motorists to business entrances moved/modified or disturbed during construction projects. Business entrance signs are not required where there is minimal disruption to business driveways which is often the case with resurfacing type projects.

PLACEMENT OF BUSINESS ENTRANCE SIGNS AND CHANNELIZING DEVICES AT BUSINESS ENTRANCE

- Temporary lane separators shall be supplemented with any of the following approved fixed (surface mounted) channelizing devices: tubular markers, vertical panels, or opposing traffic lane divider panels. Opposing traffic lane divider panels (B&W) shall only be used as center lane dividers to separate opposing vehicular traffic on a two-lane, two-way operation. Tubular markers, vertical panels and opposing traffic lane divider panels shall not be intermixed within the limits where the temporary lane separator is used. The connection between the channelizing device and the temporary lane separator curb shall not be channelizing device in a vertical position.
- Retractable materials shall have a smooth sealed outer surface which will display the same approximate color day and night. Furnish channelizing devices having retroreflective sheeting meeting the requirements of Section 990.
- 12" openings for drainage shall be constructed in the asphalt and portable temporary lane separator at a maximum spacing of 25' in areas with grades of 1% or less or 50' in areas with grades over 1% as directed by the Engineer.
- Tapered ends shall be used at the beginning and end of each run of the temporary lane separator to form a gradual increase in height from the pavement level to the top of the temporary lane separator.
- The Contractor has the option of using portable temporary lane separators containing fixed channelizing devices in lieu of the temporary asphalt separator and channelizing devices detailed on this sheet. The portable temporary lane separator shall come in portable sections that can be connected to maintain continuous alignment between the separate curb sections. Each temporary lane separator section shall be 36 inches to 48 inches in total length. Portable temporary lane separators shall duplicate the color of the pavement marking. Portable temporary lane separators shall be one of those listed on the Approved Products List.
- Any damage to existing pavement caused by the removal of temporary lane separator shall be satisfactorily repaired and the cost of such repairs are to be included in the cost of Maintenance of Traffic, LS.

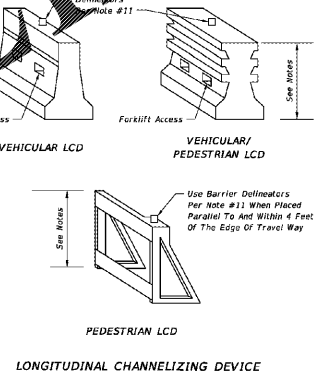
TEMPORARY LANE SEPARATOR

LAST REVISION: 11/01/17	DESCRIPTION:	FDOT	FY 2018-19 STANDARD PLANS	GENERAL INFORMATION FOR TRAFFIC CONTROL THROUGH WORK ZONES	INDEX: 102-600	SHEET: 10 of 12
-------------------------	--------------	------	---------------------------	--	----------------	-----------------

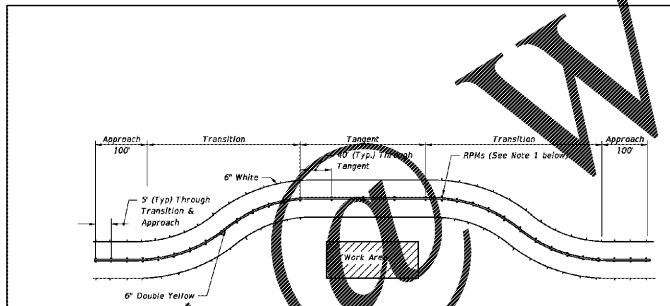


- CHANNELIZING DEVICE NOTES:
- The details shown on this sheet are for the following purposes:  
a. For ease of identification and  
b. To provide information that supplements or supersedes that provided by the MUTCD.
  - The Type III Barricade shall have a unit length of 6'-0". When barricades of greater lengths are required those lengths shall be in multiples of the 6'-0" unit.
  - No sign panel should be mounted on any channelizing device unless the channelizing device/sign combination was found to be crashworthy and the sign panel is mounted in accordance with the vendor drawing for the channelizing device shown on the Approved Products List (APL).
  - Ballast shall not be placed on top rails or any striped rails or higher than 13" above the driving surface.
  - The direction indicator barricade may be used in tapers and transitions where specific directional guidance to drivers is necessary. If used, direction indicator barricades shall be used in series to direct the driver through the transition and into the intended travel lane.
  - The spacing of sheeting is not permitted on either channelizing devices or MOT signs.
  - For rails less than 3'-0" long, 4" stripes shall be used.
  - Cones shall:  
a. Be used only in active work zones where cones are present.  
b. Not exceed 2 miles in length of use without being replaced.  
c. Be retroreflective as per the MUTCD with Department of Transportation approved reflective collars when used at night.
  - Vehicular longitudinal channelizing devices shall not be used for pedestrian protection. For vehicular longitudinal channelizing devices (LLC) less than 32" in height, supplemental tubular markers, vertical panels, etc.) along the entire length of the LLC at 25' centers on tangents and 25' centers on radii. The cost of these supplemental channelizing devices shall be included in the cost of the LLC. For LLC's less than 32" in height shall be used for speeds greater than 45 mph.
  - For pedestrian longitudinal channelizing devices, the device shall have a minimum of 8" continuous detectable edging along the driveway. A gap not exceeding a height of 2" is allowed to facilitate drainage. The top surface of the device shall be a minimum height of 12" and have a 1/4" or less difference in any plane at all connection points between the devices to facilitate hand to hand contact and the top surface of the device shall be in the same plane. If pedestrian protection is required, the device shall have a minimum height of at least 2', and the device must be anchored to the driveway aggregate base or ballasted to withstand a 200 lb point load at the top of the device.
  - For Barrier Delineators, specification 102. Place the top of uprights and retroreflective sheeting as vehicular traffic flow must match adjacent longitudinal pavement marking.

- TEMPORARY BARRIER NOTES:
- When a barrier is specified, any of the types below may be used in accordance with the applicable Index:  
Index Description  
102-10 Temporary Barrier  
102-10a Low Profile Barrier  
536-001 Guardrail
  - Trailer Mounted Barriers may be used to provide passive protection for workers within the work areas. APL drawings may be used as a guide to develop project specific Temporary Traffic Control Plans that are signed and sealed by the Contractor's Engineer.

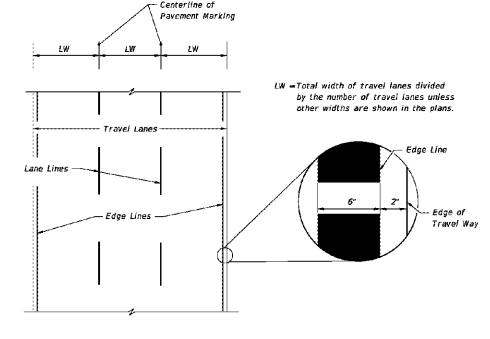


LONGITUDINAL CHANNELIZING DEVICE



- USE OF RAISED PAVEMENT MARKERS TO SUPPLEMENT PAINT OR REMOVABLE TAPE IN WORK ZONES
- RPMs shall be installed as a supplement to:  
a. All lane lines.  
b. Edge lines in transition & approach areas.  
c. Corners of gore areas.
  - Placement of RPMs should be as shown in Index 706-001 with the following exceptions:  
a. RPMs shall be placed at 3 feet center to center in approach and transition areas.

- NOTES FOR RAISED PAVEMENT MARKERS:
- The color of the raised pavement marker under both day and night conditions shall conform to the color of the marking for which they serve as a positioning guide, or for which they supplement.
  - RPMs used to supplement lane lines are to be paid for as Raised Pavement Marker (Temporary), EA. RPMs used as a temporary substitute for paint or removable tape due to equipment malfunction are to be placed at the Contractor's expense.



PLACEMENT OF PAVEMENT MARKINGS

PAVEMENT MARKINGS

LAST REVISION: 11/01/17	DESCRIPTION:	FDOT	FY 2018-19 STANDARD PLANS	GENERAL INFORMATION FOR TRAFFIC CONTROL THROUGH WORK ZONES	INDEX: 102-600	SHEET: 12 of 12
-------------------------	--------------	------	---------------------------	--	----------------	-----------------

LAST REVISION: 11/01/17	DESCRIPTION:	FDOT	FY 2018-19 STANDARD PLANS	GENERAL INFORMATION FOR TRAFFIC CONTROL THROUGH WORK ZONES	INDEX: 102-600	SHEET: 12 of 12
-------------------------	--------------	------	---------------------------	--	----------------	-----------------