

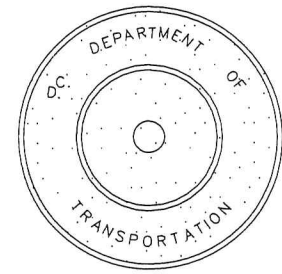
METHOD OF INSTALLATION:

1. AUGER A 12 INCH HOLE TO A DEPTH ABOUT 3 1/2 FEET.
2. DRIVE THE ROD MONUMENT INTO THE GROUND, A SECTION AT A TIME, TO REFUSAL. THE TOP OF THE LAST ROD SHOULD BE ABOUT 6 INCHES BELOW THE SURFACE.
3. PLACE THE FINNED SLEEVE (FILLED WITH GREASE) OVER THE ROD AND ADD A DATUM POINT.
4. PLACE A 6 INCH DIAMETER PVC PIPE 3 FEET LONG, WITH ACCESS COVER GLUED ON, OVER THE FINNED SLEEVE. PIPE SHOULD NOT TOUCH THE FINS. BACKFILL INSIDE THE PVC PIPE WITH SAND. BACKFILL THE HOLE WITH SAND. BACKFILL THE TOP 12 INCHES OF THE HOLE WITH CONCRETE.

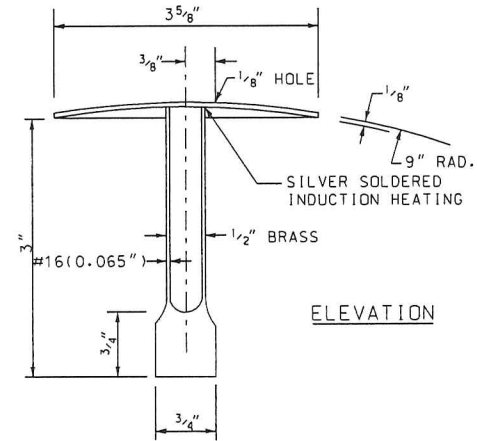
MATERIALS:

MATERIALS SHALL BE BERNTSEN SURVEY MONUMENTS OR APPROVED EQUAL.

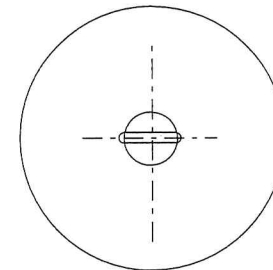
FIRST ORDER BENCHMARK



TOP VIEW



ELEVATION



BOTTOM VIEW

REFERENCE MARK

ISSUED: 8/2015

RECOMMENDED: *Adil Riaz*
PROJECT MANAGER

REVISION APPROVAL

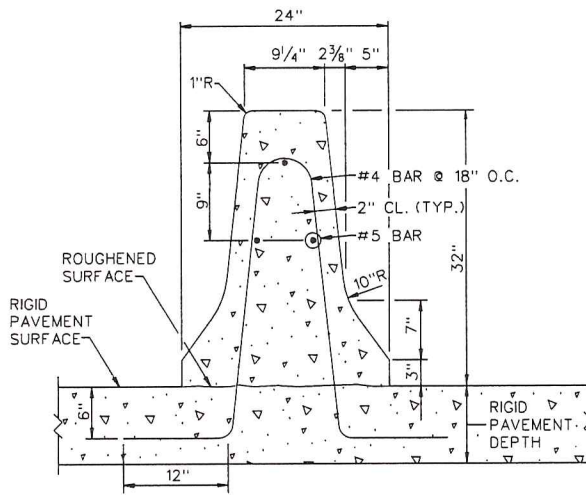
APPROVED: *Muhammed Khelid*
CHIEF ENGINEER

PERMANENT BENCHMARK AND REFERENCE MARK

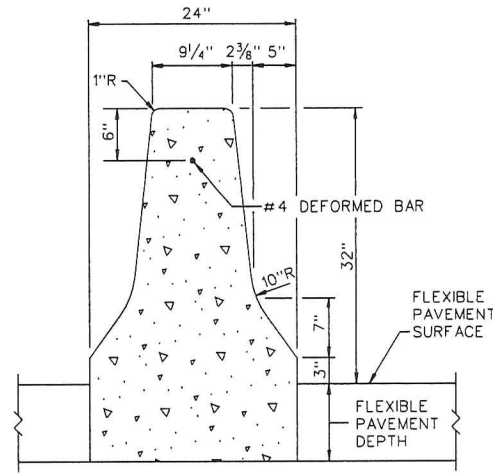
d.

DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

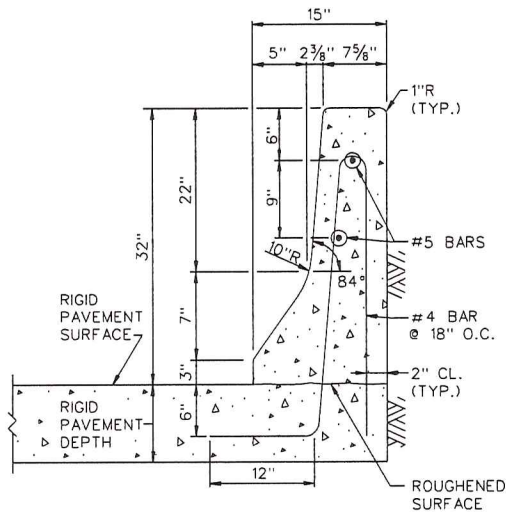
DWG. NO. 609.01



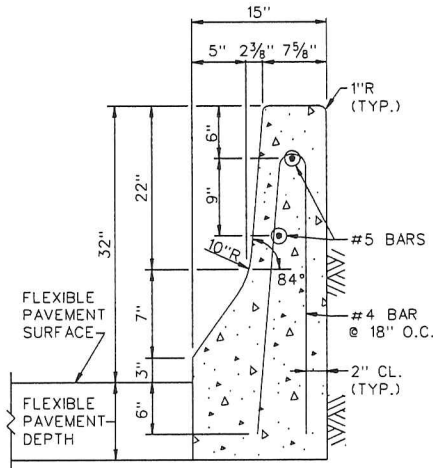
TYPICAL F-SHAPE
(DOUBLE FACE ROADWAY BARRIER - RIGID PAVEMENT)



TYPICAL F-SHAPE
(DOUBLE FACE ROADWAY BARRIER - FLEXIBLE PAVEMENT)



TYPICAL F-SHAPE
(SINGLE FACE ROADWAY BARRIER - RIGID PAVEMENT)



TYPICAL F-SHAPE
(SINGLE FACE ROADWAY BARRIER - FLEXIBLE PAVEMENT)

NOTES:

1. TYPE AND LOCATION OF CONSTRUCTION JOINTS SHALL MATCH THE PAVEMENT JOINTS.
2. CONTRACTION JOINTS SHALL BE FORMED AS PLANES OF WEAKNESS AS SPECIFIED IN THE STANDARD SPECIFICATIONS, SECTION 501.14.
3. EXPANSION JOINTS SHALL BE OF PREFORMED JOINT MATERIAL MEETING THE REQUIREMENTS OF AASHTO, M-153, TYPE II. JOINT MATERIAL SHALL BE 1/2 IN. THICK UNLESS OTHERWISE SPECIFIED AND SHALL BE RECESSED 1/2 IN. FROM THE FACES AND TOP OF THE BARRIER.
4. WHEN THE PCC PAVEMENT JOINTS ON EACH SIDE OF THE BARRIER DO NOT ALIGN TRANSVERSELY, THE JOINT PATTERN ON THE BARRIER SHALL ALIGN WITH PAVEMENT PATTERN ON ONE SIDE. THE PAVEMENT JOINTS ON THE OTHER SIDE OF THE BARRIER SHALL NOT CARRY THROUGH THE BARRIER.
5. WHEN CONSTRUCTED WITH FLEXIBLE PAVEMENT, THE BARRIER SHALL HAVE PLANE OF WEAKNESS JOINTS 15'-0" ON CENTERS AND EXPANSION JOINTS 45'-0" ON CENTERS.
6. CONCRETE SHALL BE CLASS B.
7. SINGLE FACE BARRIER MAY HAVE A SOIL OR WALL BACKUP. SEE CONTRACT DOCUMENTS.
8. SIMILAR DETAIL MAY BE USED WHEN ADDING BARRIER TO AN EXISTING RIGID PAVEMENT ROADWAY.
9. THE USE OF PCC BARRIERS AS A PARAPET WALL OR OTHER SIMILAR STRUCTURE(S) AND ITS DESIGN AND REINFORCEMENT SHALL BE AS PER THE CONTRACT DOCUMENTS.

ISSUED: 8/2015

RECOMMENDED:

Adil Raza
PROJECT MANAGER

REVISION APPROVAL

APPROVED:

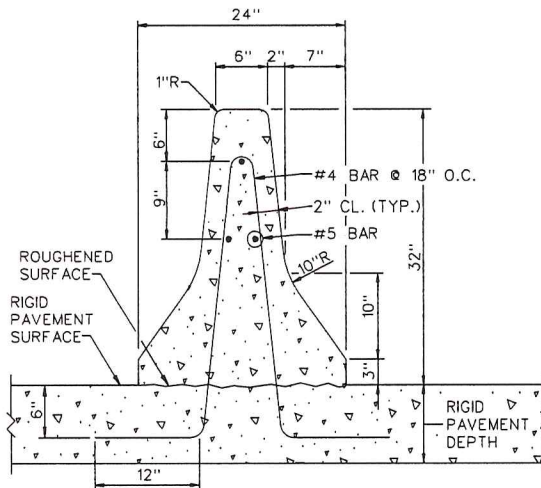
Muhammed Khalid
CHIEF ENGINEER

PERMANENT PCC BARRIER
F - SHAPE

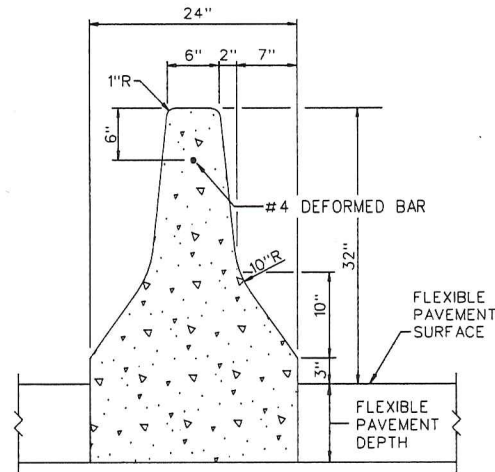
d.

DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

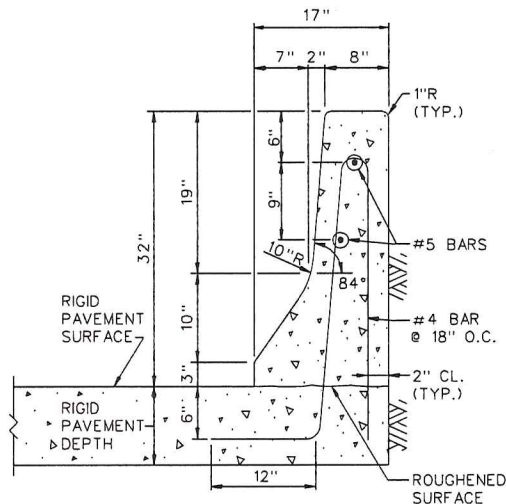
DWG. NO. 610.01



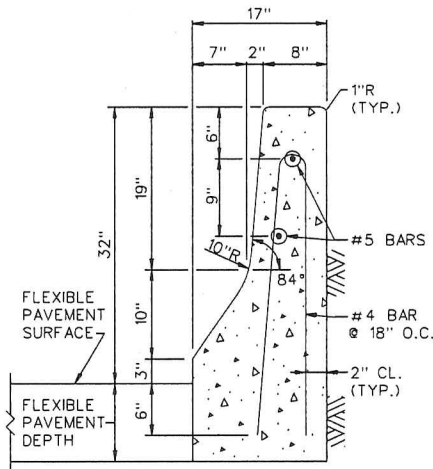
TYPICAL NEW JERSEY-SHAPE
(DOUBLE FACE ROADWAY BARRIER - RIGID PAVEMENT)



TYPICAL NEW JERSEY-SHAPE
(DOUBLE FACE ROADWAY BARRIER - FLEXIBLE PAVEMENT)



TYPICAL NEW JERSEY-SHAPE
(SINGLE FACE ROADWAY BARRIER - RIGID PAVEMENT)



TYPICAL NEW JERSEY-SHAPE
(SINGLE FACE ROADWAY BARRIER - FLEXIBLE PAVEMENT)

NOTES:

1. TYPE AND LOCATION OF CONSTRUCTION JOINTS SHALL MATCH THE PAVEMENT JOINTS.
2. CONTRACTION JOINTS SHALL BE FORMED AS PLANES OF WEAKNESS AS SPECIFIED IN THE STANDARD SPECIFICATIONS, SECTION 501.14.
3. EXPANSION JOINTS SHALL BE OF PREFORMED JOINT MATERIAL MEETING THE REQUIREMENTS OF AASHTO, M-15.3, TYPE II. JOINT MATERIAL SHALL BE 1/2 IN. THICK UNLESS OTHERWISE SPECIFIED AND SHALL BE RECESSED 1/2 IN. FROM THE FACES AND TOP OF THE BARRIER.
4. WHEN THE PCC PAVEMENT JOINTS ON EACH SIDE OF THE BARRIER DO NOT ALIGN TRANSVERSELY, THE JOINT PATTERN ON THE BARRIER SHALL ALIGN WITH PAVEMENT PATTERN ON ONE SIDE. THE PAVEMENT JOINTS ON THE OTHER SIDE OF THE BARRIER SHALL NOT CARRY THROUGH THE BARRIER.
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8. SIMILAR DETAIL MAY BE USED WHEN ADDING BARRIER TO AN EXISTING RIGID PAVEMENT ROADWAY.
9. THE USE OF PCC BARRIERS AS A PARAPET WALL OR OTHER SIMILAR STRUCTURE(S) AND ITS DESIGN AND REINFORCEMENT SHALL BE AS PER THE CONTRACT DOCUMENTS.

ISSUED: 8/2015

RECOMMENDED

Adil Raza
PROJECT MANAGER

REVISION APPROVAL

APPROVED:

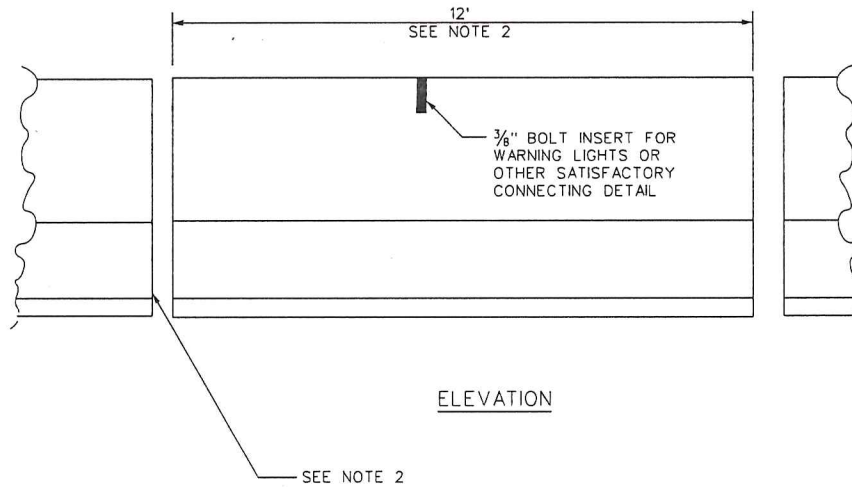
Muhammed Khalid
CHIEF ENGINEER

PERMANENT PCC BARRIER
NEW JERSEY - SHAPE

d.

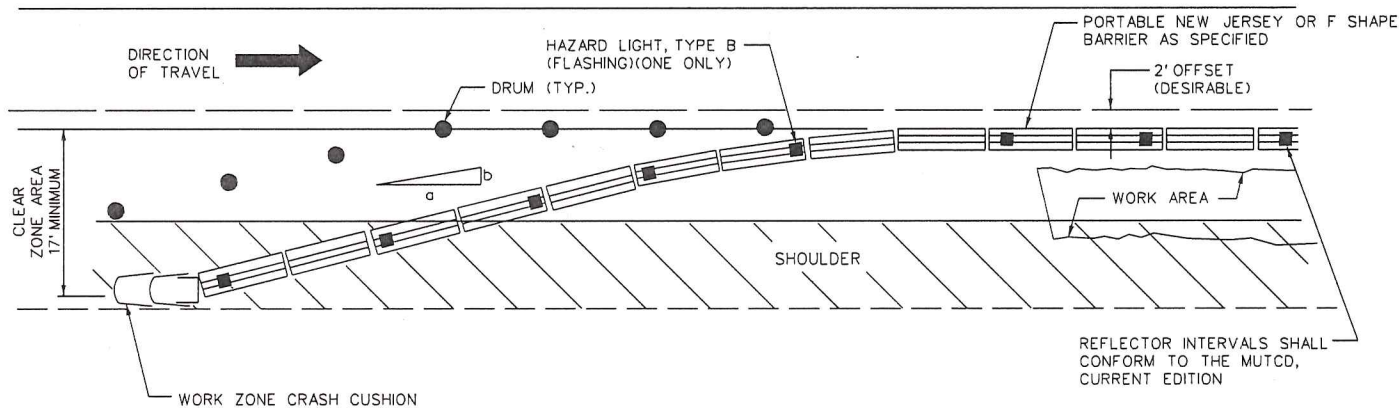
DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 610.02



NOTES:

1. THE SECTION SHALL BE THE NEW JERSEY OR F SHAPE.
2. THE UNIT LENGTH, REINFORCING, CONNECTION AND OTHER DETAILS VARY WITH MANUFACTURERS.
3. BARRIER TO BE USED MUST BE APPROVED BY DDOT PRIOR TO INSTALLATION.
4. CONTRACTOR SHALL SUBMIT NCHRP REPORT 350, TL-3 CERTIFICATION.



TYPICAL INSTALLATION

MINIMUM BARRIER FLARE RATE, a:b

- 60 MPH = 13:1
- 50 MPH = 11:1
- 40 MPH = 9:1
- 30 MPH = 6:1

ISSUED: 8/2015

RECOMMENDED

Adil Raza
PROJECT MANAGER

APPROVED:

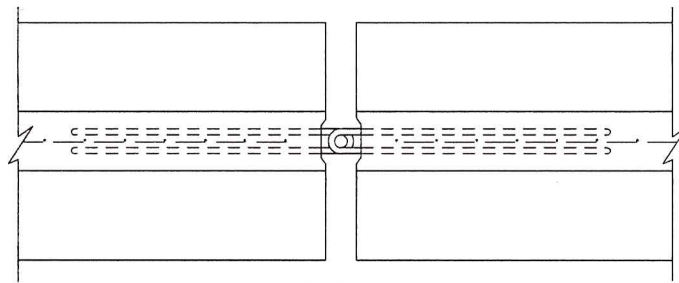
Mohammed Khalid
CHIEF ENGINEER

PRECAST TEMPORARY CONCRETE
BARRIER FOR TRAFFIC
MAINTENANCE DURING
FREEWAY CONSTRUCTION

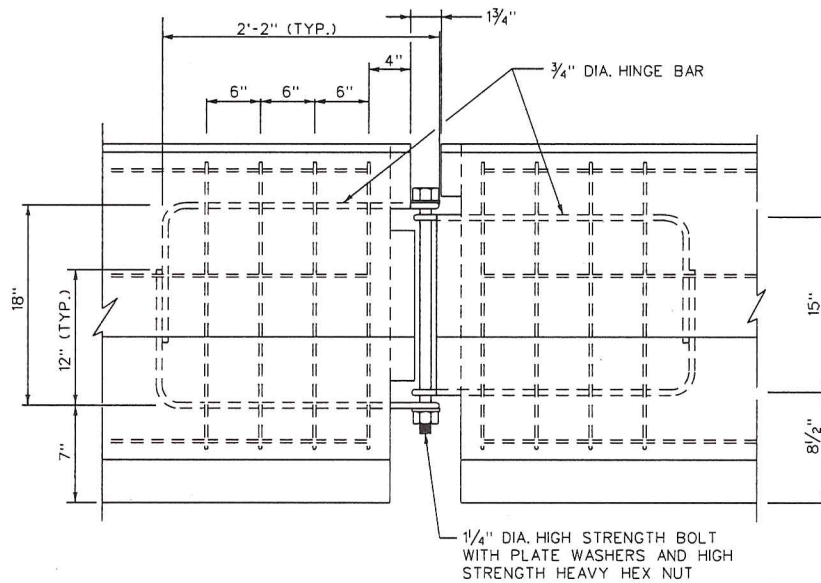
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DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

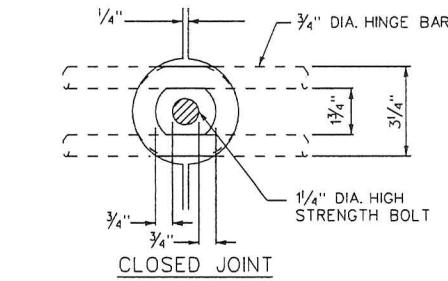
DWG. NO. 610.03



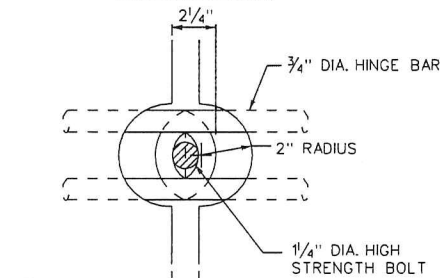
PLAN
(CONNECTOR PIN NOT SHOWN)



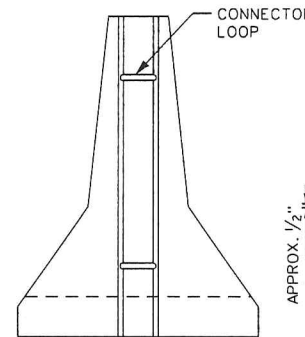
ELEVATION
JOINT DETAIL



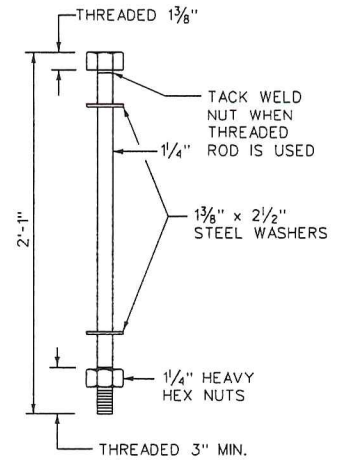
CLOSED JOINT



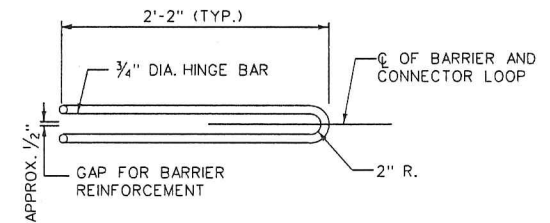
OPEN JOINT



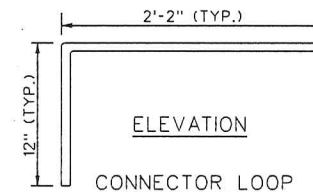
END VIEW



CONNECTOR PIN



PLAN



ELEVATION

CONNECTOR LOOP

NOTE:

- CONTRACTOR SHALL SUBMIT SHOP DRAWINGS FOR APPROVAL OF ALL PIN AND LOOP TYPE CONNECTIONS AND NCHRP REPORT 350, TL-3 CERTIFICATIONS.

ISSUED: 8/2015

RECOMMENDED: *Artur Paj*
PROJECT MANAGER

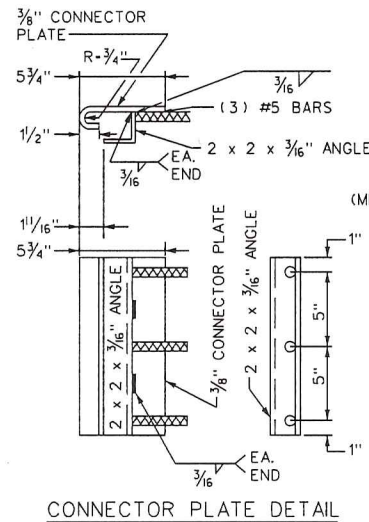
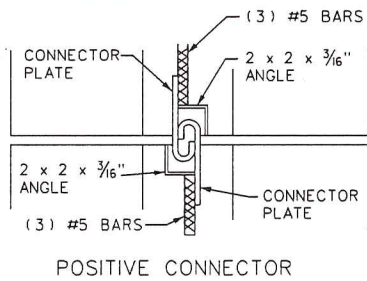
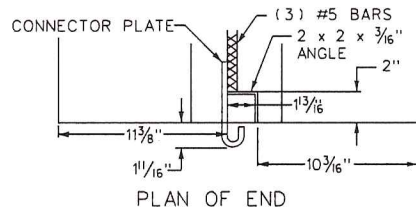
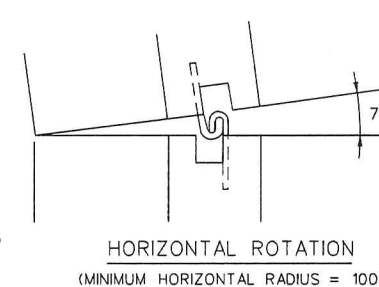
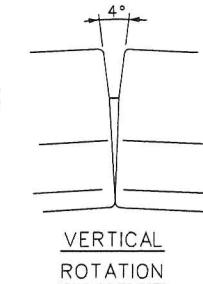
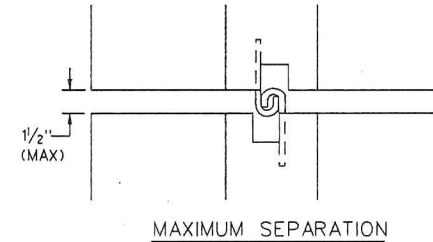
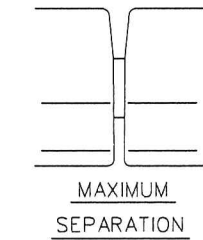
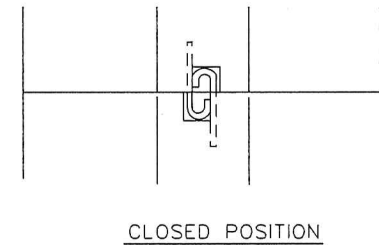
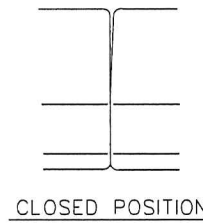
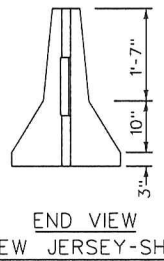
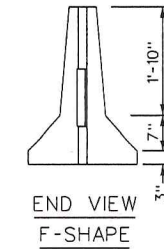
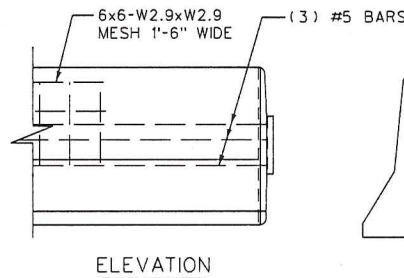
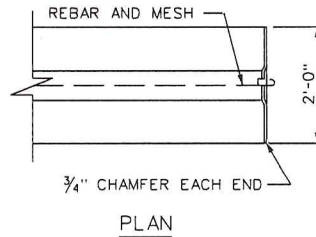
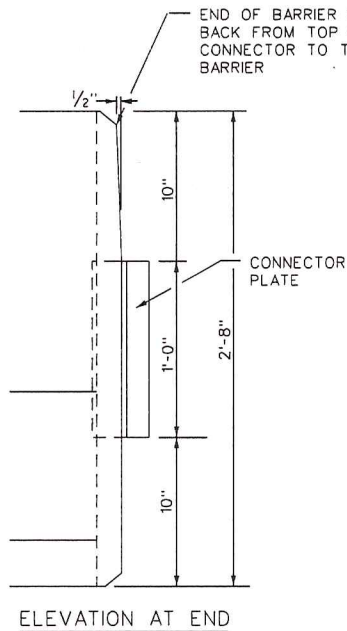
APPROVED: *Muhammed Kheid*
CHIEF ENGINEER

TEMPORARY CONCRETE BARRIER
TYPICAL JOINT CONNECTION DETAILS
PIN AND LOOP TYPE CONNECTION

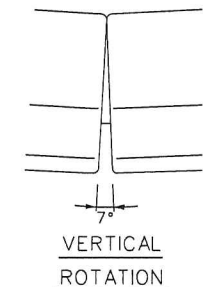
d.

DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 610.04



(MINIMUM VERTICAL CURVE RADIUS = 175')



(MIN. VERTICAL CURVE RADIUS = 100')

NOTES:

1. CLASS B CONCRETE MINIMUM STRENGTH - 4500 PSI
2. TOLERANCES - CONNECTOR LOCATION ± 1/16" BARRIER LENGTH ± 1/4", CHAMFER 3/4" CONNECTOR PLATE SIZE ± 1/8"
3. STEEL: ASTM A36 PLATE
ASTM A706 GRADE 60 REBAR
AASHTO MESH • WELDED WIRE FABRIC FOR CONCRETE
4. BARRIER SHALL BE SET IN TENSION.
5. BARRIER CONNECTION SYSTEMS SHALL BE NCHRP REPORT 350, TL-3 CERTIFIED.

ISSUED: 8/2015

RECOMMENDED:

Adil Raza
PROJECT MANAGER

APPROVED:

Muhammed Khalid
CHIEF ENGINEER

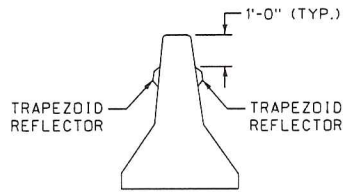
TEMPORARY CONCRETE BARRIER
JOINT CONNECTION DETAILS
PROPRIETARY J-J HOOK CONNECTION

d.

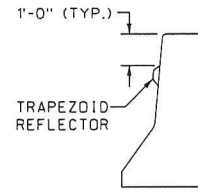
DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 610.05

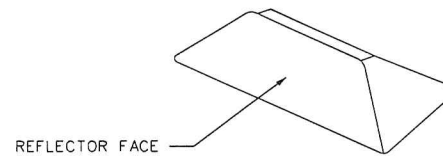
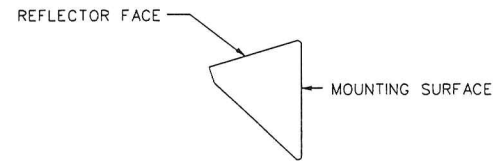
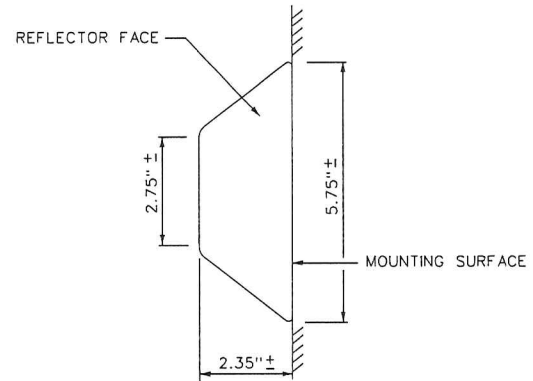
GENERAL SIZE AND SHAPE



SOLID MEDIAN BARRIER



SINGLE FACE BARRIER



YELLOW OR WHITE
1-WAY
REFLECTIVE SURFACE

NOTES:

1. SPACING OF REFLECTORS SHALL BE APPROXIMATELY 50 FEET OR AS SHOWN ON CONTRACT PLANS.
2. COLOR OF THE REFLECTOR IS DETERMINED BASED ON THE DIRECTION IN WHICH TRAFFIC MOVES; WHITE REFLECTORS SHALL BE USED ON THE RIGHT BARRIER, YELLOW REFLECTORS USED ON THE LEFT BARRIER.
3. THE REFLECTOR SHALL BE AN ALL PLASTIC BODY WHICH UTILIZES ADHESIVE MOUNTING TO THE CONCRETE SURFACE.

ISSUED:	8/2015
REVISION	APPROVAL

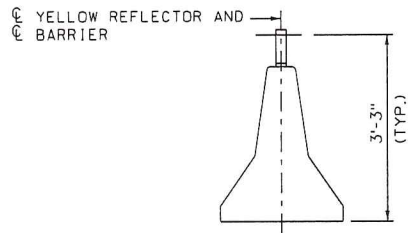
RECOMMENDED: *Adil Raza*
PROJECT MANAGER

APPROVED: *Muhammed Kholid*
CHIEF ENGINEER

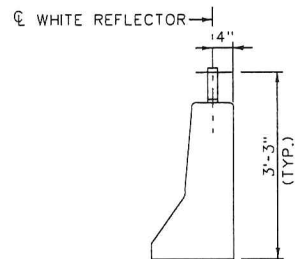
CONCRETE BARRIER REFLECTORS
SIDE MOUNTED

d. DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

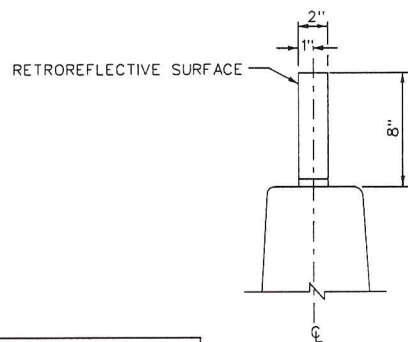
DWG. NO. 610.06



SOLID MEDIAN BARRIER

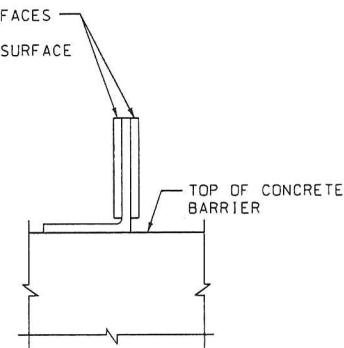


SINGLE FACE BARRIER



END VIEW

(2) RETROREFLECTIVE SURFACES
(MEDIAN BARRIER ONLY)
SINGLE RETROREFLECTIVE SURFACE
(ALL OTHER BARRIERS)



SIDE VIEW

SPACING OF REFLECTORS	
RADIUS OF HORIZ. CURVE	C/C DIST. BETWEEN REFLECTORS
LESS THAN 2000'	115'
2000' TO 3000'	130'
3000' TO 5000'	160'
OVER 5000'	200'
TANGENT AREAS	200'

ISSUED: 8/2015

RECOMMENDED:

Attilio Pignatelli
PROJECT MANAGER

REVISION APPROVAL

APPROVED:

Muhammed Khelid
CHIEF ENGINEER

CONCRETE BARRIER REFLECTORS
TOP MOUNTED

d.

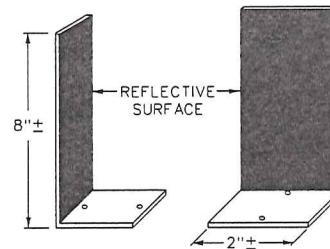
DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 610.07

REFLECTOR BODY

THE REFLECTOR SHALL BE MADE OF A HIGH IMPACT, WEATHERABLE, ENGINEERING THERMO-PLASTIC MATERIAL WHICH CONFORMS TO THE FOLLOWING:

PROPERTY	RESULT	METHOD ASTM TEST
THICKNESS (MIN.)	0.90"	-
TENSILE STRENGTH (MIN)	5,500	D638
IMPACT STRENGTH @ 20° F (FT-LBS/IN AT NOTCH)	3.2	D256 METHOD A
IMPACT STRENGTH @73° F (FT-LBS/IN AT NOTCH)	140	D256 METHOD A
FLEXURAL STRENGTH PSI @ 73° F	8,000	D790
FLEXURAL MODULUS PSI @ 73° F	300,000	D790
ELONGATION @ YIELD	30%	D638

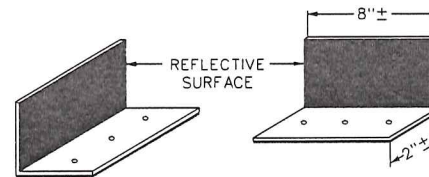


AMBER OR WHITE 1-WAY, REFLECTIVE SHEETING ON SURFACE

REFLECTIVE SURFACE

THE REFLECTOR SHALL BE A RETRO-REFLECTIVE ACRYLIC MICROPRISM MATERIAL WITH ACRYLIC BACKING, WITH A MINIMUM AREA OF 16 SQ. IN. PROVIDING THE FOLLOWING MINIMUM OPTICAL PERFORMANCE WITH AN OBSERVATION ANGLE OF 0.1° MEASURE IN CANDLEPOWER:

ENTRANCE ANGLE	SPECIFIC INTENSITY
AMBER 4°	75
AMBER 30°	36
WHITE 4°	125
WHITE 30°	55



CONCRETE BARRIER REFLECTOR

INSTALLATION

THE REFLECTOR SHALL BE MOUNTED TO THE TOP OF THE CONCRETE BARRIER AS SPECIFIED BY THE MANUFACTURER.

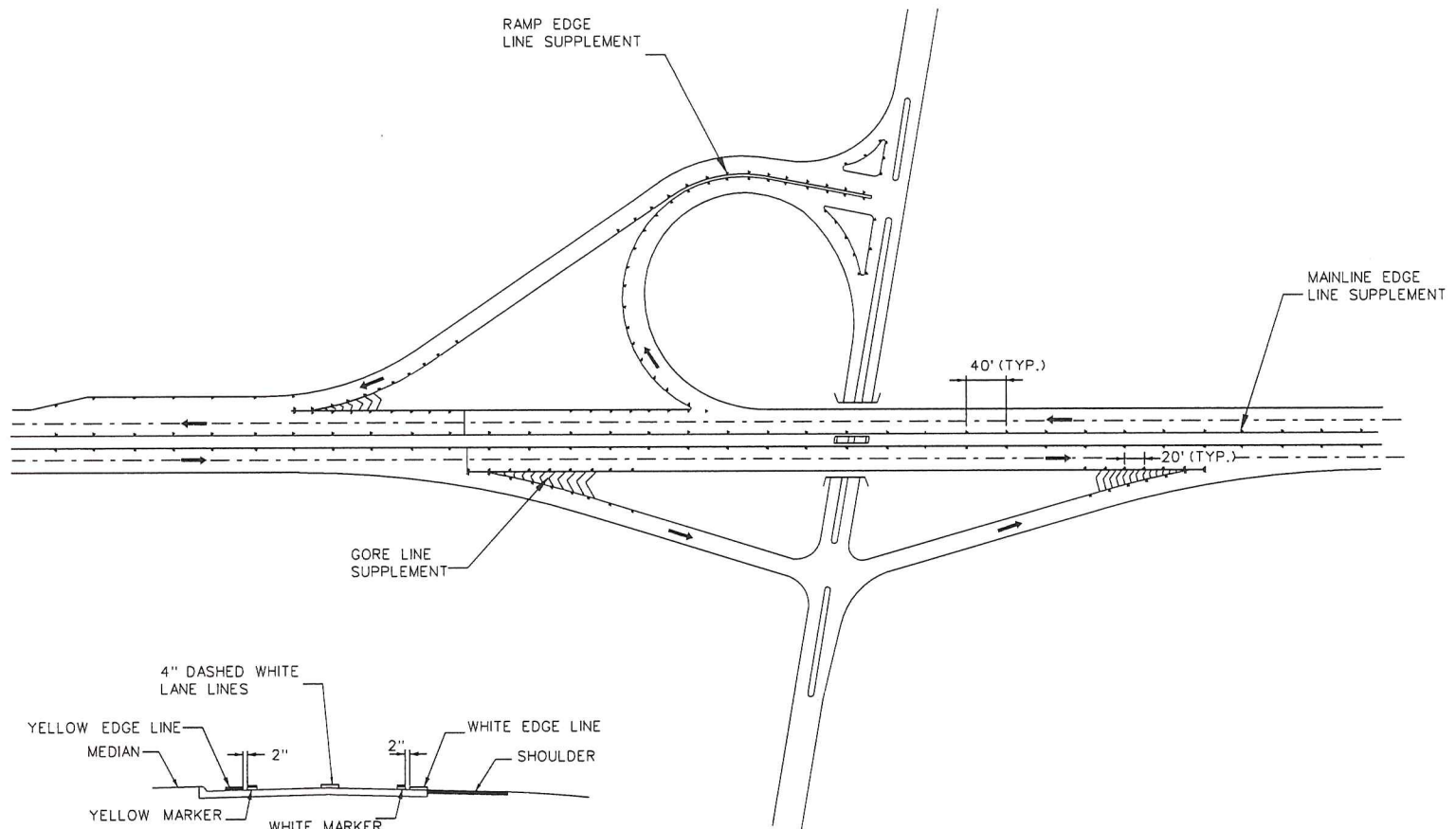
ISSUED: 8/2015	RECOMMENDED
REVISION	APPROVAL


 PROJECT MANAGER
 APPROVED: 
 CHIEF ENGINEER

CONCRETE BARRIER REFLECTORS SPECIFICATIONS

d. DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 610.08



TYPICAL ROADWAY SECTION SHOWING
LOCATION OF RAISED MARKERS

NOTES:

FOR DETAILS OF RECESSED RAISED REFLECTIVE MARKER,
SEE DRAWING NO. 612.02.

ISSUED: 8/2015

REVISION	APPROVAL

RECOMMENDED:

Adil Raza
PROJECT MANAGER

APPROVED:

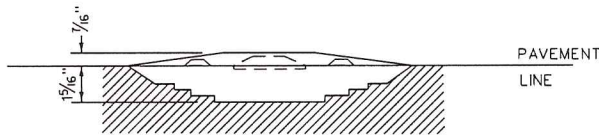
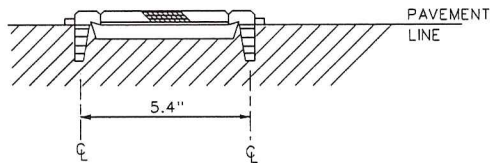
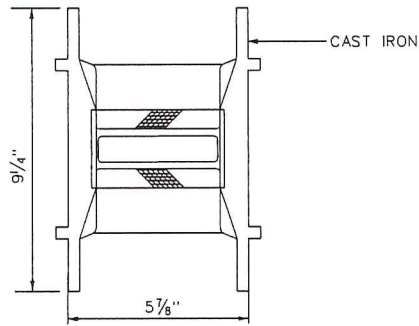
Muhammed Kholid
CHIEF ENGINEER

RAISED REFLECTIVE PAVEMENT
MARKERS TYPICAL LOCATION

d.

DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

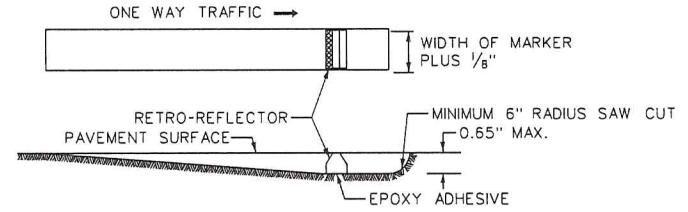
DWG. NO. 612.01



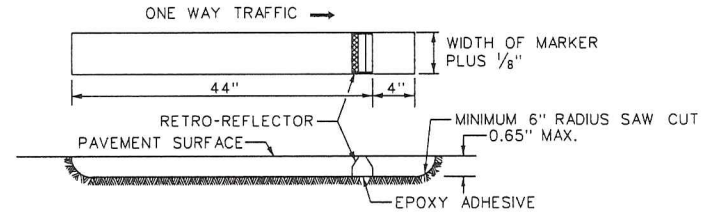
TYPICAL RECESSED RAISED REFLECTIVE PAVEMENT MARKERS

NOTES:

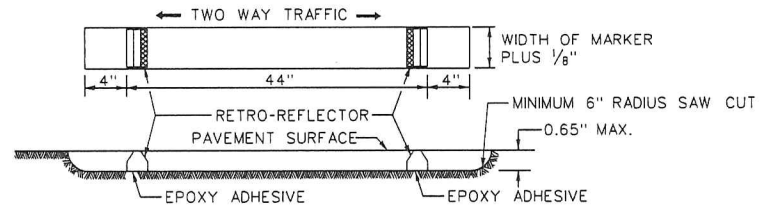
1. SURFACE MOUNT MARKERS ARE NORMALLY USED. RECESSED MARKERS MAY BE SPECIFIED IN CERTAIN ROADWAY AREAS WHERE CONSIDERATION FOR SNOW PLOWING CONDITIONS WARRANT.
2. SLOT IN PAVEMENT SURFACE FOR CAST IRON BODY IS TO BE PROVIDED BY GRINDING.



STANDARD METHOD - ONE WAY TRAFFIC



ALTERNATE METHOD - ONE WAY TRAFFIC



STANDARD METHOD - TWO WAY TRAFFIC

TYPICAL RECESSED RAISED PAVEMENT MARKER SLOT DETAILS

ISSUED: 8/2015

REVISION APPROVAL

RECOMMENDED: *Adil Raza*
PROJECT MANAGER

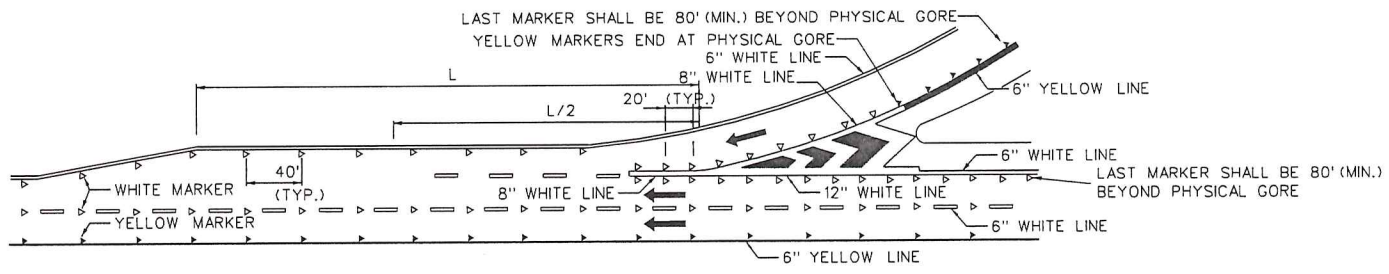
APPROVED: *Muhammed Khalid*
CHIEF ENGINEER

RECESSED RAISED
REFLECTIVE PAVEMENT MARKERS

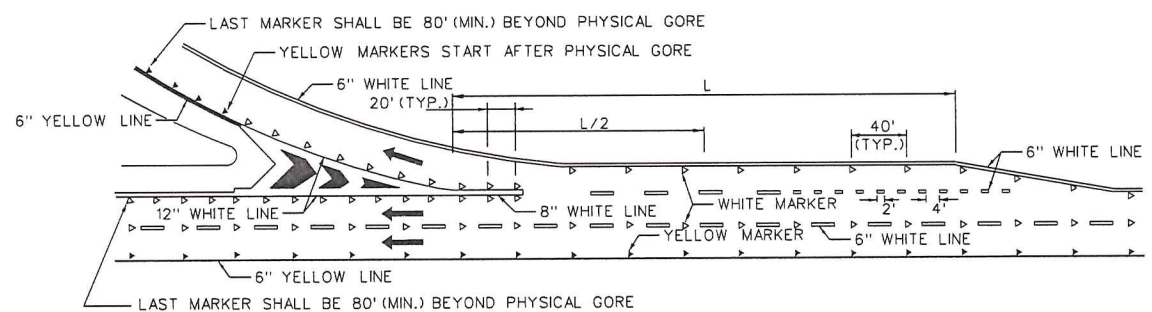
d.

DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

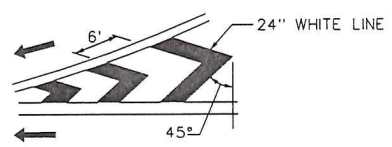
DWG. NO. 612.02



PARALLEL ACCELERATION LANE



PARALLEL DECELERATION LANE



GORE AREA HATCHING

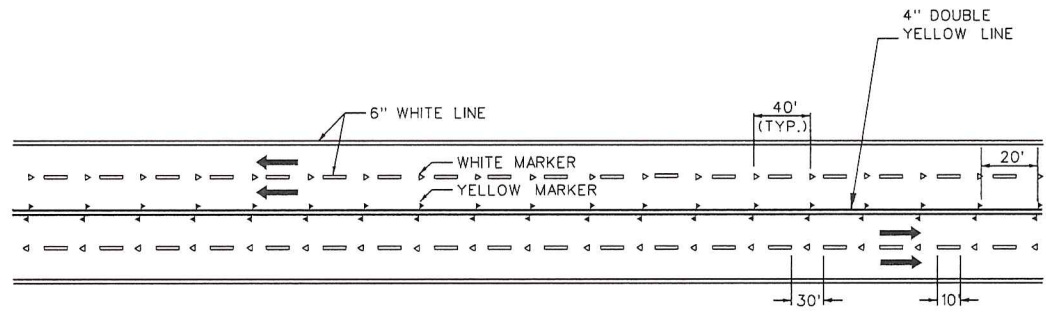
NOTE:
L = LENGTH OF ACCELERATION/DECELERATION LANE.

ISSUED: 8/2015		RECOMMENDED: <i>Adil Riaz</i>
REVISION	APPROVAL	PROJECT MANAGER
APPROVED: <i>Muhammed Kholid</i>		CHIEF ENGINEER

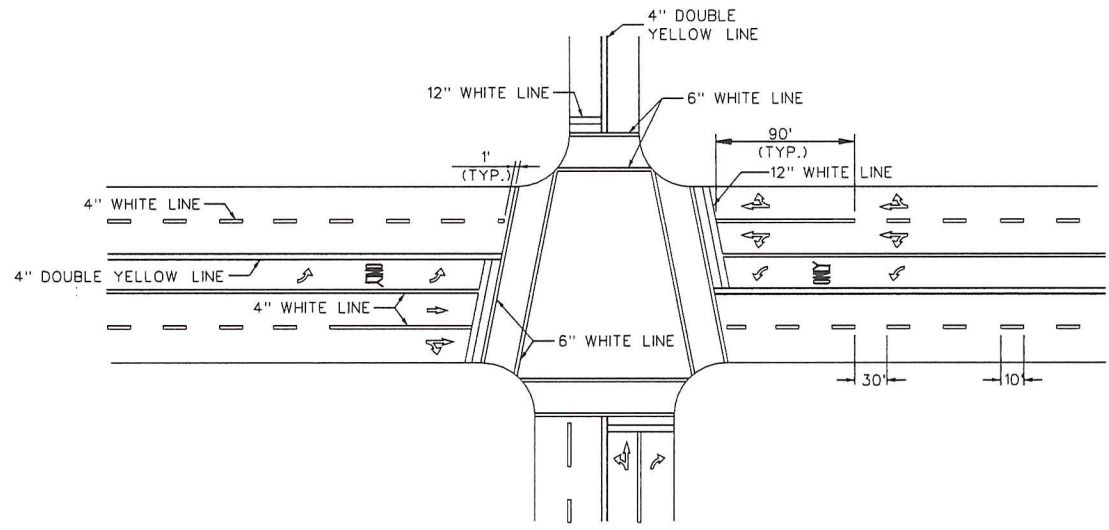
RAISED REFLECTIVE PAVEMENT MARKERS AND PAVEMENT MARKINGS 1

d. DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 612.03



MULTIPLE LANE MAJOR ROADWAY



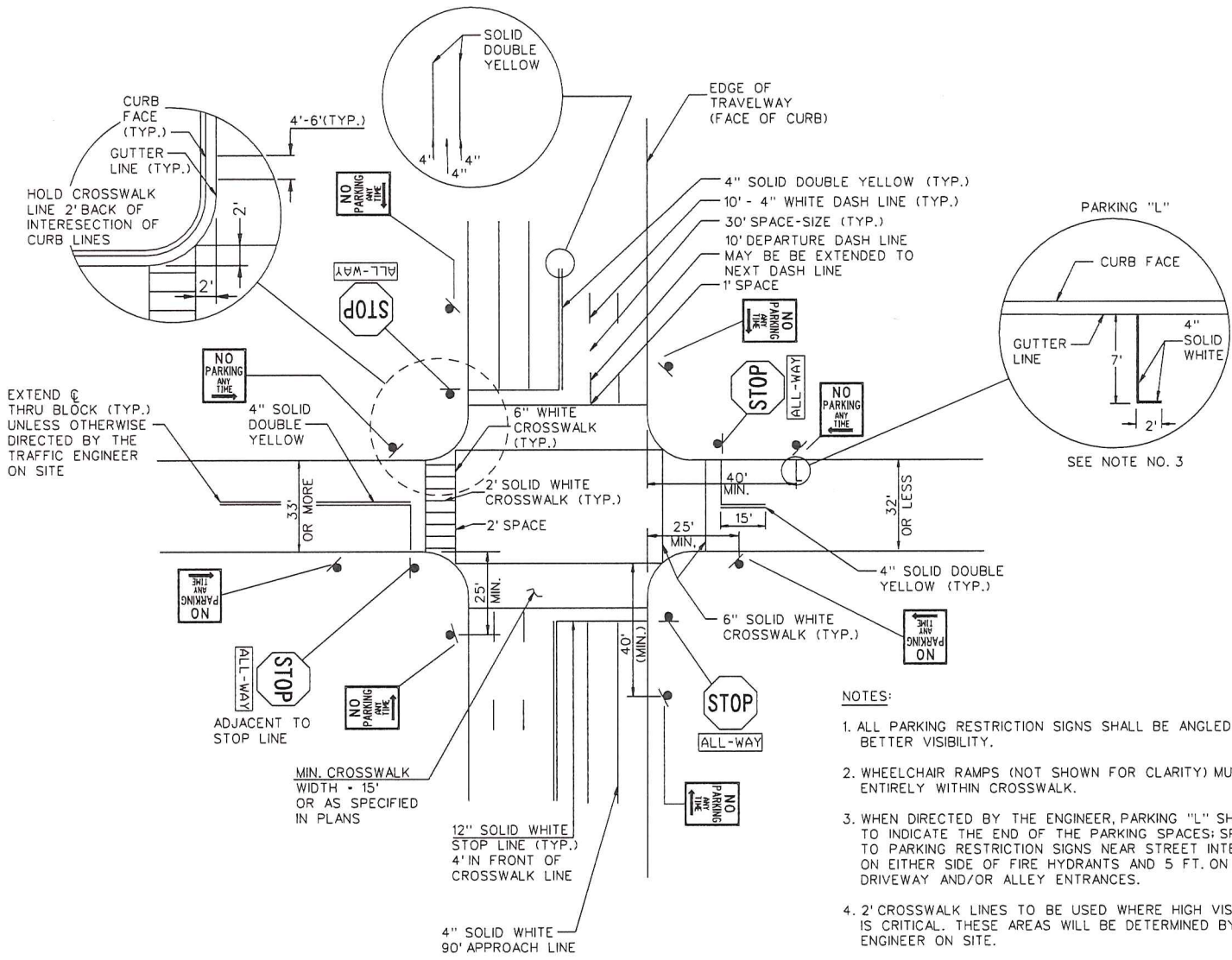
CITY STREET

ISSUED: 8/2015	RECOMMENDED: <i>Adil Riaz</i>
REVISION	APPROVAL
	PROJECT MANAGER
	APPROVED: <i>Muhammed Kholid</i>
	CHIEF ENGINEER

RAISED REFLECTIVE PAVEMENT MARKERS AND PAVEMENT MARKINGS 2

d. DISTRICT OF COLUMBIA DEPARTMENT OF TRANSPORTATION

DWG. NO. 612.04



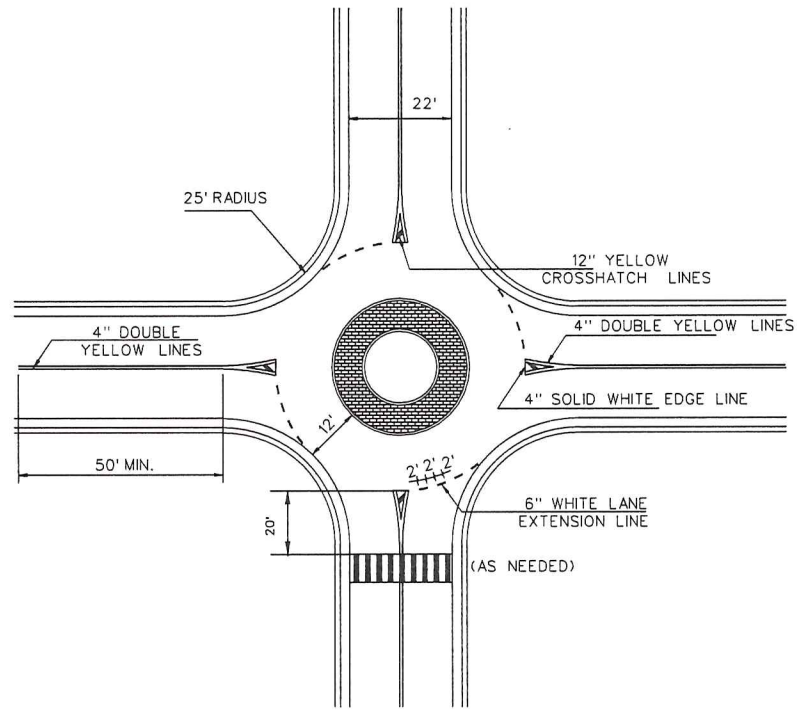
- NOTES:**
1. ALL PARKING RESTRICTION SIGNS SHALL BE ANGLED \circ 45 DEGREES FOR BETTER VISIBILITY.
 2. WHEELCHAIR RAMPS (NOT SHOWN FOR CLARITY) MUST BE LOCATED ENTIRELY WITHIN CROSSWALK.
 3. WHEN DIRECTED BY THE ENGINEER, PARKING "L" SHALL BE PLACED TO INDICATE THE END OF THE PARKING SPACES; SPECIFICALLY, ADJACENT TO PARKING RESTRICTION SIGNS NEAR STREET INTERSECTIONS, 10 FT. ON EITHER SIDE OF FIRE HYDRANTS AND 5 FT. ON EITHER SIDE OF DRIVEWAY AND/OR ALLEY ENTRANCES.
 4. 2' CROSSWALK LINES TO BE USED WHERE HIGH VISIBILITY OF CROSSWALK IS CRITICAL. THESE AREAS WILL BE DETERMINED BY THE TRAFFIC ENGINEER ON SITE.
 5. PAVEMENT MARKINGS SHALL NOT BE APPLIED IN THE GUTTER AREA OR ATOP SURFACE STRUCTURES SUCH AS MANHOLE COVERS, VALVES, VAULTS, ETC.

ISSUED:	8/2015	RECOMMENDED:	<i>Adil Raza</i>
REVISION	APPROVAL		PROJECT MANAGER
		APPROVED:	<i>Muhammed Khelid</i>
			CHIEF ENGINEER

**TYPICAL
PAVEMENT MARKING APPLICATIONS
AND INTERSECTION SIGNING**

d. DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 612.05



TYPICAL ROUNDABOUT MARKINGS

NOTES:

1. FOR MORE TYPICAL SECTIONS ON OTHER TYPES OF ROUNDABOUTS REFER TO MUTCD.

ISSUED:	8/2015
REVISION	APPROVAL

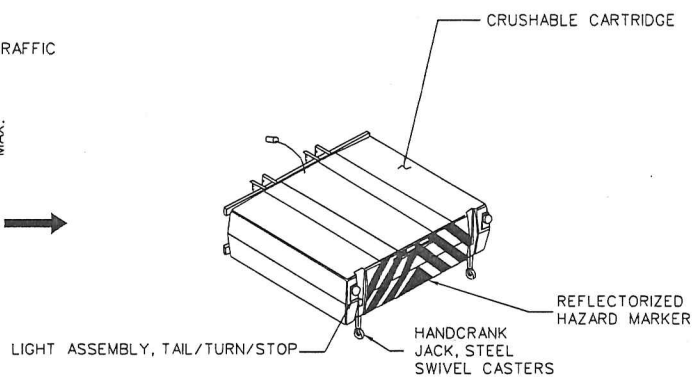
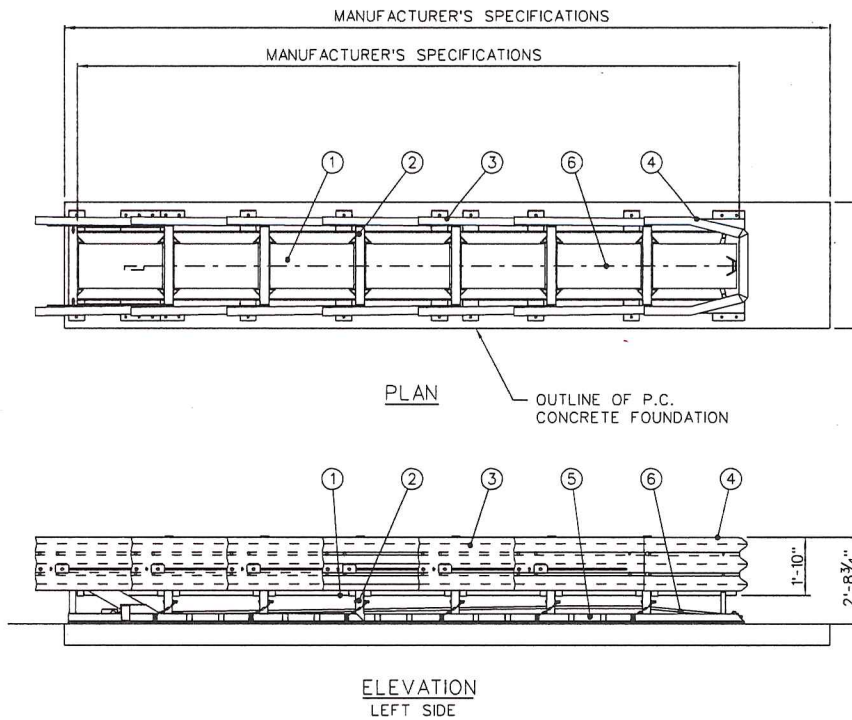
RECOMMENDED: *Adil Raj*
PROJECT MANAGER

APPROVED: *Muhammed Khalid*
CHIEF ENGINEER

TYPICAL
ROUNDABOUT MARKINGS
(LOCAL STREET TO LOCAL STREET,
NO PARKING)

d. DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 612.06



AS REQUIRED BY THE FEDERAL MOTOR VEHICLES SAFETY STANDARDS (FMVSS) 108.
 WIDTH: 95" MAX.
 APPROXIMATE WEIGHT 1,400 LBS. (TYP.)
 ROAD CLEARANCE: 11-13 INCHES (TYP.)

CONSTRUCTION CRASH CUSHION

NOTES:

1. CRASH CUSHION SHALL BE INSTALLED ACCORDING TO MANUFACTURER'S SPECIFICATIONS.
2. NUMBER OF CARTRIDGES (BAYS) SHALL BE DETERMINED BY THE DESIGN SPEED (6 BAY SHOWN).
3. TRANSITION PANELS FOR THE SPECIFIC SITE BACKUP WALL SHALL BE SUPPLIED WITH THE CRASH CUSHION.
4. REFLECTORIZED TAPE ON NOSE OF CRASH CUSHION TO BE SPECIFIED IN THE SPECIAL PROVISIONS.
5. CROSS SLOPE OF UNIT NOT TO EXCEED 5%.

KEY

- ① CRUSHABLE CARTRIDGE
- ② DIAPHRAGM
- ③ FENDER PANEL
- ④ NOSE COVER
- ⑤ RAIL
- ⑥ BASE PLATE

NOTES:

1. THE TMA SHALL BE DESIGNED FOR INSTALLATION AT THE BACK OF TRUCKS WITH A 10,000 TO 35,000 LB. GROSS VEHICLE WEIGHT RATING.
2. ROLL DISTANCE OF THE TRUCK AND TMA COMBINED SHALL BE DESIGNED IN ACCORDANCE WITH TEST VEHICLE WEIGHTS AND SPEEDS AS SPECIFIED IN NCHRP #350, TL-3.

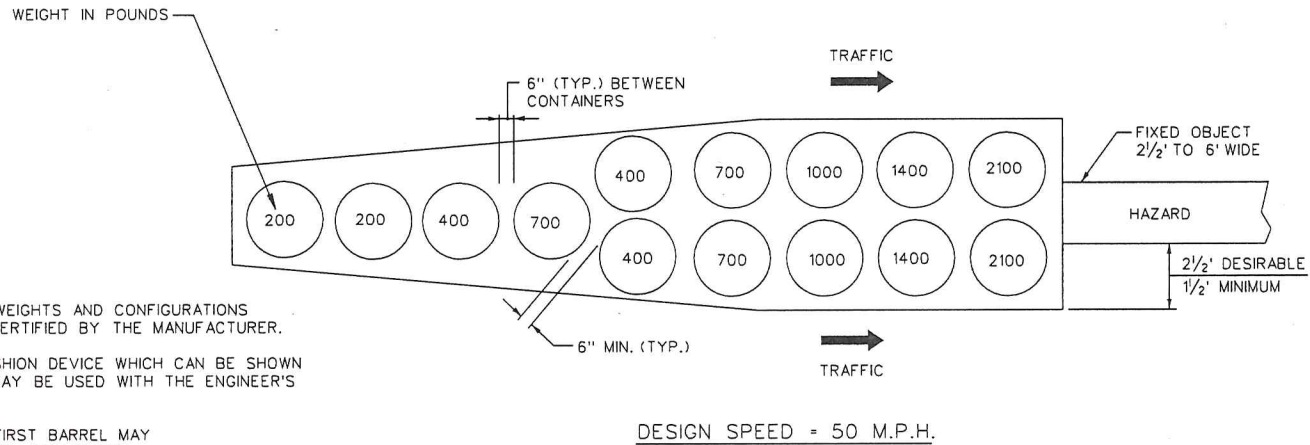
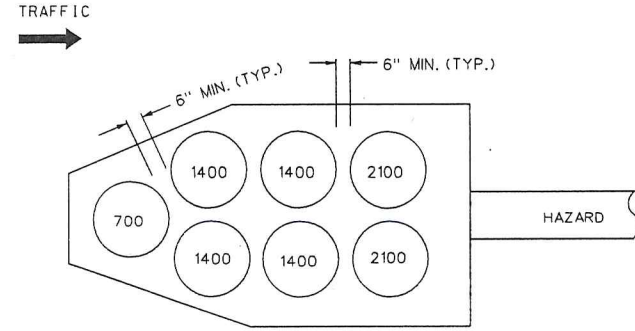
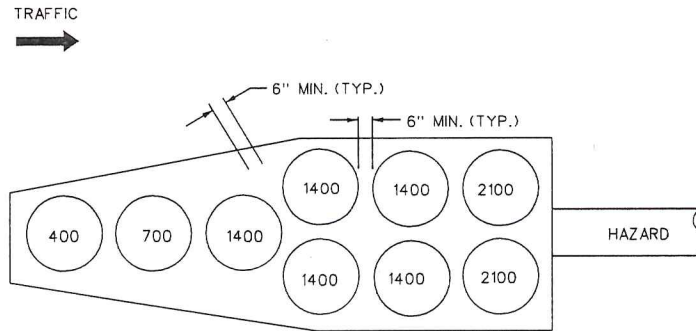
TYPICAL TRUCK MOUNTED ATTENUATOR (TMA)

ISSUED: 8/2015	RECOMMENDED
REVISION	APPROVAL
	<i>Adil Raza</i> PROJECT MANAGER
	APPROVED: <i>Muhammed Khelid</i> CHIEF ENGINEER

CONSTRUCTION ZONE CRASH CUSHION AND TRUCK MOUNTED ATTENUATOR (TMA)

d. DISTRICT OF COLUMBIA
 DEPARTMENT OF TRANSPORTATION

DWG. NO. 612.07



NOTES:

1. THE SAND FILLED BARREL WEIGHTS AND CONFIGURATIONS SHALL BE DESIGNED AND CERTIFIED BY THE MANUFACTURER.
2. ANY PORTABLE CRASH CUSHION DEVICE WHICH CAN BE SHOWN TO BE EQUAL OR SAFER MAY BE USED WITH THE ENGINEER'S APPROVAL.
3. REFLECTORIZED TAPE ON FIRST BARREL MAY BE SPECIFIED IN THE SPECIAL PROVISIONS.
4. SAND SHALL BE LOOSE IN COLD WEATHER, ADDITIVE MUST BE USED TO KEEP SAND FROM FREEZING.
5. CRASH CUSHION SHALL CONFORM TO THE REQUIREMENTS OF NCHRP REPORT 350, TL-2 AND TL-3.
6. DO NOT OBTRUST PEDESTRIAN PATHWAY.

ISSUED: 8/2015

RECOMMENDED:

Adil Raj
PROJECT MANAGER

REVISION APPROVAL

APPROVED:

Muhammed Khalid
CHIEF ENGINEER

**CRASH CUSHION
INERTIAL SYSTEM
UNIDIRECTIONAL**

d.

DISTRICT OF COLUMBIA
DEPARTMENT OF TRANSPORTATION

DWG. NO. 612.08