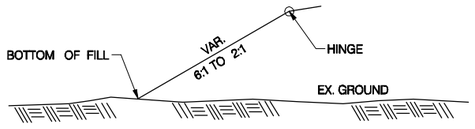
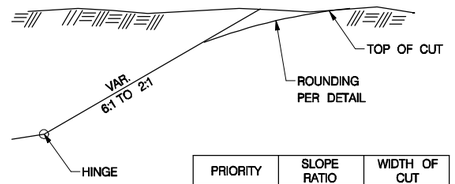
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		024	124



PRIORITY	SLOPE RATIO	WIDTH OF FILL
1	6:1	0' TO 20'
2	4:1	0' TO 20'
3	2:1	> 20'

DETAIL A

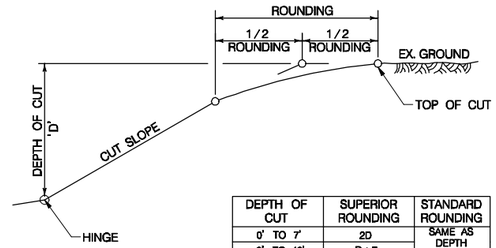
FILL SLOPE RATIOS



PRIORITY	SLOPE RATIO	WIDTH OF CUT
1	6:1	0' TO 20'
2	4:1	0' TO 20'
3	2:1	> 20'

DETAIL B

CUT SLOPE RATIOS

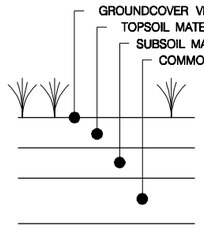


DEPTH OF CUT	SUPERIOR ROUNDING	STANDARD ROUNDING
0' TO 7'	2D	SAME AS DEPTH OF CUT (10' MAX)
8' TO 12'	D+7	
>12'	2D	

'D' = DEPTH OF CUT

DETAIL C

CUT SLOPE ROUNDING



SLOPE RATIO	DEPTH OF TOPSOIL	DEPTH OF SUBSOIL
6:1	6"	TBD
4:1	6"	TBD
2:1	2" TO 4"	TBD

NOTE: FOR EXISTING PAVEMENT REMOVAL, EXCAVATE AND REMOVE TO BOTTOM OF AGGREGATE BASE

DETAIL D

TOPSOIL, SUBSOIL, AND TURFGRASS ESTABLISHMENT

NOT FOR CONSTRUCTION

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USA
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Fax. 410.583.6704
www.stantec.com

NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013 | TS-08

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

TYPICAL SECTION

DETAILS

DIVISION CHIEF

DATE _____
FILE _____
SHEET 024 OF 124

Thursday, September 12, 2013 AT 03:30 PM
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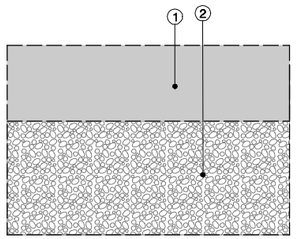
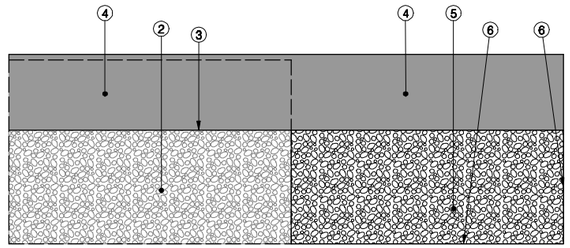
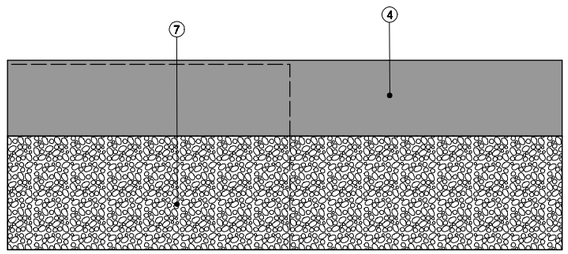
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		025	124



DETAIL O
EXISTING PAVEMENT



DETAIL A1
MILL / RESURFACE / WIDEN PAVEMENT (OPTION 1)



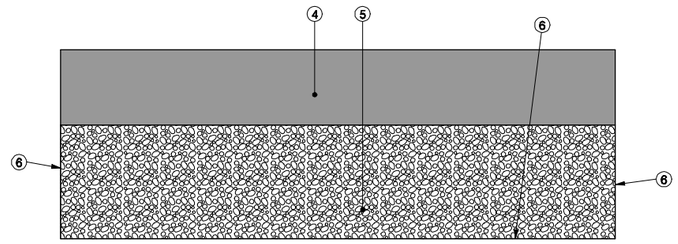
DETAIL A2
RECLAMATION / WIDEN PAVEMENT (OPTION 2)

NOTES:

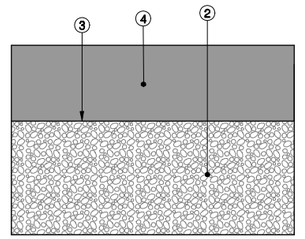
1. EX. PAVEMENT 1.5"–3"
2. EX. AGGREGATE BASE 4"–6"
3. MILL EX. PAVEMENT TO TOP OF EXISTING AGGREGATE BASE
4. 4" HOT MIX ASPHALT SUPERPAVE, PG 64–22, 12.5–mm SURFACE COURSE, (ITEM NO. 4.2010) (PLACE IN 2" LIFTS)
5. 6" AGGREGATE BASE COURSE (AS PER DDOT STANDARD SPECIFICATIONS SECTION 804.04(A))
6. GEOTEXTILE FOR SEPARATION
7. PULVERIZE AND COMPACT EX. PAVEMENT INTO RECLAIMED 8" AGGREGATE BASE. ADD CLEAN AGGREGATE AND SEALANT AS SPECIFIED.
8. CLEAN AND SEAL CRACKS IN EX. PAVEMENT; SCARIFY
9. TACK COAT
10. 2" HOT MIX ASPHALT SUPERPAVE, PG 64–22, 12.5–mm SURFACE COURSE, (ITEM NO. 4.2010) (PLACE IN 2" LIFTS)

NOTE: GEOTECHNICAL INVESTIGATION AND REPORT, DATED SEPTEMBER 6, 2013 PREPARED BY:

THOMAS L. BROWN ASSOCIATES, PC
A DIVISION OF SOIL AND LAND USE TECHNOLOGY, INC. (SaLUT)
1818 NEW YORK AVENUE, NE, SUITE 107
WASHINGTON, DC 20002
www.tlbinc.net



DETAIL B
NEW TRAIL



DETAIL C
MILL / RESURFACE PAVEMENT

NOT FOR CONSTRUCTION

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USA
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NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09–13–2013	SCALE: N.T.S.	PD–01

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI–USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

PAVEMENT DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 025 OF 124

Thursday, September 12, 2013 AT 03:30 PM
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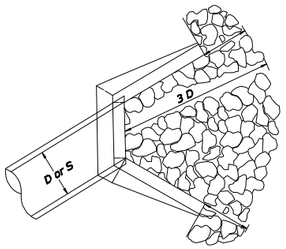
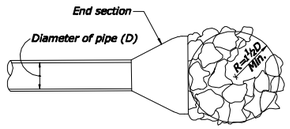
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		026	124

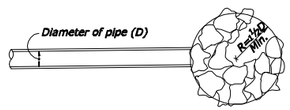
REG	STATE	PROJECT	SHEET NO.



PLAN

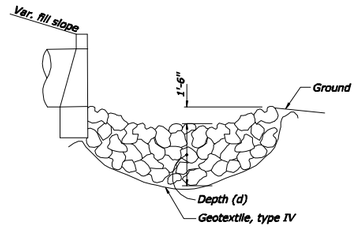


PLAN



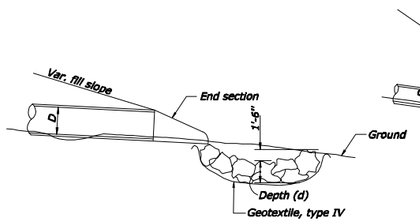
PLAN

DEPTH (d)	
Riprap Class	Depth (d)-(in)
2	18
3	24
4	30



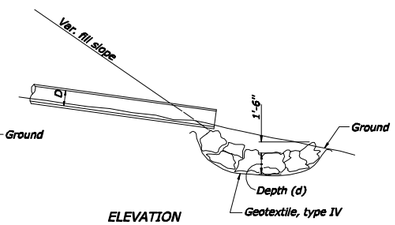
ELEVATION

CULVERT WITH HEADWALL



ELEVATION

CULVERT WITH END SECTION



ELEVATION

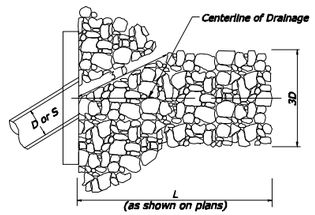
CULVERT WITH NO END TREATMENT

NOTE:
For arch or elliptical pipes, use equivalent diameter for (D) dimension

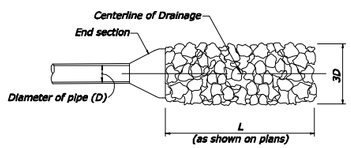
NO SCALE

U.S. DEPARTMENT OF TRANSPORTATION FEDERAL HIGHWAY ADMINISTRATION EASTERN FEDERAL LANDS HIGHWAY DIVISION	
U.S. CUSTOMARY DETAIL	
LOOSE RIPRAP AT CULVERT	
DETAIL APPROVED FOR USE	DETAIL
APPROVED : MAY 2011	E251-01

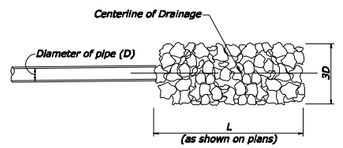
REG	STATE	PROJECT	SHEET NO.



PLAN

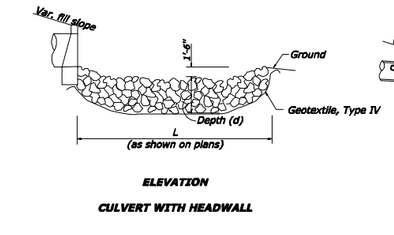


PLAN



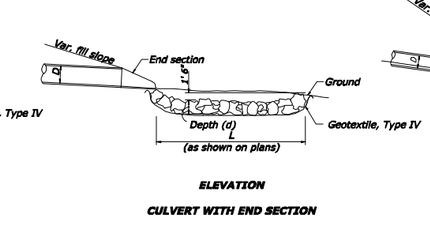
PLAN

DEPTH (d)	
Riprap Class	Depth (d)-(in)
2	18
3	24
4	30



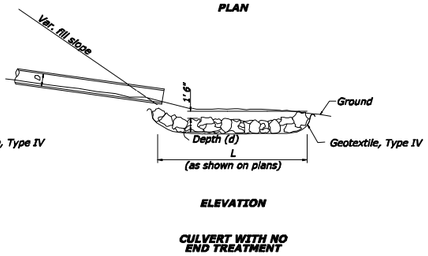
ELEVATION

CULVERT WITH HEADWALL



ELEVATION

CULVERT WITH END SECTION



ELEVATION

CULVERT WITH NO END TREATMENT

NOTE:
For arch or elliptical pipes, use equivalent diameter for (D) dimension

NO SCALE

U.S. DEPARTMENT OF TRANSPORTATION FEDERAL HIGHWAY ADMINISTRATION EASTERN FEDERAL LANDS HIGHWAY DIVISION	
U.S. CUSTOMARY DETAIL	
LOOSE RIPRAP CHANNEL AT CULVERT	
DETAIL APPROVED FOR USE .	DETAIL
APPROVED : MAY 2011	E251-02

NOT FOR CONSTRUCTION

Stantec
Baltimore, MD
USA
Tel. 410.583.6700
Fax. 410.583.6704
www.stantec.com

NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013	NOT TO SCALE	DE-01

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 026 OF 124

Thursday, September 12, 2013 AT 03:31 PM
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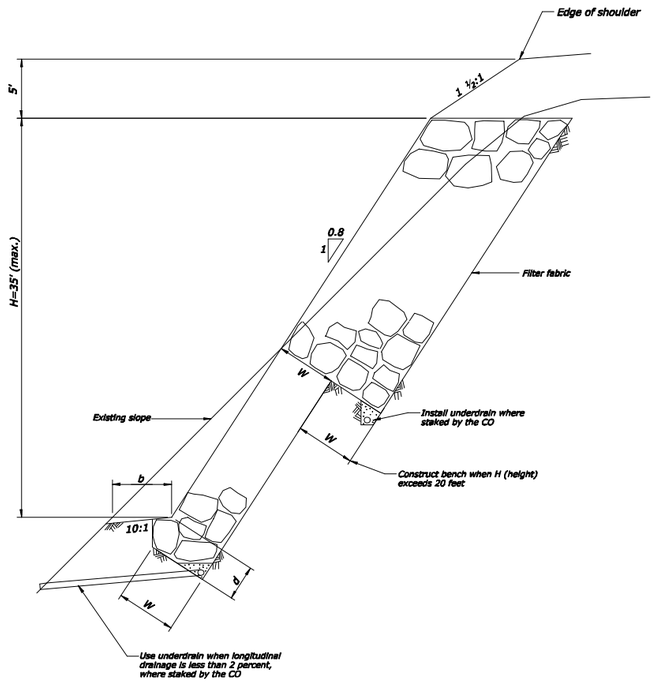
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		027	124

REG	STATE	PROJECT	SHEET NO.



NOTE :

1. *Size of Rocks. Not less than 50% to be 12 Cu. ft. or larger. Rocks to be irregular in shape. When rocks vary in size, place larger rock in bottom of embankment.*

MATERIAL	b	d	W
Rock (requiring blasting)	2' (min.)	0-3'	3'
Weathered rock or sandy soil	5' (min.)	3' (min.)	5'-10'
Cohesive soil	5' (min.)	5' (min.)	10'

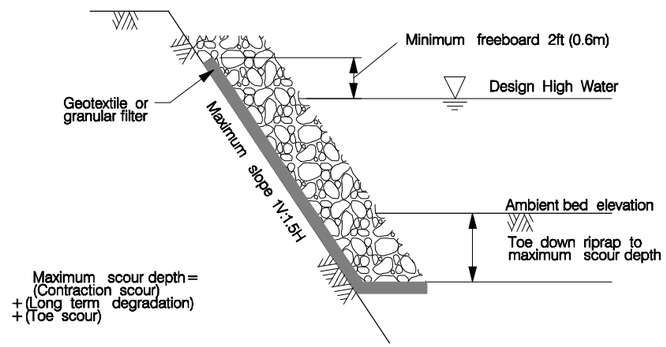
U.S. DEPARTMENT OF TRANSPORTATION
FEDERAL HIGHWAY ADMINISTRATION
EASTERN FEDERAL LANDS HIGHWAY DIVISION

U.S. CUSTOMARY DETAIL

MECHANICALLY PLACED ROCK EMBANKMENT

DETAIL APPROVED FOR USE . DETAIL
APPROVED : MAY 2011 E252-01

NO SCALE



DETAIL A - RIP-RAP REVETMENT

NOT FOR CONSTRUCTION

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NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013 | NOT TO SCALE | DE-02

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 027 OF 124

Thursday, September 12, 2013 AT 03:31 PM
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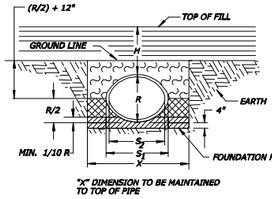
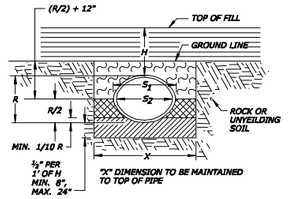
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		028	124

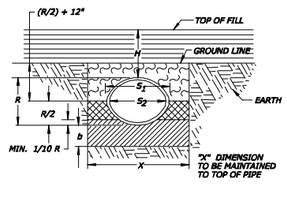
NO PROJECTION OF PIPE ABOVE GROUND LINE



NORMAL EARTH FOUNDATION

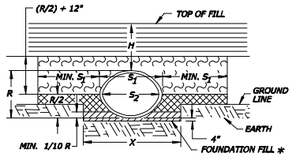


ROCK FOUNDATION

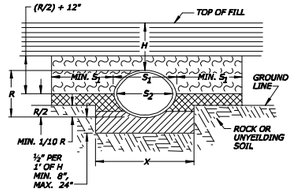


FOUNDATION SOFT, YIELDING, OR OTHERWISE UNSUITABLE MATERIAL

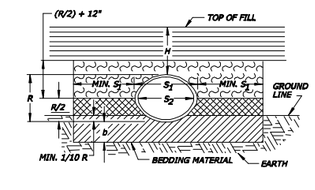
PIPE PROJECTION ABOVE GROUND LINE



NORMAL EARTH FOUNDATION



ROCK FOUNDATION



FOUNDATION SOFT, YIELDING, OR OTHERWISE UNSUITABLE MATERIAL

CULVERTS LESS THAN S_1 = 36"
X= S_2 + 24"

CULVERTS WHERE S_1 = 36" AND OVER
X= S_2 + 36"

METHOD "A" PIPE BEDDING SHALL BE USED AS FOLLOWS UNLESS OTHERWISE NOTED ON PLANS:

RIGID PIPE
WHEN H IS LESS THAN OR EQUAL TO 30'

FLEXIBLE PIPE
AS SHOWN ON TABLES

** MAY BE ELIMINATED UNDER ENTRANCE PIPE WHERE DIRECTED BY THE CO.*

H = HEIGHT OF COVER MEASURED FROM TOP OF DRAINAGE STRUCTURE TO FINISHED GRADE.

S_1= OUTSIDE SPAN OF PIPE.

S_2= INSIDE SPAN OF PIPE.

R = OUTSIDE RISE OF PIPE.

b = DEPTH AS SHOWN ON PLANS OR TO FIRM BEARING SOIL.

FOUNDATION FILL MATERIAL IN ACCORDANCE WITH SUBSECTIONS 209 AND 704.01

BACKFILL MATERIAL IN ACCORDANCE WITH SUBSECTIONS 209.10 AND 704.03

SUITABLE ROADWAY EXCAVATION OR UNCLASSIFIED BORROW MATERIAL IN ACCORDANCE WITH SUBSECTION 209.10

EMBANKMENT

NO SCALE

ADOPTED FROM: VIRGINIA DEPARTMENT OF TRANSPORTATION STANDARD PB-1, PAGE 107.02

U.S. CUSTOMARY DETAIL

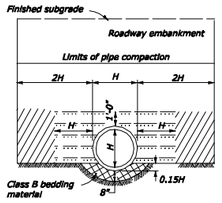
ELLIPTICAL CONCRETE PIPE CULVERT INSTALLATION

DETAIL APPROVED FOR USE	DETAIL
APPROVED: MAY 2011	E602-09

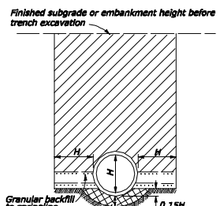
CONCRETE ROUND PIPE CULVERT

FILL HEIGHT AND PIPE CLASS TABLE

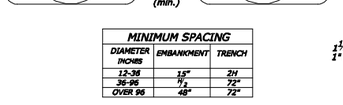
PIPE SIZE: DIAMETER IN INCHES	MINIMUM COVER IN INCHES	EMBANKMENT CLASS II	EMBANKMENT CLASS III	EMBANKMENT CLASS IV	EMBANKMENT CLASS V	TRENCH CLASS II	TRENCH CLASS III	TRENCH CLASS IV	TRENCH CLASS V
		MAXIMUM FILL HEIGHT ABOVE TOP OF PIPE IN FEET							
12	12	11	11	16	23	18	18	26	37
18	12	10	10	25	39	14	14	31	45
24	12	11	11	15	31	15	15	22	40
30	12	9	13	16	35	13	17	20	46
36	12	9	9	20	41	11	14	26	56
48	12	12	14	26	44	16	17	31	50
60	12	15	17	28	44	15	20	32	50
72	12	13	17	31	41	16	20	38	49
84	12	13	19	31		15	23	37	
96	12	13	20			16	24		
108	12	16	20			19	26		



EMBANKMENT INSTALLATION



TRENCH INSTALLATION

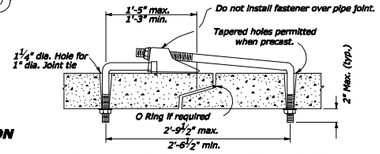


MINIMUM SPACING		
DIAMETER INCHES	EMBANKMENT	TRENCH
12-36	1.5"	2H
36-96	H/2	72"
OVER 96	48"	72"

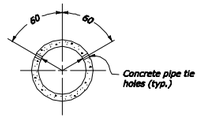
MULTIPLE ROUND PIPE INSTALLATION

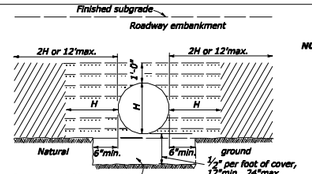
LEGEND:

- *Bedding material*
- *Embankment material placed in layers not exceeding 6" compacted depth.*
- *Approved granular material or fine compactable soil placed in layers not exceeding 6" compacted depth.*



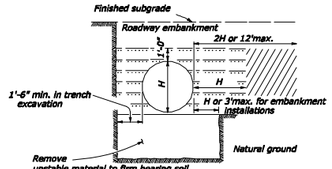
SUPPLEMENTAL CONCRETE PIPE TIE





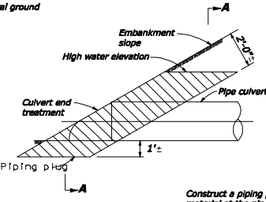
Remove unyielding material and replace with selected fine compressible material. Lightly compact in layers not over 6 inches in uncompacted depth.

ON UNYIELDING MATERIAL



Remove unstable material to firm bearing soil and replace with approved granular foundation fill material properly compacted.

ON UNSTABLE MATERIAL



SECTION A-A

Construct a piping plug of impermeable backfill material at the pipe inlet where granular material is used for backfill. Width may be adjusted to tie into impervious material.

PIPING PLUG

NOTES:

1. *When directed, camber pipe culverts upward from a chord through the inlet end outlet inverts an ordinate amount equal to 1% of the pipe length. Develop camber on a parabolic curve. If the midpoint elevation on the parabolic curve as designed exceeds the elevation of the inlet invert, reduce the amount of camber or increase the pipe culvert gradient.*
2. *Measure minimum cover from the top of the pipe culvert to the subgrade for flexible pavements, and to the top of the pavement for rigid pavements. Measure maximum fill height from the top of the pipe to the top of the pavement for both flexible and rigid pavements.*
3. *Pipe compaction limits shown are for pipe installation in an embankment. For pipe installation in a trench, the compaction limits shall be the walls of the trench.*
4. *When grades exceed 10%, install supplemental concrete pipe ties on pipe culvert or install bell and spigot pipe.*
5. *Maximum fill heights for pipe culvert installations may be increased on approval of site-specific structural pipe designs meeting the criteria of AASHTO Standard Specifications for Highway Bridges.*

NO SCALE

U.S. CUSTOMARY DETAIL

CONCRETE PIPE CULVERT INSTALLATION

DETAIL APPROVED FOR USE	DETAIL
APPROVED: MAY 2011	E602-07

NOT FOR CONSTRUCTION

Stantec
Baltimore, MD
USA
Tel. 410.583.6700
Fax. 410.583.6704
www.stantec.com

NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013 | NOT TO SCALE | DE-03

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

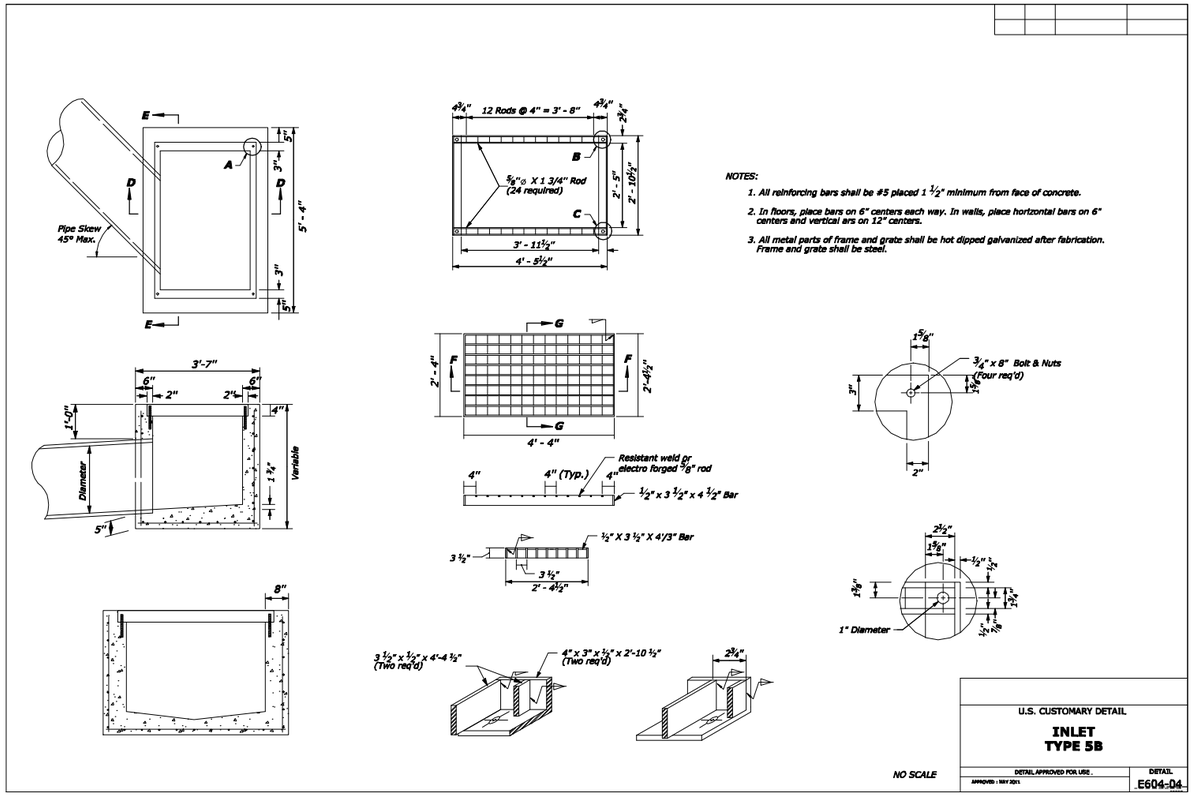
ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 028 OF 124

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		029	124



NOTES:

1. All reinforcing bars shall be #5 placed 1 ½" minimum from face of concrete.
2. In floors, place bars on 6" centers each way. In walls, place hortzontal bars on 6" centers and vertical ars on 12" centers.
3. All metal parts of frame and grate shall be hot dipped galvanized after fabrication. Frame and grate shall be steel.

U.S. CUSTOMARY DETAIL

INLET TYPE 5B

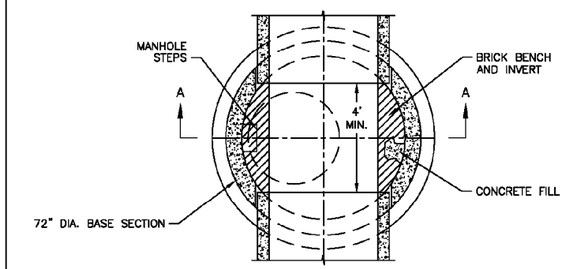
NO SCALE

DETAIL APPROVED FOR USE. APPROVED: MAY 2011

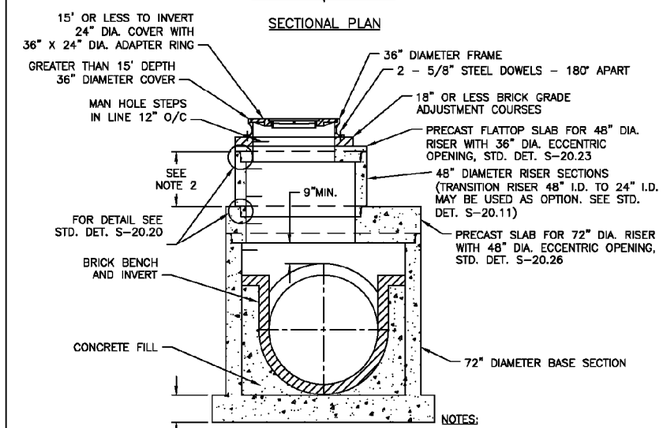
DETAIL E604-04

DISTRICT OF COLUMBIA
WATER AND SEWER AUTHORITY

S-20.03
1 OF 1



SECTIONAL PLAN



SECTION A - A

NOTES:

1. STRUCTURAL CALCULATIONS MUST BE SUBMITTED FOR APPROVAL PRIOR TO MANUFACTURE OF BASE AND TRANSITION SLABS.
2. 1',2',3' OR 4' OR A COMBINATION THEREOF AS NEEDED FOR GRADE ADJUSTMENT

APPROVED DATE: June 20, 2003
DIRECTOR, DEPARTMENT OF ENGINEERING AND TECHNICAL SERVICES

REVISION NO.: 0
DATE: 8/20/03
PREPARED BY: OBG/BKJV
CHECKED BY: W.DARROW

STANDARD DETAIL
PRECAST CONCRETE MANHOLE
FOR NEW 33" THRU 48" DIAMETER SEWERS
(72" DIAMETER PRECAST BASE)

NOT FOR CONSTRUCTION

Stantec
Baltimore, MD
USA
Tel. 410.583.6700
Fax. 410.583.6704
www.stantec.com

NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013 | NOT TO SCALE | DE-04

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

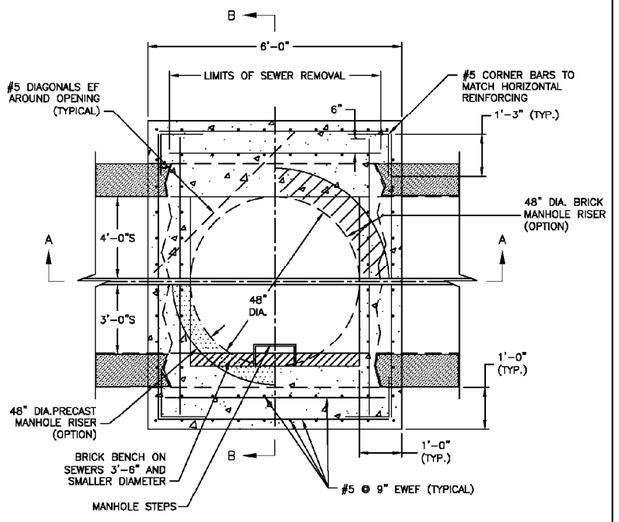
DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 029 OF 124

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		030	124

DISTRICT OF COLUMBIA
WATER AND SEWER AUTHORITY

S-22.13
1 OF 3



SECTIONAL PLAN

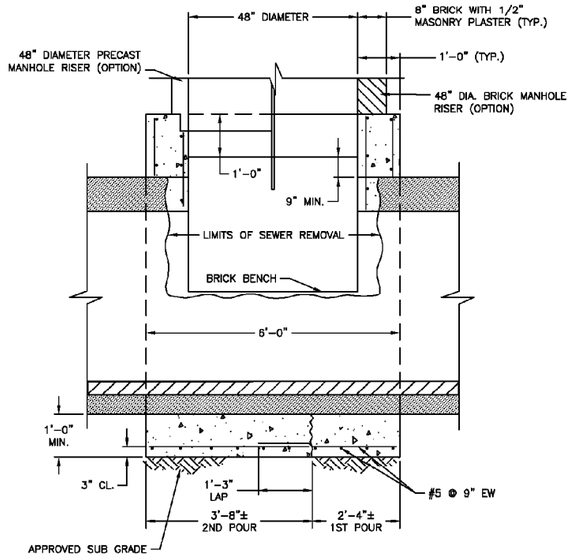
NOTES:

1. ALL CONCRETE TO BE CLASS 4000, AIR ENTRAINED, TYPE II CEMENT.
2. REINFORCING STEEL SHALL CONFORM TO ASTM A615, GRADE 60.
3. FOR MANHOLE DEPTHS GREATER THAN 15' TO INVERT, USE 36" DIAMETER CAST IRON FRAME AND COVER. FOR MANHOLE DEPTHS EQUAL TO 15' OR LESS, USE A 36"X 24" ADAPTER RING WITH A 24" DIAMETER COVER.
4. MAXIMUM DEPTH 20 FT.

APPROVED DATE: June 20, 2003 DIRECTOR, DEPARTMENT OF ENGINEERING AND TECHNICAL SERVICES	REVISION NO.: 0 DATE: 6/20/03 PREPARED BY: OBG/BKJV CHECKED BY: W.DARROW	STANDARD DETAIL CAST IN PLACE CONCRETE MANHOLE BASE ON EXISTING 3-FOOT TO 4-FOOT DIAMETER CONCRETE MASONRY SEWERS

DISTRICT OF COLUMBIA
WATER AND SEWER AUTHORITY

S-22.13
2 OF 3



SECTION A-A

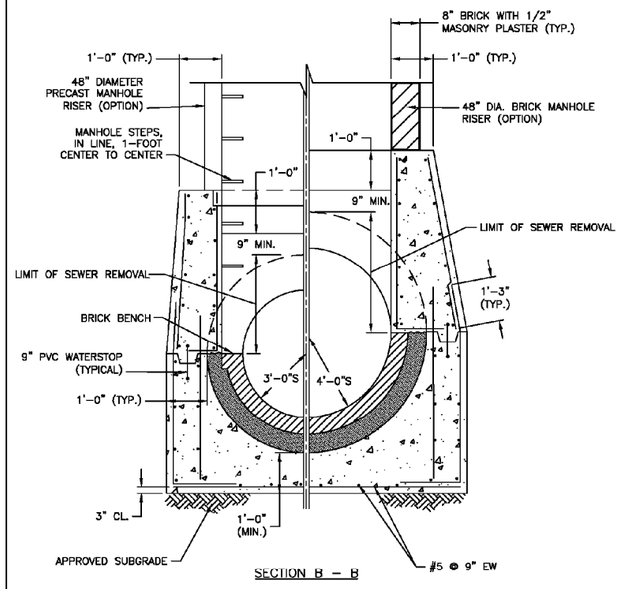
NOTE:

FIRST POUR SHALL BE ALLOWED TO CURE A MINIMUM 24 HOURS PRIOR TO EXCAVATING AND PLACING SECOND POUR.

APPROVED DATE: June 20, 2003 DIRECTOR, DEPARTMENT OF ENGINEERING AND TECHNICAL SERVICES	REVISION NO.: 0 DATE: 6/20/03 PREPARED BY: OBG/BKJV CHECKED BY: W.DARROW	STANDARD DETAIL CAST IN PLACE CONCRETE MANHOLE BASE ON EXISTING 3-FOOT TO 4-FOOT DIAMETER CONCRETE MASONRY SEWERS

DISTRICT OF COLUMBIA
WATER AND SEWER AUTHORITY

S-22.13
3 OF 3



SECTION B - B

APPROVED DATE: June 20, 2003 DIRECTOR, DEPARTMENT OF ENGINEERING AND TECHNICAL SERVICES	REVISION NO.: 0 DATE: 6/20/03 PREPARED BY: OBG/BKJV CHECKED BY: W.DARROW	STANDARD DETAIL CAST IN PLACE CONCRETE MANHOLE BASE ON EXISTING 3-FOOT TO 4-FOOT DIAMETER CONCRETE MASONRY SEWERS

NOT FOR CONSTRUCTION

Stantec
Baltimore, MD
USA
Tel. 410.583.6700
Fax. 410.583.6704
www.stantec.com

NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013 | NOT TO SCALE | DE-05

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

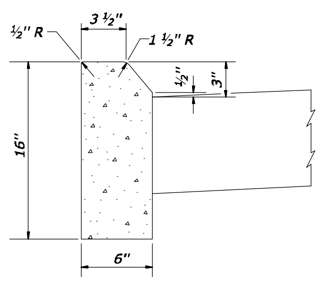
DIVISION CHIEF
DATE _____
FILE _____
SHEET 030 OF 124

Thursday, September 12, 2013 AT 03:31 PM
u:\2026031049\01\2 rock creek park trail\trans\cadd\sheet files\pHT-D005_rct.dgn

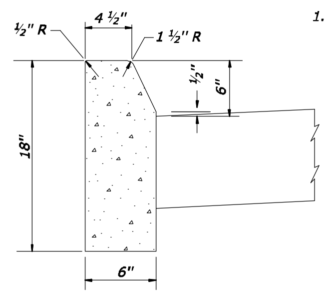
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		031	124

Note:

1. Place 3-inches, minimum aggregate bed course under all curb and gutter.

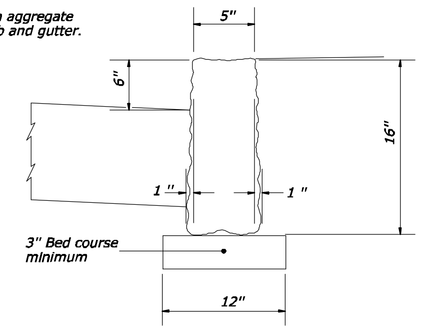


16-INCH DEPTH
(MOUNTABLE)



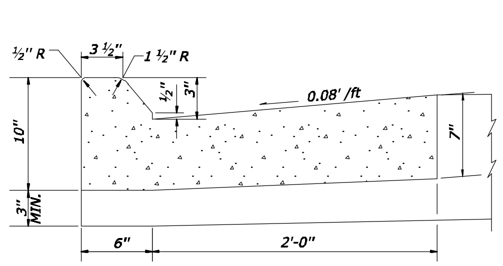
18-INCH DEPTH
(NON- MOUNTABLE)

PORTLAND CEMENT CONCRETE CURB

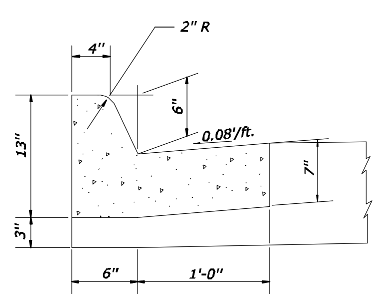


STONE CURB

16-INCH DEPTH
(NON-MOUNTABLE)

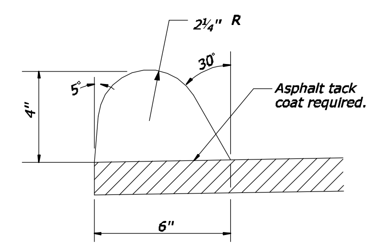


10-INCH DEPTH
(MOUNTABLE)



13-INCH DEPTH
(NON- MOUNTABLE)

PORTLAND CEMENT CONCRETE CURB AND GUTTER



ASPHALT CONCRETE CURB

4-INCH DEPTH
(NON-MOUNTABLE)

Asphalt tack coat may be rapid curing liquid asphalt or emulsified asphalt.

NO SCALE

U.S. CUSTOMARY DETAIL	
CURBS	
DETAIL APPROVED FOR USE . APPROVED : MAY 2011	DETAIL E609-01 (MOD.)

NOT FOR CONSTRUCTION

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Baltimore, MD
USA
Tel. 410.583.6700
Fax. 410.583.6704
www.stantec.com

NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09–13–2013	NOT TO SCALE	DE–06

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI–USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

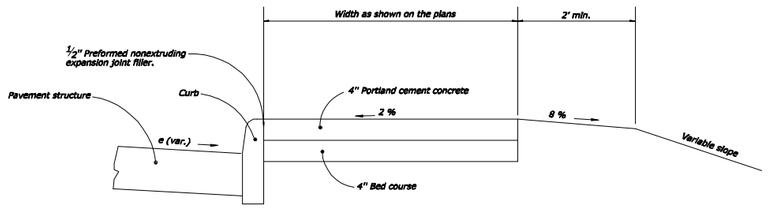
PROJECT ENG. ________
DESIGNED BY ________
CHECKED BY ________
DRAWN BY________
PROJECT MGR. ________

DETAILS

DIVISION CHIEF

DATE ________
FILE ________
SHEET 031 OF 124

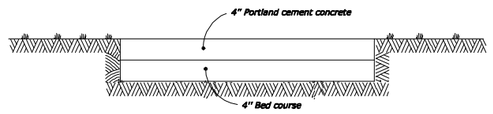
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		032	124



SIDEWALK WITH CURB

NOTES:

1. Place 3/4-inch transverse expansion joints at intervals of not more than 60 feet to match adjacent curb expansion joints.
2. Place dummy joints at intervals equal to the width of the sidewalk as shown on the plans.



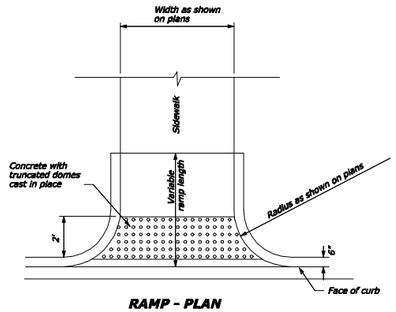
SIDEWALK

U.S. CUSTOMARY DETAIL

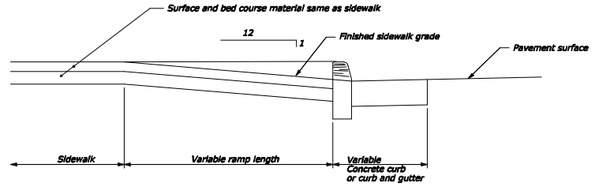
PORTLAND CEMENT CONCRETE SIDEWALK

DETAIL APPROVED FOR USE	DETAIL
APPROVED : MAY 2011	E615-01

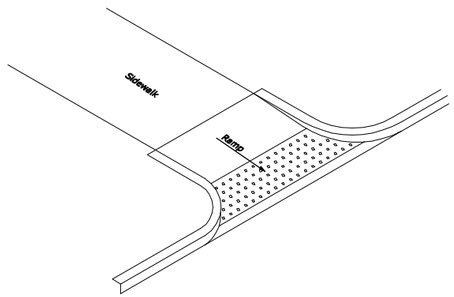
NO SCALE



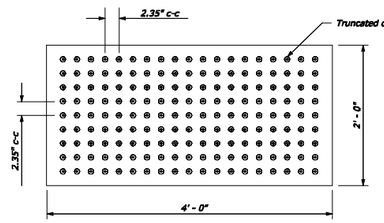
RAMP - PLAN



RAMP - TYPICAL SECTION

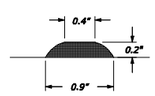


RAMP - ISOMETRIC



PLAN

DETECTABLE WARNING SURFACE



TURNCATED DOME - SECTION

U.S. CUSTOMARY DETAIL

WHEEL CHAIR RAMP CURB RETURN

DETAIL APPROVED FOR USE	DETAIL
APPROVED : MAY 2011	E615-05

NO SCALE

NOT FOR CONSTRUCTION

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Baltimore, MD
USA
Tel. 410.583.6700
Fax. 410.583.6704
www.stantec.com

NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013	NOT TO SCALE	DE-07

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

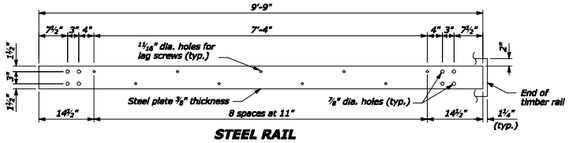
ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 032 OF 124

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		033	124



STEEL RAIL

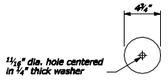
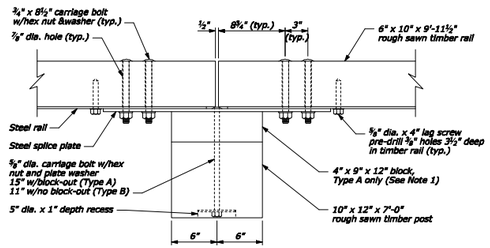
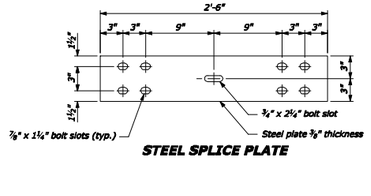


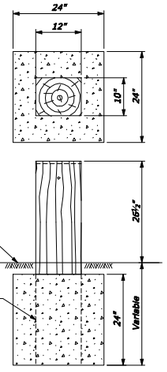
PLATE WASHER



PLAN

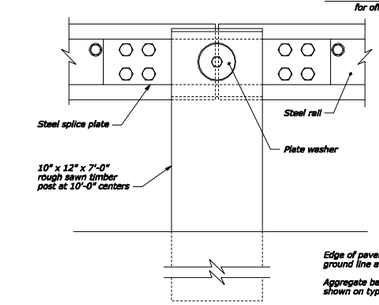


STEEL SPLICE PLATE

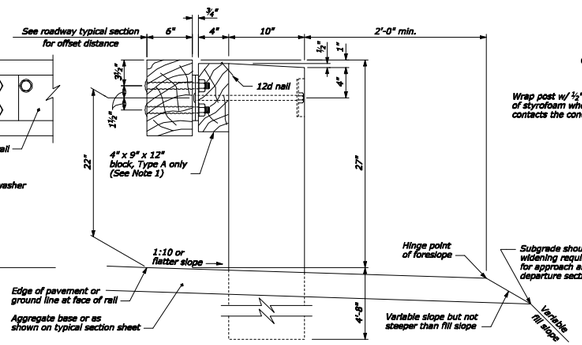


24" dia. round anchor is an acceptable alternative.
Reduced size acceptable in solid rock.

CONCRETE ANCHOR FOR SHORT GUARDRAIL POST



ELEVATION
POST CONNECTION



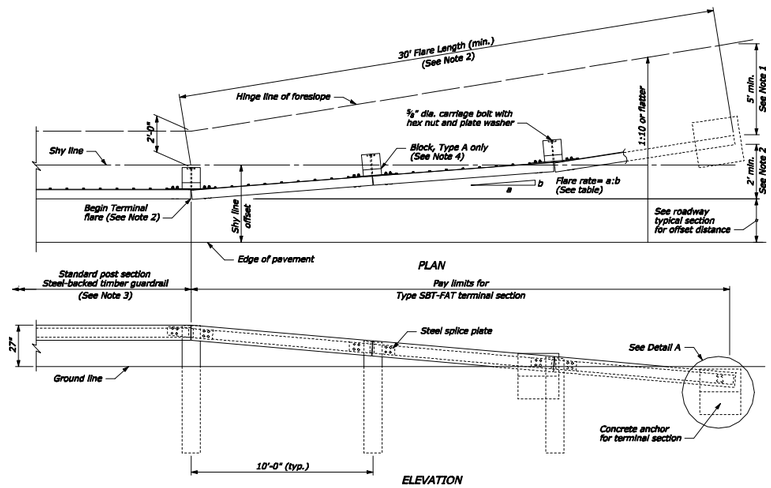
TYPICAL GUARDRAIL CROSS SECTION

....NO SCALE

NOTE:

1. Use the Type A, blocked-out, system or the Type B, non-blocked-out, system as specified in the plans.
2. Use weathering steel for all structural steel and fastener hardware as specified.
3. Place a terminal section (See Standards 617-61 and 617-62) on both approach and trailing ends of barrier installations.

U.S. DEPARTMENT OF TRANSPORTATION FEDERAL HIGHWAY ADMINISTRATION FEDERAL LANDS HIGHWAY	
U.S. CUSTOMARY STANDARD	
STEEL-BACKED TIMBER GUARDRAIL TYPE A & TYPE B	
STANDARD APPROVED FOR USE 3/1993	STANDARD
REVISED: 6/1994. 6/2008. ____ ____ ____	617-60

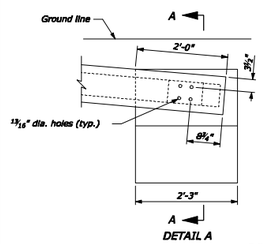


PLAN

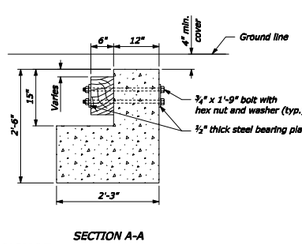
ELEVATION

APPROACH & DEPARTURE FLARE WITH FLARED ANCHOR TERMINAL (FAT)

GUARDRAIL FLARE RATE TABLE			
Design Speed (mph)	Shy line offset (ft)	Flare rate inside shy line (a:b)	Flare rate outside shy line (a:b)
60	8.0	26:1	14:1
50	6.5	21:1	11:1
40	5.0	16:1	8:1
30 and less	3.5	13:1	7:1

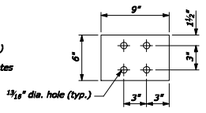


DETAIL A



SECTION A-A

CONCRETE ANCHOR



STEEL BEARING PLATE

....NO SCALE

NOTE:

1. Extend the fill widening a minimum of 5 feet behind the guardrail, unless otherwise directed by the CO.
2. The guardrail flare shown in the plan view is the minimum length and rate required. As directed by the CO, flare the guardrail so that the terminal section is outside the clear zone. If the terminal section cannot be located outside the clear zone, it should be flared as far as practical from the road at the maximum rate indicated on the Guardrail Flare Rates table.
3. See Detail ET 617-60, Steel-Backed Timber Guardrail, Type SBTA and SBTB, for timber, structural steel, and hardware details.
4. On the Type A, blocked-out guardrail, include the blocks in terminal section, except on the concrete anchor. For the Type B, non-blocked-out guardrail, no blocks are included.

U.S. DEPARTMENT OF TRANSPORTATION FEDERAL HIGHWAY ADMINISTRATION EASTERN FEDERAL LANDS HIGHWAY DIVISION	
U.S. CUSTOMARY DETAIL	
STEEL-BACKED TIMBER GUARDRAIL TERMINAL SECTION TYPE SBT-FAT	
STANDARD APPROVED FOR USE 1/1990.	DETAIL
REVISED: 6/1994. 6/2008. ____ ____ ____	ET 617-61

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REVISIONS

DATE: 09-13-2013 | DE-08

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 033 OF 124

Thursday, September 12, 2013 AT 03:31 PM
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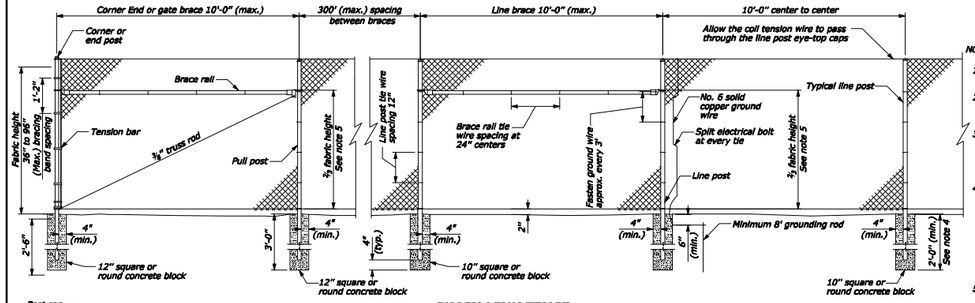
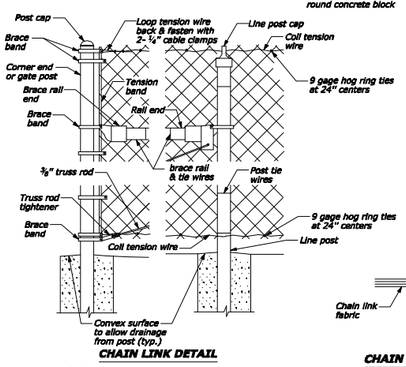
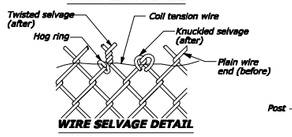
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		034	124





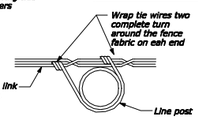
CHAIN LINK DETAIL



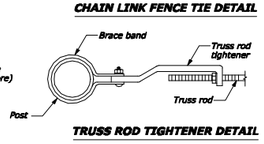
WIRE SELVAGE DETAIL

CHAIN LINK FENCE

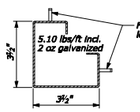
CHAIN LINK FENCE										
POST SIZE AND WEIGHT TABLE										
DESCRIPTION	FENCE TYPE	ROUND PIPE				HOT ROLLED SHAPE				ROLLED FORMED
		Steel		Aluminum		Steel		Steel		Steel
		Minimum yield strength Psi.								
		25,000		25,000		50,000		45,000		45,000
		Size and mass								
		dia. inch	mass lbs/ft	dia. inch	mass lbs/ft	dia. inch	mass lbs/ft	dia. inch	mass lbs/ft	dia. inch	mass lbs/ft
Brace rail & top rail	Type 1	1.66	2.27	1.660	0.786	1.66	1.40	------	------	1¼ x 1⅝	1.40
	Type 2	1.66	1.82	------	------	1.66	1.40	------	------	1¼ x 1⅛	1.40
Line post	Type 1	2.375	3.65	2.375	1.264	2.375	3.12	2½ x 1⅝	3.26	2½ x 1⅝	2.70
	Type 2	2.375	2.96	------	------	2.375	2.31	------	------	1⅞ x 1⅝	2.76
End, corner & pull post	Type 1	2.875	5.79	2.875	2.004	2.875	4.64	------	------	3½ x 3½	5.10
	Type 2	2.875	4.69	------	------	2.875	3.25	------	------	3½ x 3½	5.10



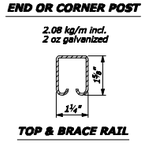
CHAIN LINK FENCE TIE DETAIL



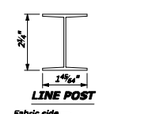
TRUSS ROD TIGHTENER DETAIL

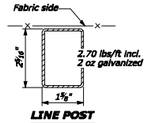


END OR CORNER POST



TOP & BRACE RAIL





ALTERNATE STEEL POST & BRACE SECTIONS

NO SCALE

U.S. DEPARTMENT OF TRANSPORTATION FEDERAL HIGHWAY ADMINISTRATION EASTERN FEDERAL LANDS HIGHWAY DIVISION	
U.S. CUSTOMARY DETAIL	
CHAIN LINK FENCE	
Sheet 1 of 2	
DETAIL APPROVED FOR USE . APPROVED : MAY 2011	DETAIL E619-09

REG	STATE	PROJECT	SHEET NO.
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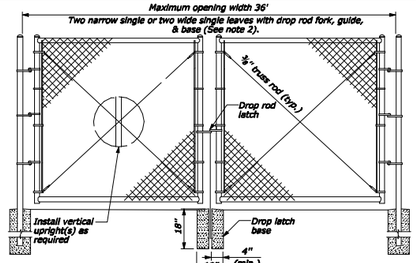
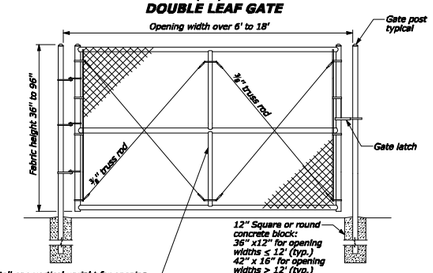
NOTES:

1. Metal post and rails shall conform to ASTM F 669.
2. Use Type 1 requirements from chain link fence table unless otherwise specified in the special contract requirements.
3. Set all post in concrete. Set corner, end, pull posts to the dimension shown. The minimum depth of concrete for line posts is 24". Increase depth 3" for each addtional foot of fence height over 4 feet.
4. Install braces on all terminals on fences without a top rail. No braces are required on fabric 6 feet in height or less where a top rail is specified. Install braces where fabric is over 6 feet in height. Where a top rail is used, attach the brace at the halfway point of the terminal post above grade and, where the rail is omitted, at the two-thirds point above grade. Do not install top rail unless so specified in the special contract requirements.
5. Adjust the post top elevations to provide a smooth visual fence profile. Install corner posts at horizontal breaks in the fence of 15° or more.
6. If alternate steel posts are used, provide fastening bands, caps, brace rail, rail ends, and truss rod attaching hardware compatible with the post sizes ans styles selected
7. Provide fence fabric with a 2" mesh, Use 11 gage wire in fabric heights of 48 inches or less and 9 gage wire in fabric heights greater than 48 inches. Provide a Class D coating when zinc-coated steel fence frabric is provided. Knuckle both selvages on fabric less than 72 inches high. For fabric 72 inches high or higher, knuckle one selvage and twist the other.
8. See Detail E619-09, sheet 2 for hardware and gate requirements.

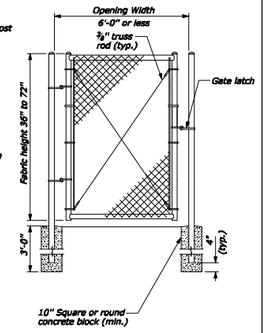
HARDWARE ITEM DESCRIPTION	STANDARD REQUIREMENTS
Brace rail and top rail	See table on Detail E619-09
Line post	See table on Detail E619-09
Corner, end and pull posts	See table on Detail E619-09
Post cap	Cast non-ferrous alloy or galvanized pressed steel cap must fit snugly on post and gate tops
Line post cap	Galvanized pressed steel minimum "3/32" thickness or galvanized malleable ferrous alloy
Tension band	Minimum 3/32" x 5/16" galvanized steel
Brace band	Minimum 3/32" x 5/16" galvanized steel
Band bolt	Minimum 5/16" x 1¼" galvanized carriage bolt, (Lock washer & flat washer for each band0
Rail end	Galvanized pressed steel or galvanized malleable ferrous alloy minimum..." 5/8" thickness on back bolting appendage
Brace rail end	Galvanized pressed steel or galvanized malleable ferrous alloy minimum" 5/8" thickness on back bolting appendage
Truss rod tightener	Minimum ¼" formed galvanized steel
Truss rod	3/8" galvanized, NC threaded rod, lock washer, & flat washer with two 90° bends opposite of threaded end
Top rail sleeve	Galvanized steel 0.051" minimum thickness by 6" minimum length
Tension bar	Minimum 3/16" x 3/4" galvanized steel
Fence fabric	2" diamond mesh fabric, See note no. 4 on Detail E619-07 of Sheet 1
Tie wires	Minimum 9 gage aluminum with one hooked end
Coil tension wire	0.177" minimum diameter metalic coated wire
Gate latch	Minimum ½" galvanized pressed steel or malleable ferrous alloy. 1 latch per each single gate with bent minimum 5/8" attachment bolt, washer & nut.
Frame hinge	Minimum ½" galvanized pressed steel with 2 - 3/8" U-bolts, lockwasher & nuts per hinge. Use 2 hinges per gate leaf up to 8' in width and 3 hinges per gate leaf widths greater than 8'.
Drop rod latch & guide	Minimum ½" galvanized pressed steel. Drop rod guide includes 5/8" x 3" carriage bolt with lock washer & nut. Weld drop rod fork to rod & paint with an approved zinc rich paint.



DOUBLE LEAF GATE



WIDE SINGLE LEAF GATE



NARROW SINGLE LEAF GATE

CHAIN LINK GATE							
POST AND FRAME SIZE AND MASS TABLE							
GATE LEAF WIDTHS		ROUND PIPE					
		Steel		Aluminum		Steel	
		Minimum yield strength Psi.					
		25,000		25,000		50,000	
		Size and mass					
		dia. inch	lbs/ft (min.)	dia. inch	lbs/ft (min.)	dia. inch	lbs/ft (min.)
6 feet or less	Gate	2.875	4.64	2.875	1.94	2.875	4.64
Over 6 feet to 12 feet	post	4.000	8.65	4.000	2.99	4.000	6.56
Over 12 feet to 18 feet	size	6.625	18.02	------	------	------	------
Outside frame member	frame	1.900	2.28	1.900	1.900	1.900	2.28
Interior bracing member	size	1.660	1.83	1.900	1.900	1.660	1.84

NO SCALE

U.S. DEPARTMENT OF TRANSPORTATION FEDERAL HIGHWAY ADMINISTRATION EASTERN FEDERAL LANDS HIGHWAY DIVISION	
U.S. CUSTOMARY DETAIL	
CHAIN LINK HARDWARE AND GATE	
Sheet 2 of 2	
DETAIL APPROVED FOR USE . APPROVED : MAY 2011	DETAIL E619-09

REG	STATE	PROJECT	SHEET NO.
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NOTES:

1. Reinforce the gate frame corners with a malleable iron or pressed steel fitting designed for the purpose or shop weld the corners. Grind smooth all welds and paint each gate with the necessary hinges, latch, and drop rod locking device design for the type of gate posts and used on the project. Provide positive type latching devices with provisions for pad locking at all gates. Provide keepers to retain the gate in the open position.
2. Approved alternate gate frames constructed of steel section, other than pipe, may be used.
3. The design of the chain link hardware may vary from the details shown, however, all hardware and materials used in a single installation shall be uniform and compatible.

NOTES:
1) STANDARD DETAILS TO BE MODIFIED AS FOLLOWS:
   A) FENCE COMPONENTS SHALL BE COATED WITH BLACK VINYL.
   B) V-SHAPE CAP POSTS SHALL BE AFFIXED TO THE TOP OF FENCE AND STRUNG WITH 12.5 GAUGE BARBED WIRE.

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DATE: 09-13-2013	NOT TO SCALE	DE-09

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 034 OF 124

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		035	124

RSS	STATE	PROJECT	SHEET NO.
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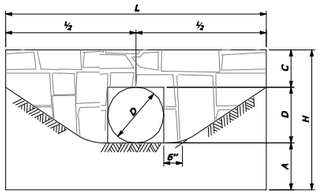
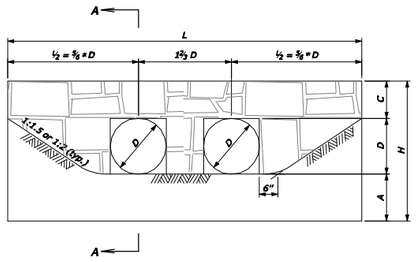
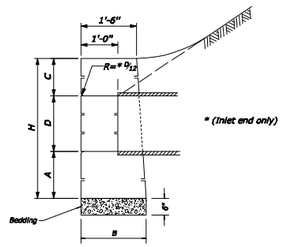


SINGLE



DOUBLE



SECTION A-A

NOTES:

1. *All headwalls are oriented parallel to the roadway centerline unless otherwise indicated on the plans or by the CO.*
2. *When pipes are on skew, adapt and lengthen headwalls as directed.*
3. *Quantities shown in the table are for one headwall with pipe at right angles.*
4. *Construct headwalls using dimensions shown under values for 1½:1 slope, unless otherwise designated by the CO.*

	VALUES FOR 1½: 1 SLOPES								VALUES FOR 2:1 SLOPES							
	SINGLE				DOUBLE				SINGLE				DOUBLE			
D (In.)	18"	24"	30"	36"	18"	24"	30"	36"	18"	24"	30"	36"	18"	24"	30"	36"
L or L'	7'-0"	10'-0"	13'-0"	16'-0"	9'-6"	13'-4"	17'-2"	21'-0"	8'-6"	12'-4"	16'-2"	20'-0"	11'-0"	15'-8"	20'-4"	25'-0"
H	3'-9"	4'-10"	5'-11"	7'-0"	3'-9"	4'-10"	5'-11"	7'-0"	3'-9"	4'-10"	5'-11"	7'-0"	3'-9"	4'-10"	5'-11"	7'-0"
B	1'-9"	2'-0"	2'-5"	2'-10"	1'-9"	2'-0"	2'-5"	2'-10"	1'-9"	2'-0"	2'-5"	2'-10"	1'-9"	2'-0"	2'-5"	2'-10"
A (min.)	1'-3"	1'-6"	1'-9"	2'-0"	1'-3"	1'-6"	1'-9"	2'-0"	1'-3"	1'-6"	1'-9"	2'-0"	1'-3"	1'-6"	1'-9"	2'-0"
C	1'-0"	1'-4"	1'-8"	2'-0"	1'-0"	1'-4"	1'-8"	2'-0"	1'-0"	1'-4"	1'-8"	2'-0"	1'-0"	1'-4"	1'-8"	2'-0"
Stone (CY)	1.45	2.87	5.14*	8.28	1.89	3.66	6.47	10.37	1.78	3.60	6.50	10.53	2.22	4.39	7.83	12.62

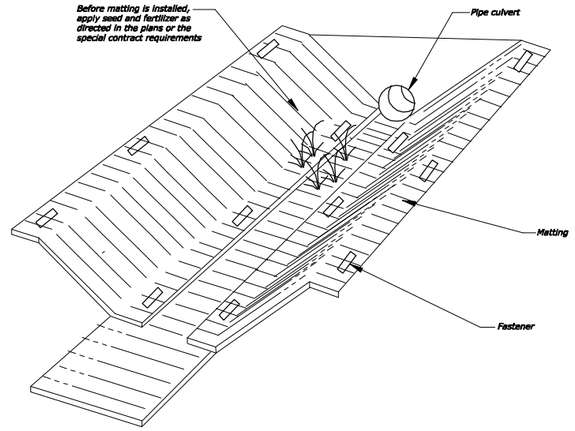
U.S. DEPARTMENT OF TRANSPORTATION
FEDERAL HIGHWAY ADMINISTRATION
EASTERN FEDERAL LANDS HIGHWAY DIVISION

U.S. CUSTOMARY DETAIL

STONE MASONRY HEADWALLS FOR SMALL PIPE CULVERTS

DETAIL APPROVED FOR USE	DETAIL
APPROVED : MAY 2011 MODIFIED	E620-01

RSS	STATE	PROJECT	SHEET NO.



DETAIL FOR STABILIZING PIPE INLETS WITH MATTING

NO SCALE

U.S. DEPARTMENT OF TRANSPORTATION
FEDERAL HIGHWAY ADMINISTRATION
EASTERN FEDERAL LANDS HIGHWAY DIVISION

U.S. CUSTOMARY DETAIL

PIPE INLET STABILIZATION

DETAIL APPROVED FOR USE	DETAIL
APPROVED : MAY 2011	E629-03

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DATE: 09-13-2013	NOT TO SCALE	DE-10

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INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
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SHEET 035 OF 124

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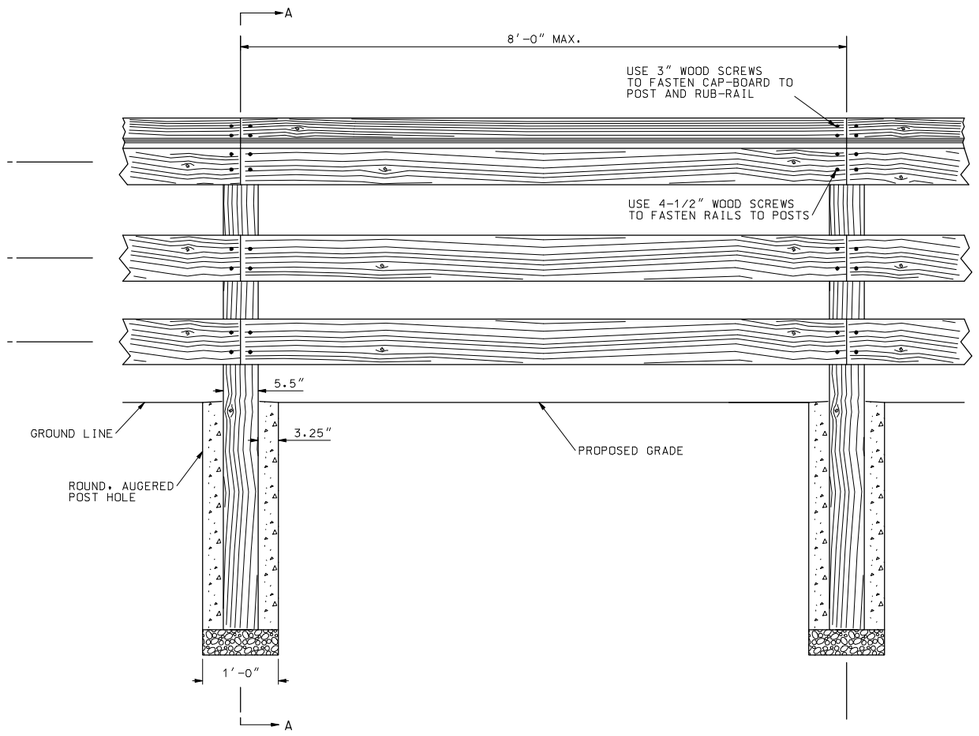
REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		036	124



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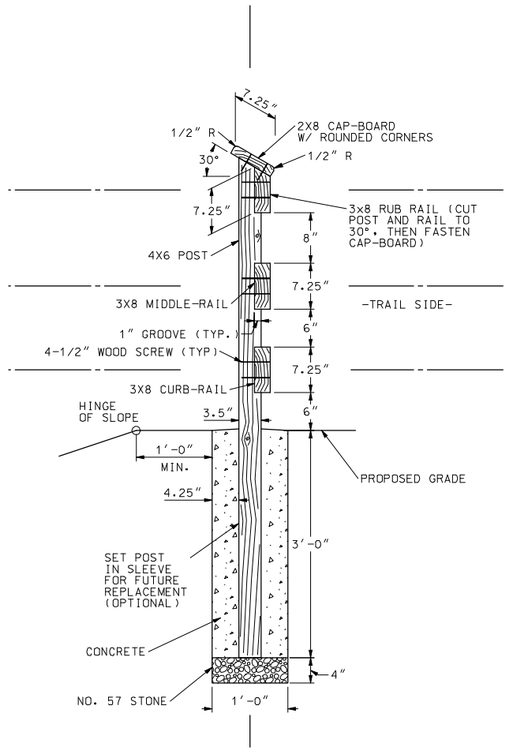

SECTION A-A

NOTES:

1) ALL HARDWARE TO BE CORROSION RESISTANT, HOT-DIPPED GALVANIZED STEEL.
2) ALL LUMBER SHALL BE PRESERVATIVE-TREATED.
3) FENCE SHALL BE COATED WITH EXTERIOR GRADE CLEAR SEALANT BUT NOT PAINTED. FINAL DESIGN SHALL BE APPROVED BY NATIONAL PARK SERVICE.
4) FENCE DESIGN COMPLIES WITH CRITERIA PROVIDED IN THE AASHTO GUIDE TO BICYCLE FACILITIES, 4TH EDITION (REFER TO FIGURE 5-11). ANY MODIFICATIONS TO THIS DETAIL SHOULD BE CHECKED FOR COMPLIANCE WITH THIS CRITERIA.
5) FENCE OFFSET FROM EDGE OF TRAIL SHALL BE 2' DESIRABLE, 1' MINIMUM.
6) ALL FENCES SHALL BEGIN AND END WITH MINIMUM 2' FLARED OFFSETS FROM THE EDGE OF TRAIL.
7) RAILS SHALL PARALLEL THE LONGITUDINAL GRADE OF THE TRAIL. POSTS SHALL BE SET 90° FROM HORIZONTAL, REGARDLESS OF THE LONGITUDINAL GRADE.

DETAIL A
42" POST-AND-RAIL SAFETY FENCE

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REVISIONS

DATE: 09-13-2013	NOT TO SCALE	DE-11

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INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
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PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 036 OF 124

Thursday, September 12, 2013 AT 03:31 PM
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REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
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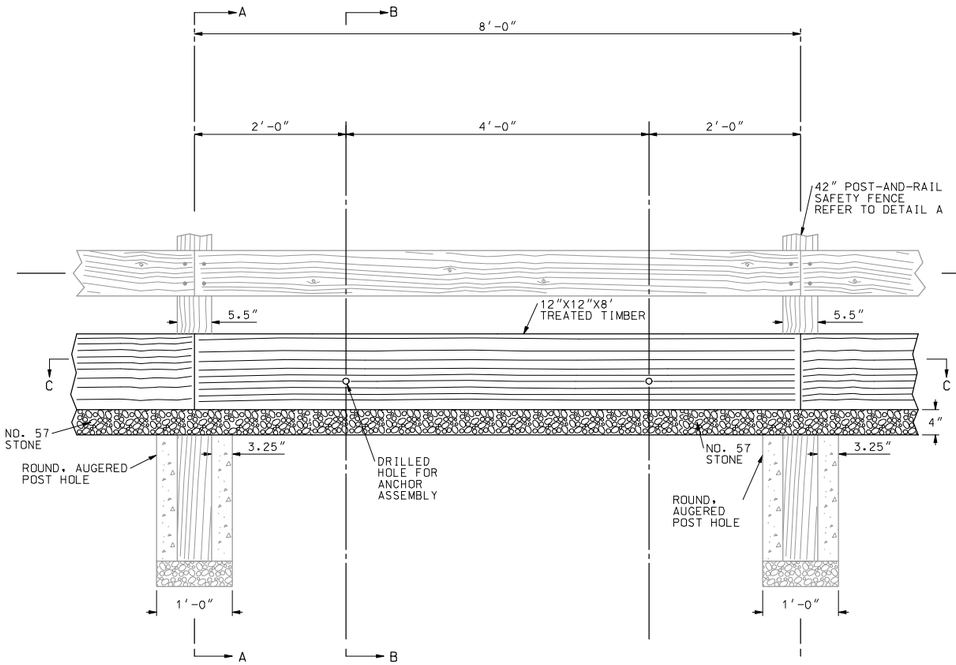

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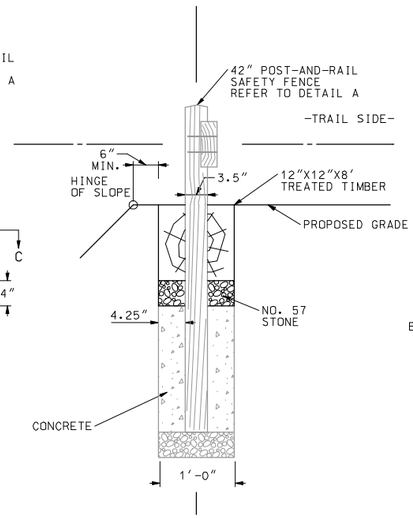
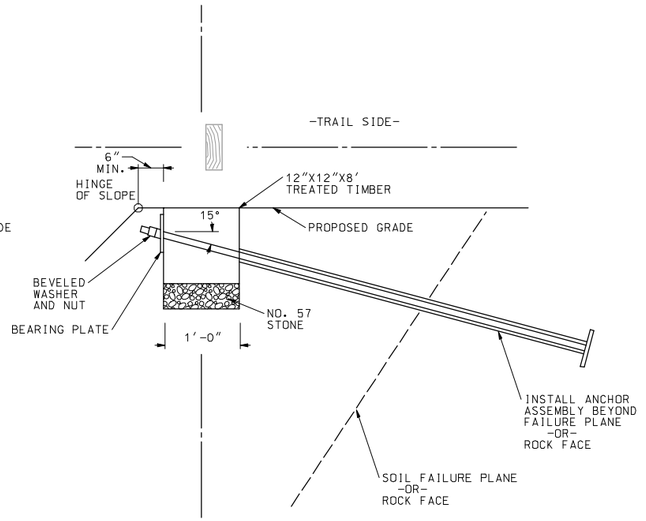
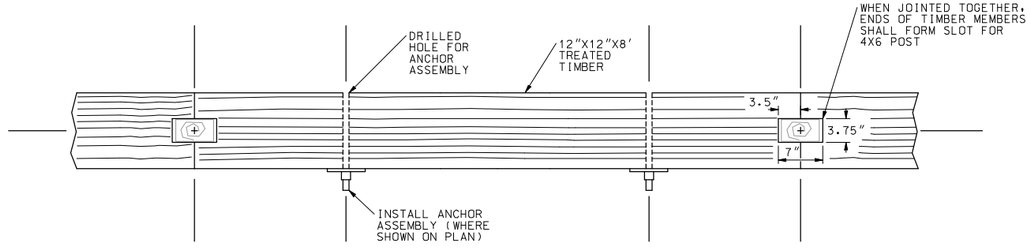


SECTION A-A



SECTION B-B



SECTION C-C

NOTES:
1) ALL LUMBER SHALL BE PRESERVATIVE-TREATED.
2) TIMBER MEMBERS SHALL BE LAID PARALLEL WITH THE LONGITUDINAL GRADE OF THE TRAIL.
3) ANCHOR ASSEMBLY SHALL BE DESIGNED FOR SPECIFIC SITE CONDITIONS. ROCK ANCHORS SHALL BE GROUTED. ALL PRODUCTS SHALL BE SUBMITTED FOR APPROVAL.
4) ANCHOR ASSEMBLY SHALL BE CORROSION RESISTANT.
5) STACKED ROWS OF TIMBER EDGE SUPPORT WITH ANCHOR SYSTEM MAY BE NECESSARY IN SOME LOCATIONS.

DETAIL B
TIMBER EDGE SUPPORT AND ANCHOR ASSEMBLY
(SHOWN WITH 42" POST-AND-RAIL SAFETY FENCE)

NOT FOR CONSTRUCTION

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NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013	NOT TO SCALE	DE-12

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

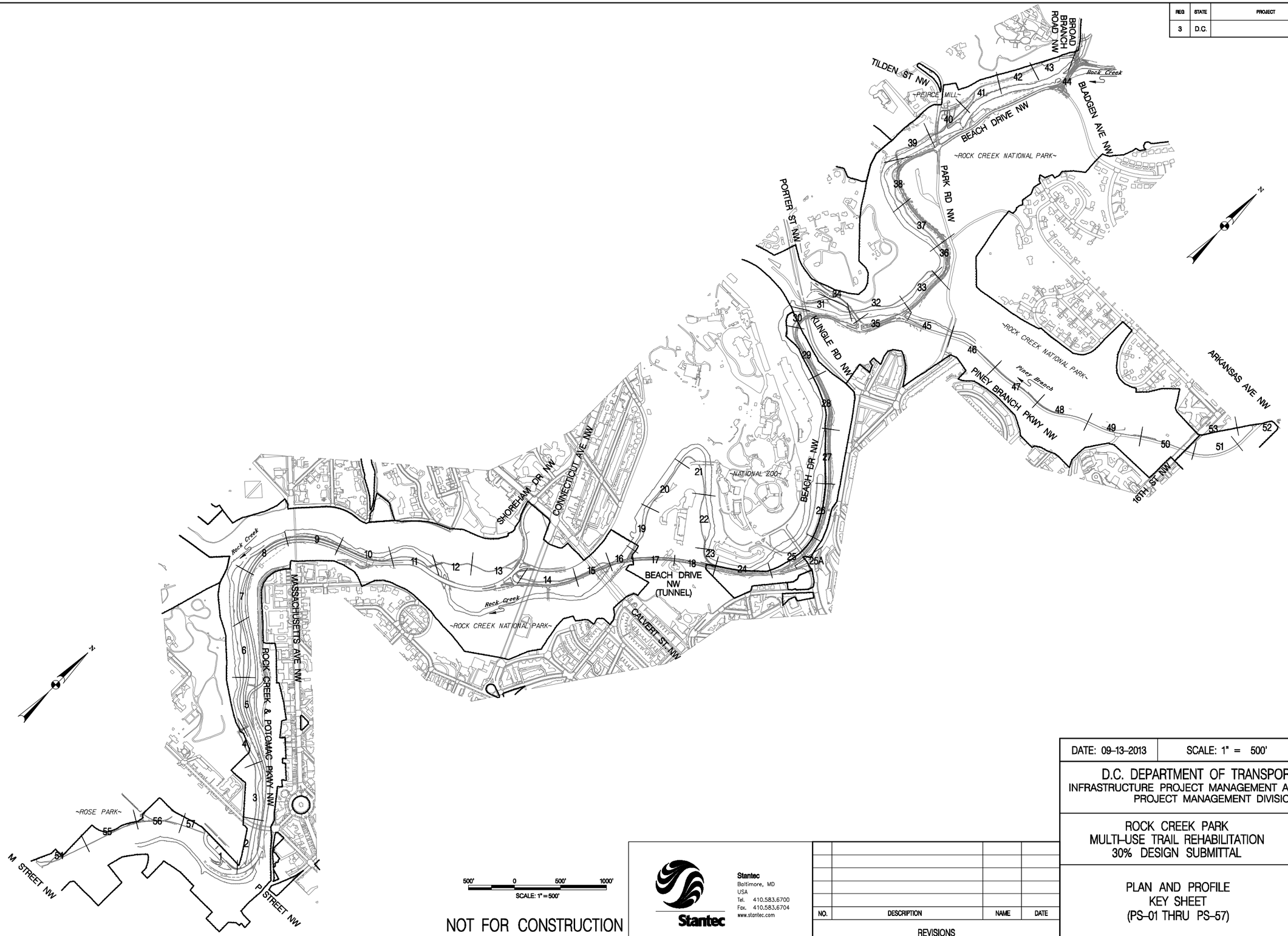
PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DETAILS

DIVISION CHIEF
DATE _____
FILE _____
SHEET 037 OF 124

Thursday, September 12, 2013 AT 03:31 PM
u:\202603\049\01\2 rock creek park trail\trans\cadd\sheet files\pHT-D012-rct.dgn

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		038	124



NOT FOR CONSTRUCTION

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NO.	DESCRIPTION	NAME	DATE

REVISIONS

DATE: 09-13-2013	SCALE: 1" = 500'	KEY-01

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

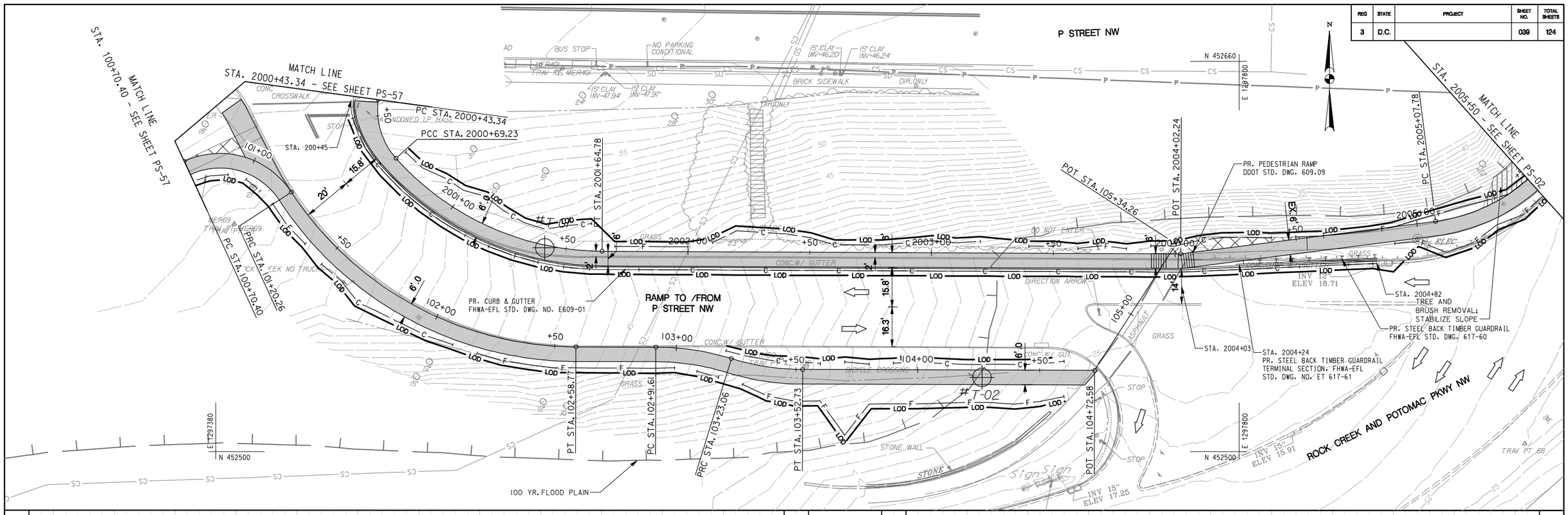
PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

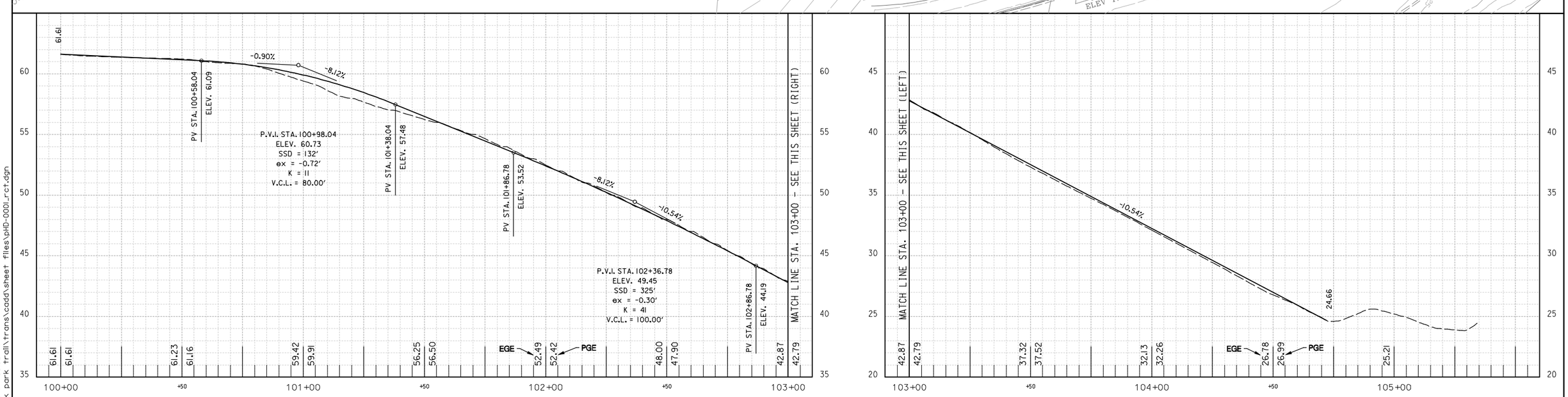
PLAN AND PROFILE
KEY SHEET
(PS-01 THRU PS-57)

DIVISION CHIEF
DATE _____
FILE _____
SHEET 038 OF 124

Thursday, September 12, 2013 AT 03:31 PM
u:\202603\049\02 rock creek park trail\trans\cadd\sheet files\pGN-KEY1_rct.dgn

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		039	124





PAVEMENT LEGEND

- PR. ASPHALT PAVEMENT
- PR. CONCRETE SIDEWALK
- WORK PROPOSED BY OTHERS
- PAVEMENT REMOVAL

NOT FOR CONSTRUCTION

VERTICAL SCALE: 1" = 4'

HORIZONTAL SCALE: 1" = 20'

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NO.	DESCRIPTION	NAME	DATE

REVISIONS

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

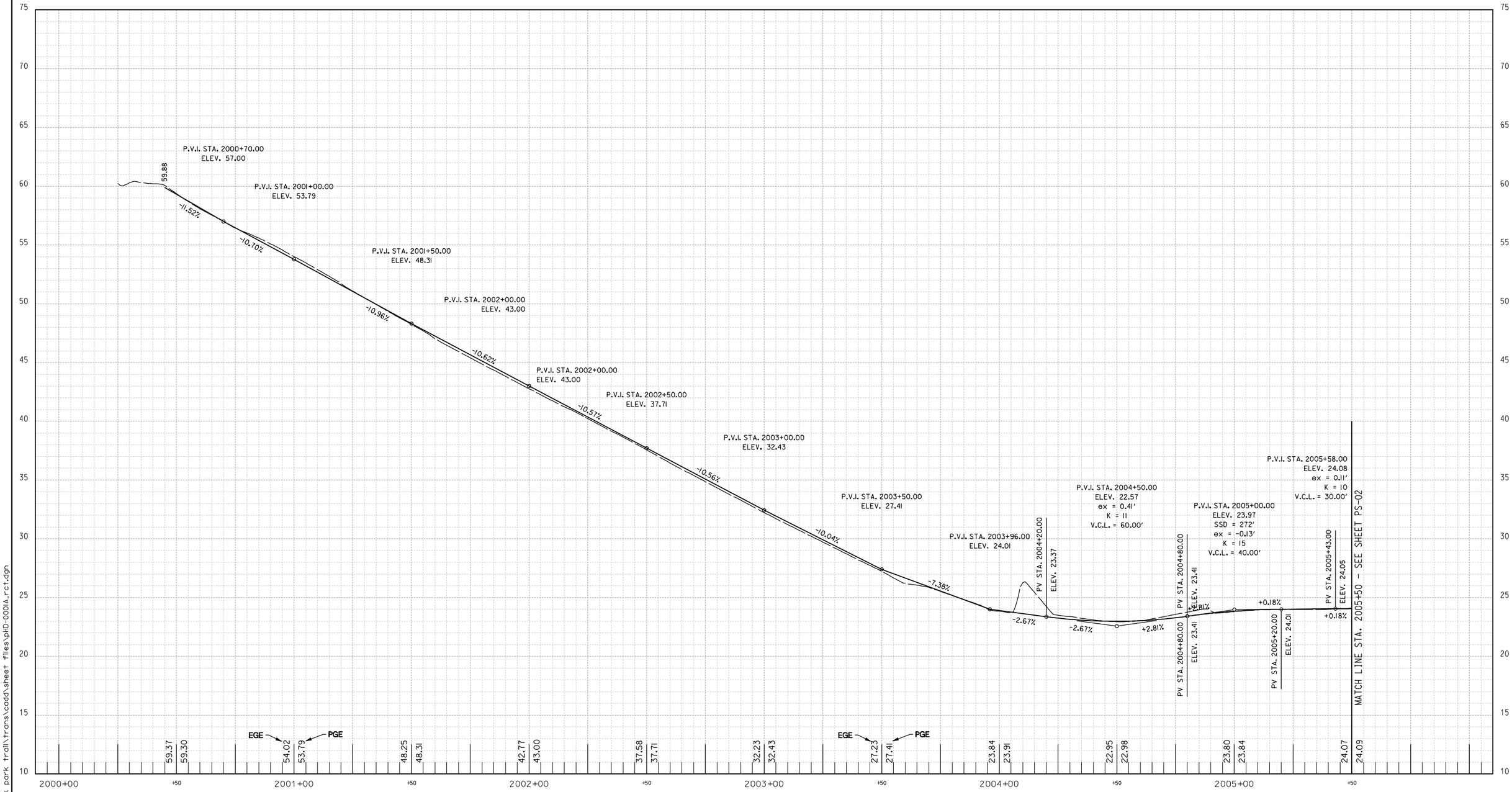
DATE: 09-13-2013 | SCALE: H: 1" = 20'; V: 1" = 4' | PS-01

PLAN AND PROFILE SHEET

DIVISION CHIEF
DATE _____
FILE _____
SHEET 039 OF 124

Thursday, September 12, 2013 AT 03:32 PM
ut\2026031049\012 rock creek park trail\trans\cadd\sheet files\pHD-0001_rct.dgn

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		040	124



NOT FOR CONSTRUCTION

4' 0 4' 8'
VERTICAL SCALE: 1"=4'

20' 0 20' 40'
HORIZONTAL SCALE: 1"=20'

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NO.	DESCRIPTION	NAME	DATE

REVISIONS

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

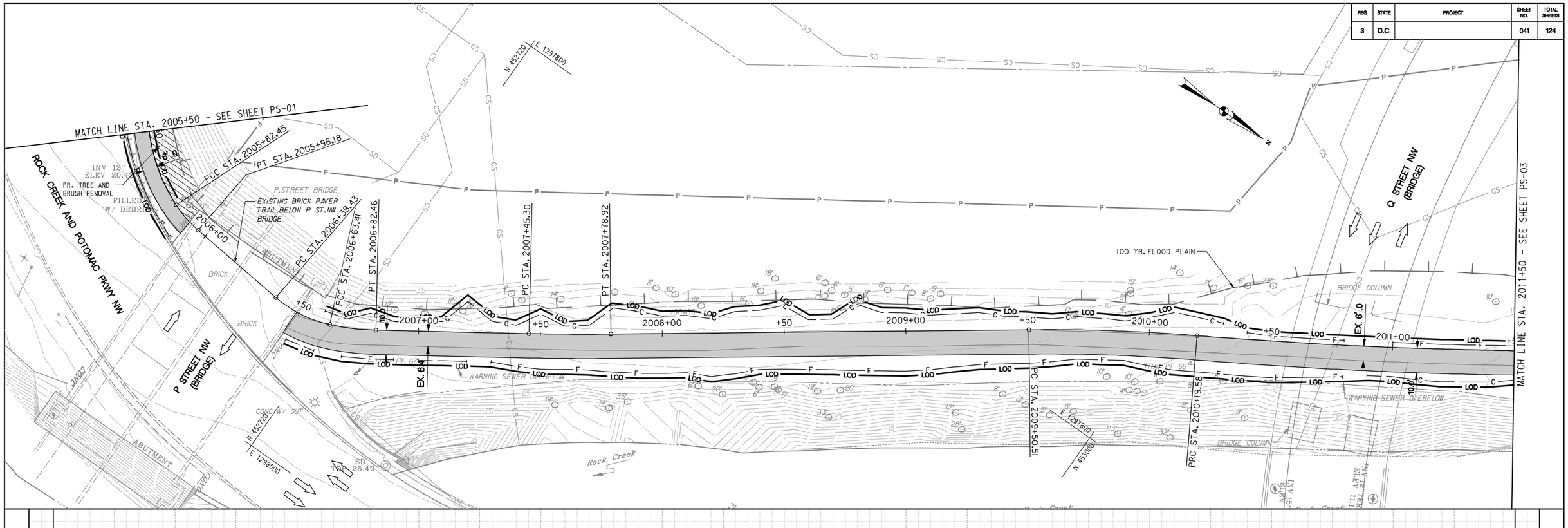
DATE: 09-13-2013 | SCALE: H: 1"=20'; V: 1"=4' | PS-01A

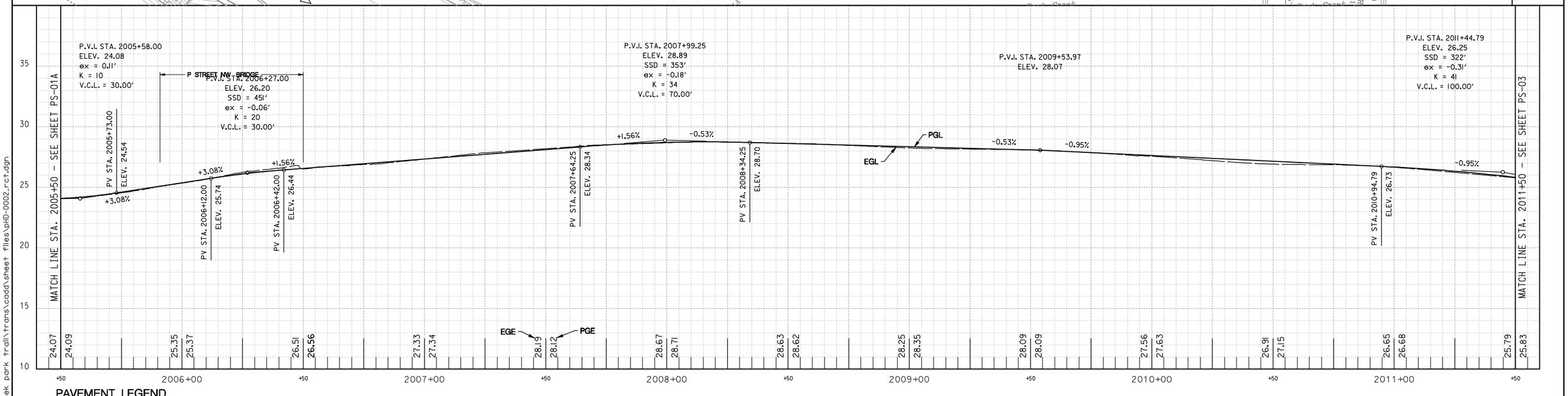
PLAN AND PROFILE SHEET

DIVISION CHIEF
DATE _____
FILE _____
SHEET 040 OF 124

Thursday, September 12, 2013 AT 03:32 PM
u:\2026031049\02 rock creek park trail\trans\cadd\sheet files\pHD-0001A_rct.dgn

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		041	124





PAVEMENT LEGEND

- PR. ASPHALT PAVEMENT
- PR. CONCRETE SIDEWALK
- WORK PROPOSED BY OTHERS
- PAVEMENT REMOVAL

NOT FOR CONSTRUCTION

VERTICAL SCALE: 1" = 4'

HORIZONTAL SCALE: 1" = 20'

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NO.	DESCRIPTION	NAME	DATE

REVISIONS

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

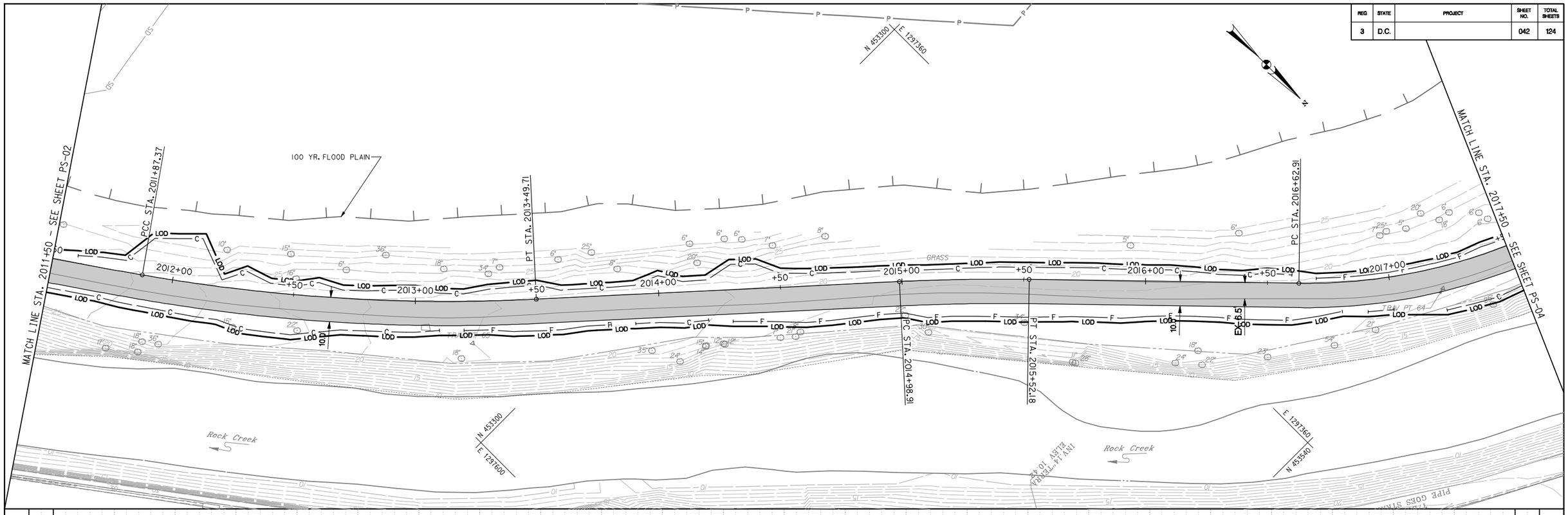
DATE: 09-13-2013 | SCALE: H: 1" = 20'; V: 1" = 4' | PS-02

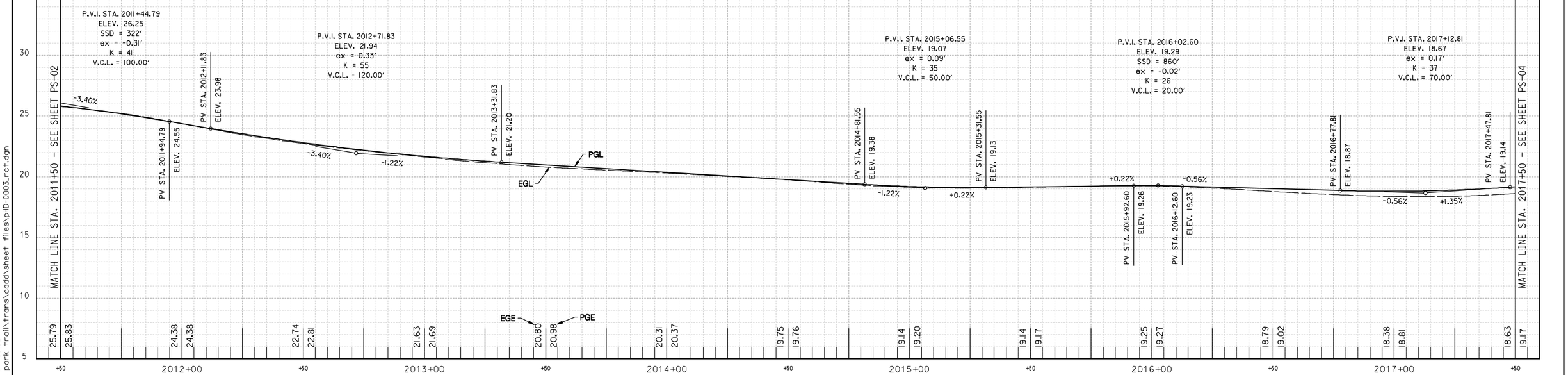
PLAN AND PROFILE SHEET

DIVISION CHIEF
DATE _____
FILE _____
SHEET 041 OF 124

Thursday, September 12, 2013 AT 03:32 PM
u:\2026031049\01 2 rock creek park trail\trans\cadd\sheet files\pHD-0002_rot.dgn

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		042	124





PAVEMENT LEGEND

- PR. ASPHALT PAVEMENT
- PR. CONCRETE SIDEWALK
- WORK PROPOSED BY OTHERS
- PAVEMENT REMOVAL

NOT FOR CONSTRUCTION

4' 0 4' 8'
VERTICAL SCALE: 1" = 4'

20' 0 20' 40'
HORIZONTAL SCALE: 1" = 20'

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NO.	DESCRIPTION	NAME	DATE

REVISIONS

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

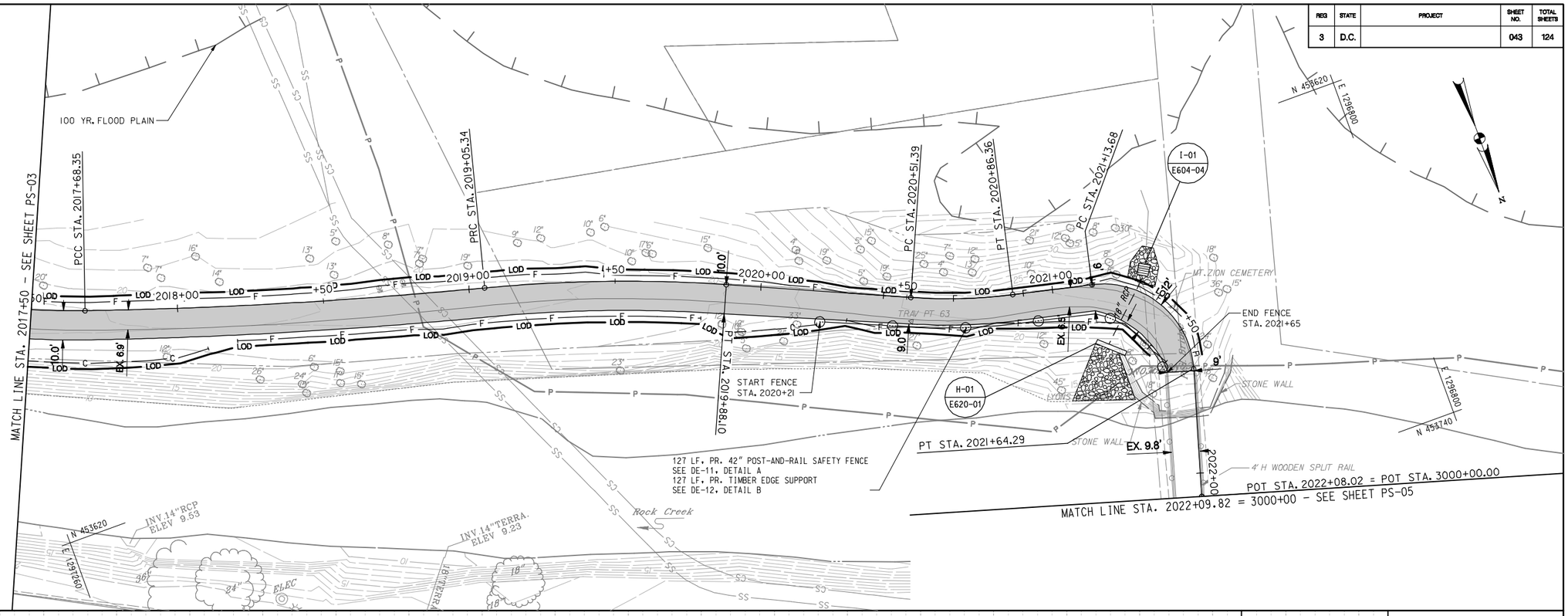
PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

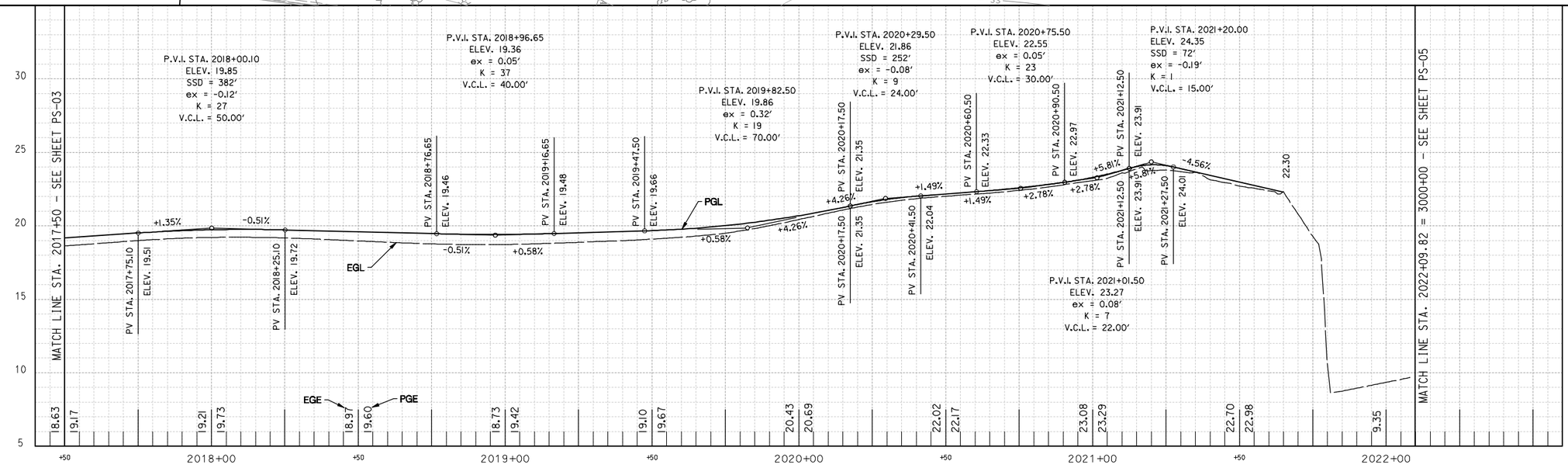
DATE: 09-13-2013 | SCALE: H: 1" = 20'; V: 1" = 4' | PS-03

PLAN AND PROFILE SHEET

DIVISION CHIEF
DATE _____
FILE _____
SHEET 042 OF 124

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		043	124





PAVEMENT LEGEND

- PR. ASPHALT PAVEMENT
- PR. CONCRETE SIDEWALK
- WORK PROPOSED BY OTHERS
- PAVEMENT REMOVAL

NOT FOR CONSTRUCTION

VERTICAL SCALE: 1" = 4'

HORIZONTAL SCALE: 1" = 20'

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NO.	DESCRIPTION	NAME	DATE

REVISIONS

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
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ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DATE: 09-13-2013 | SCALE: H: 1" = 20'; V: 1" = 4' | PS-04

PLAN AND PROFILE SHEET

DIVISION CHIEF
DATE _____
FILE _____
SHEET 043 OF 124

REG	STATE	PROJECT	SHEET NO.	TOTAL SHEETS
3	D.C.		044	124

MATCH LINE STA. 2022+09.82 = 3000+00 - SEE SHEET PS-04
POT STA. 2022+08.02 = POT STA. 3000+00.00
MATCH LINE STA. 3006+00 - SEE SHEET PS-06
ROCK CREEK & POTOMAC PARKWAY NW
RAMP FROM WATERSIDE DR NW
Rock Creek
N 453780
E 1296800
N 453940
E 1296560
PC STA. 3000+43.45
PT STA. 3000+59.87
PC STA. 3001+04.63
PT STA. 3001+48.24
PC STA. 3002+08.56
PT STA. 3004+23.86
PC STA. 3005+21.25
TOP EDGE OF WALL BURIED
STONE WALL
4' H WOODEN SPLIT RAIL FENCE
Bike and Foot Trail
CONC CURB & GUTTER
FILLED W/ DEBRIS
TRAV PT 62
GRASS
STONE
CONC
TRAFFIC SIGN
ELEC
INV OUT 18.58
24" TERRA
100 YR. FLOOD PLAIN
EX. 9.8'
EX. 8.7'
EX. 16.4'
LOD
F
C
+50
CS
SS

P.V.I. STA. 3001+31.00
ELEV. 17.53
ex = 0.44'
K = 14
V.C.L. = 70.00'

P.V.I. STA. 3002+87.14
ELEV. 16.54
ex = 0.08'
K = 53
V.C.L. = 60.00'

P.V.I. STA. 3004+30.65
ELEV. 17.26
ex = 0.09'
K = 70
V.C.L. = 70.00'

P.V.I. STA. 3005+32.00
ELEV. 18.79
SSD = 377'
ex = -0.12'
K = 27
V.C.L. = 50.00'

PV STA. 3000+96.00 ELEV. 19.50
PV STA. 3001+66.00 ELEV. 17.31
PV STA. 3002+57.14 ELEV. 16.73
PV STA. 3003+17.14 ELEV. 16.69
PV STA. 3003+95.65 ELEV. 17.09
PV STA. 3004+65.65 ELEV. 17.79
PV STA. 3005+07.00 ELEV. 18.41
PV STA. 3005+57.00 ELEV. 18.69

-5.63% -0.63% -0.63% +0.50% +0.50% +1.50% +1.50% -0.38%
PGL
EGL

	3000+00	+50	3001+00	+50	3002+00	+50	3003+00	+50	3004+00	+50	3005+00	+50	3006+00
EGL	9.67	22.09	18.24	19.28	16.52	17.50	16.00	17.09	15.74	16.78	15.64	16.64	15.78	16.86	16.10	17.11	16.56	17.57	17.33	18.31	17.88	18.71	18.07	18.53
PGL	22.06																							

PAVEMENT LEGEND

- PR. ASPHALT PAVEMENT
- PR. CONCRETE SIDEWALK
- WORK PROPOSED BY OTHERS
- PAVEMENT REMOVAL

NOT FOR CONSTRUCTION

VERTICAL SCALE: 1" = 4'
HORIZONTAL SCALE: 1" = 20'

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REVISIONS

D.C. DEPARTMENT OF TRANSPORTATION
INFRASTRUCTURE PROJECT MANAGEMENT ADMINISTRATION
PROJECT MANAGEMENT DIVISION

ROCK CREEK PARK
MULTI-USE TRAIL REHABILITATION
30% DESIGN SUBMITTAL

PROJECT ENG. _____
DESIGNED BY _____
CHECKED BY _____
DRAWN BY _____
PROJECT MGR. _____

DATE: 09-13-2013 | SCALE: H: 1" = 20'; V: 1" = 4' | PS-05

PLAN AND PROFILE SHEET

DIVISION CHIEF
DATE _____
FILE _____
SHEET 044 OF 124