

of **2**

SDP 07-050

PERMANENT SEEDING NOTES

APPLY TO GRADED OR CLEARED AREAS NOT SUBJECT TO IMMEDIATE FURTHER DISTURBANCE WHERE A PERMANENT LONG-LIVED VEGETATIVE COVER IS NEEDED.

SEEDBED PREPARATION: LOOSEN UPPER THREE INCHES OF SOIL BY RAKING, DISKING OR OTHER ACCEPTABLE MEANS BEFORE SEEDING, IF NOT PREVIOUSLY LOOSENED.

SOIL AMENDMENTS: IN LIEU OF SOIL TEST RECOMMENDATIONS, USE ONE OF THE FOLLOWING SCHEDULES: 1) PREFERRED - APPLY 2 TONS PER ACRES DOLOMITIC LIMESTONE (92 LBS/1000 SQ.FT.)
AND 600 LBS. PER ACRE 10-10-10 FERTILIZER (14 LBS/1000 SQ.FT.) BEFORE SEEDING.

HARROW OR DISK INTO UPPER THREE INCHES OF SOIL. AT TIME OF SEEDING, APPLY 400 LBS. PER ACRE 30-0-0 UREAFORM FERTILIZER (9 LBS./1000 SQ.FT.). 2) ACCEPTABLE - APPLY 2 TONS PER ACRE DOLOMITIC LIMESTONE (92 LBS./1000 SQ.FT.) AND 1000 LBS. PER ACRE 10-10-10 FERTILIZER (23 LBS./1000 SQ.FT.) BEFORE SEEDING. HARROW OR DISK INTO UPPER THREE INCHES OF SOIL.

SEEDING — FOR THE PERIODS MARCH 1 THRU APRIL 30, AND AUGUST 1 THRU OCTOBER 15, SEED WITH 60 LBS. PER ACRE 1.4 LBS/1000 SQ.FT.) OF KENTUCKY 31 TALL FESCUE. FOR THE PERIOD MAY 1 THRU JULY 31, SEED WITH 60 LBS. KENTUCKY 31 TALL FESCUE PER ACRE AND 2 LOBS. PER ACRE (.05 LBS./1000 SQ.FT.) OF WEEPING LOVEGRASS. DURING THE PERIOD OF OCTOBER 16 THRU FEBRUARY 28, PROTECT SITE BY: OPTION (1) — 2 TONS PER ACRE OF WELL. ANCHORED STRAW MULCH AND SEED AS SOON AS POSSIBLE IN THE SPRING. OPTION (2) — USE SOD. OPTION (3) — SEED WITH 60 LBS./ACRE KENTUCKY 31 TALL FESCUE AND MULCH WITH 2 TONE/ACRE WELL ANCHORED STRAW.

MULCHING — APPLY 1-1/2 TO 2 TONS PER ACRE (70 TO 90 LBS./1000 SQ.FT) OF UNROTTED SMALL GRAIN STRAW IMMEDIATELY AFTER SEEDING. ANCHOR MULCH IMMEDIATELY AFTER APPLICATION USING MULCH ANCHORING TOOL OR 218 GALLONS PER ACRE (5 GAL/1000 SQ.FT.) OF EMULSIFIED ASPHALT ON FLAT AREAS. ON SLOPES 8 FEET OR HIGHER, USE 348 GALLONS PER ACRE (8 GAL/1000 SQ.FT.) FOR ANCHORING.

MAINTENANCE - INSPECT ALL SEEDING AREAS AND MAKE NEEDED REPAIRS, REPLACEMENTS AND RESEEDINGS. TEMPORARY SEEDING NOTES

APPLY TO GRADED OR CLEARED AREAS LIKELY TO BE REDISTURBED WHERE A SHORT-TERM VEGETATIVE COVER IS NEEDED. SEEDBED PREPARATION: LOOSEN UPPER THREE INCHES OF SOIL BY RAKING, DISKING OR OTHER ACCEPTABLE MEANS BEFORE SEEDING, FOR NOT PREVIOUSLY LOOSENED.

SOIL AMENDMENTS: APPLY 600 LBS. PER ACRE 10-10-10 FERTILIZER (14 LBS./1000 SQ.FT.) SEEDING: FOR PERIODS MARCH 1 THRU APRIL 30 AND FROM AUGUST 15 THRU OCTOBER 15, SEED WITH 2-1/2 BUSHEL PER ACRE OF ANNUAL RYE (3.2 LBS./1000 SQ.FT.) FOR THE PERIOD MAY 1 THRU AUGUST 14, SEED WITH 3 LBS. PER ACRE OF WEEPING LOVEGRASS (.07 LBS./1000 SQ.FT.). FOR THE PERIOD NOVEMBER 16 THRU NOVEMBER 28, PROTECT SITE BY APPLYING 2 TONS PER ACRE OF WELL ANCHORED STRAW MULCH AND SEED AS SOON AS POSSIBLE

MULCHING: APPLY 1-1/2 TO 2 TONS PER ACRE (70 TO 90 LBS./1000 SQ.FT.) OF UNROTTED WEED FREE SMALL GRAIN STRAW IMMEDIATELY AFTER SEEDING. ANCHOR MULCH IMMEDIATELY AFTER APPLICATION USING MULCH ANCHORING TOOL OR 218 GAL PER ACRE (5 GAL/1000 SQ.FT.) OF EMULSIFIED ASPHALT ON FLAT AREAS. ON SLOPES 8 FEET OR HIGHER, USE 348 GAL PER ACRE (8 GAL/1000 SQ.FT.) FOR ANCHORING.

REFER TO THE 1983 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL FOR ADDITIONAL RATES AND METHODS NOT COVERED.

STANDARD SEDIMENT CONTROL NOTES

- 1) A MINIMUM OF 48 HOURS NOTICE MUST BE GIVEN TO THE HOWARD COUNTY DEPARTMENT OF INSPECTIONS, LICENSES AND PERMITS, SEDIMENT CONTROL DIVISION PRIOR TO THE START OF MAY
- 2) ALL VEGETATIVE AND STRUCTURAL PRACTICES ARE TO BE INSTALLED ACCORDING TO THE PROVISIONS OF THIS PLAN AND ARE TO BE IN CONFORMANCE WITH THE MOST CURRENT "MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL". AND REMSIONS THERETO.
- 3) FOLLOWING INITIAL SOIL DISTURBANCE OR REDISTURBANCE, PERMANENT OR TEMPORARY STABILIZATION SHALL BE COMPLETED WITHIN: A) 7 CALENDAR DAYS FOR ALL PERIMETER SEDIMENT CONTROL STRUCTURES, DIKES, PERIMETER SLOPES AND ALL SLOPES GREATER THAN 3:1, B) 14 DAYS AS TO ALL OTHER DISTURBED OR GRADED AREAS ON THE PROJECT SITE.
- 4) ALL SEDIMENT TRAPS/BASINS SHOWN MUST BE FENCED AND WARNING SIGNS POSTED AROUND THEIR PERIMETER IN ACCORDANCE WITH VOL. 1, CHAPTER 12, OF THE HOWARD COUNTY DESIGN
- 5) ALL DISTURBED AREAS MUST BE STABILIZED WITHIN THE TIME PERIOD SPECIFIED ABOVE IN ACCORDANCE WITH THE 1991 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL FOR PERMANENT SEEDING (SEC.51), SOD (SEC. TEMPORARY SEEDING (SEC. 50) AND MULCHING (SEC.52). TEMPORARY STABILIZATION WITH MULCH ALONE CAN ONLY BE DONE WHEN RECOMMENDED SEEDING DATES DO NOT ALLOW FOR PROPER GERMINATION AND ESTABLISHMENT OF GRASSES.
- 6) ALL SEDIMENT CONTROL STRUCTURES ARE TO REMAIN IN PLACE AND ARE TO BE MAINTAINED IN OPERATIVE CONDITION UNTIL PERMISSION FOR THEIR REMOVAL HAS BEEN OBTAINED FROM THE HOWARD COUNTY SEDIMENT CONTROL INSPECTOR.

TOTAL AREA OF SITE:	0.96	ACRES
AREA DISTURBED:	0.55	ACRES
AREA TO BE ROOFED OR PAVED:	0.08	ACRES
AREA TO BE VEGITATIVELY STABILIZED:	0.47	ACRES
TOTAL CUT:	500	CU. YDS.
TOTAL FILL:	500	CU. YDS.
TOTAL WASTE/BORROW AREA LOCATION:	N/A	

THESE QUANTITIES ARE FOR PERMIT PURPOSES ONLY. CONTRACTOR IS REQUIRED TO PROVIDE HIS OWN QUANTITY MEASUREMENTS.

- 8) ANY SEDIMENT CONTROL PRACTICE WHICH IS DISTURBED BY GRADING ACTIVITY FOR PLACEMENT OF UTILITIES MUST BE REPAIRED ON THE SAME DAY OF DISTURBANCE.
- ADDITIONAL SEDIMENT CONTROL MUST BE PROVIDED, IF DEEMED NECESSARY BY THE HOWARD COUNTY SEDIMENT CONTROL INSPECTOR.
- ON ALL SITES WITH DISTURBED AREAS IN EXCESS OF 2 ACRES, APPROVAL OF THE INSPECTION AGENCY SHALL BE REQUESTED UPON COMPLETION OF INSTALLATION OF PERIMETER EROSION AND SEDIMENT CONTROLS, BUT BEFORE PROCEEDING WITH ANY OTHER EARTH DISTURBANCE OR GRADING. OTHER BUILDING OR GRADING INSPECTION APPROVALS MAY NOT BE AUTHORIZED UNTIL THIS INITIAL APPROVAL BY THE INSPECTION AGENCY IS MADE.
- 11) TRENCHES FOR THE CONSTRUCTION OF UTILITIES IS LIMITED TO THREE PIPE LENGTHS OR THAT WHICH CAN BE BACK FILLED AND STABILIZED WITHIN ONE WORKING DAY, WHICHEVER IS SHORTER. STANDARD AND SPECIFICATIONS FOR TOPSOIL

DEFINITION PLACEMENT OF TOPSOIL OVER A PREPARED SUBSOIL PRIOR TO ESTABLISHMENT OF PERMANENT VEGETATION.

TO PROVIDE A SUITABLE SOIL MEDIUM FOR VEGETATIVE GROWTH. SOILS OF CONCERN HAVE LOW MOISTURE CONTENT, LOW NUTRIENT LEVELS, LOW ρ H, MATERIALS TOXIC TO PLANTS, AND/OR UNACCEPTABLE SOIL GRADATION.

	DEVELOPERS CERTIFICATE	
	I CERTIFY THAT ALL DEVELOPMENT AND CONSTRUCTION WILL BE DONE ACCORDING TO THIS PLAN, AND THAT ANY RESPONSIBLE PERSONNEL INVOLVED IN THE CONSTRUCTION PROJECT WILL HAVE A CERTIFICATE OF ATTENDANCE AT A DEPARTMENT OF THE ENVIRONMENT APPROVED TRAINING PROGRAM FOR THE CONTROL OF SEDIMENT AND EROSION BEFORE	
	BEGINNING THE PROJECT. I ALSO AUTHORIZE PERIODIC ON-SITE INSPECTION BY THE NATURAL RESOURCE CONSERVATION SERVICE.	
	a	-/13/2
	SIGNATURE OF DEVELOPER ADRIAN GOLDSEMIPT	DATE
	PRINTED NAME OF DEVELOPER	
•	ENGINEER'S CERTIFICATE	
	I CERTIFY THAT THIS PLAN FOR EROSION AND SEDIMENT CONTROL REPRESEN A PRACTICAL AND WORKABLE PLAN BASED ON MY PERSONAL KNOWEDGE OF THE SITE CONDITIONS AND THAT IT WAS PREPARED IN ACCORDANCE WITH TH REQUIREMENTS OF THE NATURAL RESOURCE CONSERVATION SERVICE.	
	5/1	'c/ e7
	SCNATURE OF ENGINEER	DATE
	R. JACOB HIKMAT	
	PRINTED NAME OF ENGINEER	
	THESE PLANS HAVE BEEN REVIEWED FOR THE HOWARD SOIL CONSERVATION DISTRICT AND MEETS TECHNICAL REQUIREMENTS.	
	Jim Myen 5	alor
	VSDA - NATURAL RESOLUTE CONSERVATION SERVICE	DA IE,
SDPDWG.dwg	THIS DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT.	
DW	I DO DO DO	4.1.
-das\	HOWARD SOIL CONSERVATION DISTRICT	DATE
/DWC	APPROVED: DEPARTMENT OF PLANNING AND ZONING	
H: \06-022\DWG\3	23	19/00
-90\	CHIEF, DEVELOPMENT ENGINEERING DIVISION YO	DATE
Ï	J. Krusto - M nuhust for C. Hamilton CHIEF, DIVISION OF LAND DEVELOPMENT	0-13-0
		DATE
	DIRECTOR G	(//e)
	DINECTOR	UAIL



CONDITIONS WHERE PRACTICE APPLIES I. THIS PRACTICE IS LIMITED TO AREAS HAVING 2:1 OR FLATTER SLOPES WHERE:

- a. THE TEXTURE OF THE EXPOSED SUBSOIL/PARENT MATERIAL IS NOT ADEQUATE TO PRODUCE VEGETATIVE
- b. THE SOIL MATERIAL IS SO SHALLOW THAT THE ROOTING ZONE IS NOT DEEP ENOUGH TO SUPPORT PLANTS
- OR FURNISH CONTINUING SUPPLIES OF MOISTURE AND PLANT NUTRIENTS. c. THE ORIGINAL SOIL TO BE VEGETATED CONTAINS MATERIAL TOXIC TO PLANT GROWTH.

d. THE SOIL IS SO ACIDIC THAT TREATMENT WITH LIMESTONE IS NOT FEASIBLE.

- FOR THE PURPOSE OF THESE STANDARDS AND SPECIFICATIONS, AREAS HAVING SLOPES STEEPER THAN 2:1 REQUIRE SPECIAL CONSIDERATION AND DESIGN FOR ADEQUATE STABILIZATION. AREAS HAVING SLOPES STEEPER THAN 2:1 SHALL HAVE THE APPROPRIATE STABILIZATION SHOWN ON THE PLANS.
- CONSTRUCTION AND MATERIAL SPECIFICATIONS TOPSOIL SALVAGED FROM THE EXISTING SITE MAY BE USED PROVIDED THAT IT MEETS THE STANDARDS AS SET FORTH IN THESE SPECIFICATION. TYPICALLY, THE DEPTH OF TOPSOIL TO BE SALVAGED FOR A GIVEN SOIL TYPE CAN BE FOUND IN THE REPRESENTATIVE SOIL PROFILE SECTION IN THE SOIL SURVEY PUBLISHED BY
- USDA-SCS IN COOPERATION WITH MARYLAND AGRICULTURAL EXPERIMENTAL STATION. TOPSOIL SPECIFICATIONS - SOIL TO BE USED AS TOPSOIL MUST MEET THE FOLLOWING:
- TOPSOIL SHALL BE A LOAM, SANDY LOAM, CLAY LOAM, SILT LOAM, SANDY CLAY LOAM, LOAMY SAND OTHER SOILS MAY BE USED IF RECOMMENDED BY AN AGRONOMIST OR SOIL SCIENTIST AND APPROVED BY THE APPROPRIATE APPROVAL AUTHORITY. REGARDLESS, TOPSOIL SHALL NOT BE A MIXTURE OF CON-RASTING TEXTURED SUBSOILS AND SHALL CONTAIN LESS THAN 5% BY VOLUME OF CINDERS, STONES, SLAG, COARSE FRAGMENTS, GRAVEL, STICKS, ROOTS, TRASH, OR OTHER MATERIALS LARGER THAN 1 1/2" IN
- ii. TOPSOIL MUST BE FREE OF PLANTS OR PLANT PARTS SUCH AS BERMUDA GRASS, QUACKGRASS, JOHNSON—SON GRASS, NUTSEDGE, POISON IVY, THISTLE, OR OTHERS AS SPECIFIED.
- iii. WHERE THE SUBSOIL IS EITHER HIGHLY ACIDIC OR COMPOSED OF HEAVY CLAYS, GROUND LIMESTONE SHALL BE SPREAD AT THE RATE OF 4-8 TONS/ACRE (200-400 POUNDS PER 1,000 SQUARE FEET) PRIOR TO THE PLACEMENT OF TOPSOIL. LIME SHALL BE DISTRIBUTED UNIFORMLY OVER DESIGNATED AREAS AND WORKED INTO THE SOIL IN CONJUNCTION WITH TILLAGE OPERATIONS AS DESCRIBED IN THE FOLLOWING
- III. FOR SITES HAVING DISTURBED AREAS UNDER 5 ACRES:
 - PLACE TOPSOIL (IF REQUIRED) AND APPLY SOIL AMENDMENTS AS SPECIFIED IN <u>20.0 VEGETATIVE</u> <u>STABILIZATION</u> SECTION i VEGETATIVE STABILIZATION METHODS AND MATERIALS.
- IV. FOR SITES HAVING DISTURBED AREAS OVER 5 ACRES:
- ON SOIL MEETING TOPSOIL SPECIFICATIONS, OBTAIN TEST RESULTS DICTATING FERTILIZER AND LIME AMENDMENTS REQUIRED TO BRING THE SOIL INTO COMPLIANCE WITH THE FOLLOWING:
- a. PH FOR TOPSOILS SHALL BE BETWEEN 6.0 AND 7.5. IF THE TESTED SOIL DEMONSTRATES A DH OF LESS THAN 6.0, SUFFICIENT LIME SHALL BE PERSCRIBED TO RAISE THE pH TO 6.5 OR HIGHER.
- b. ORGANIC CONTENT OF TOPSOIL SHALL BE NOT LESS THAN 1.5 PERCENT BY WEIGHT. c. TOPSOIL HAVING SOLUBLE SALT CONTENT GREATER THAN 500 PARTS PER MILLION SHALL NOT BE USED.
- d. NO SOD OR SEED SHALL BE PLACED ON SOIL WHICH HAS BEEN TREATED WITH SOIL STERILANTS OR CHEMICALS USED FOR WEED CONTROL UNTIL SUFFICIENT TIME HAS ELAPSED (14 DAYS MIN.) TO PERMIT DISSIPATION OF PHYTO-TOXIC MATERIALS.

NOTE: TOPSOIL SUBSTITUTES OR AMENDMENTS, AS RECOMMENDED BY A QUALIFIED AGRONOMIST OR SOIL SCIENTIST AND APPROVED BY THE APPROPRIATE APPROVAL AUTHORITY, MAY BE USED IN LIEU OF NATURAL

- ii. PLACE TOPSOIL (IF REQUIRED) AND APPLY SOIL AMENDMENTS AS SPECIFIED IN <u>20.0 VEGETATIVE</u> STABILIZATION SECTION I VEGETATIVE STABILIZATION METHODS AND MATERIALS.
- V. TOPSOIL APPLLICATION WHEN TOPSOILING, MAINTAIN NEEDED EROSION AND SEDIMENT CONTROL PRACTICES SUCH AS DIVERSIONS,
 - GRADE STABILIZATION STRUCTURES, EARTH DIKES, SLOPE SILT FENCE AND SEDIMENT TRAPS AND BASINS. II. GRADES ON THE AREAS TO BE TOPSOILED, WHICH HAVE BEEN PREVIOUSLY ESTABLISHED, SHALL BE MAINTAINED, ALBEIT 4" - 8" HIGHER IN ELEVATION.
- iii. TOPSOIL SHALL BE UNIFORMLY DISTRIBUTED IN A 4" TO 8" LAYER AND LIGHTLY COMPACTED TO A MINIMUM THICKNESS OF 4". SPREADING SHALL BE PERFORMED IN SUCH A MANNER THAT SODDING OR SEEDING CAN PROCEED WITH A MINIMUM OF ADDITIONAL SOIL PREPARATION AND TILLAGE. ANY IRREGULARITIES IN THE SURFACE RESULTING FROM TOPSOILING OR OTHER OPERATIONS SHALL BE CORRECTED IN ORDER TO PREVENT THE FORMATION OF DEPRESSIONS OR WATER POCKETS.
- TOPSOIL SHALL NOT BE PLACED WHILE THE TOPSOIL OR SUBSOIL IS IN A FROZEN OR MUDDY CONDITION, WHEN THE SUBSOIL IS EXCESSIVELY WET OR IN A CONDITION THAT MAY OTHERWISE BE DETRIMENTAL TO PROPER
- GRADING AND SEEDBED PREPARATION. VI. ALTERNATIVE FOR PERMANENT SEEDING — INSTEAD OF APPLYING THE FULL AMOUNTS OF LIME AND COMMERCIAL FERTILIZER, COMPOSTED SLUDGE AND AMENDMENTS MAY BE APPLIED AS SPECIFIED BELOW:
 - COMPOSTED SLUDGE MATERIAL FOR USE AS A SOIL CONDITIONER FOR SITES HAVING DISTURBED AREAS OVER 5 ACRES SHALL BE TESTED TO PRESCRIBE AMENDMENTS AND FOR SITES HAVING AREAS UNDER 5
 - ACRES SHALL CONFORM TO THE FOLLOWING REQUIREMENTS: COMPOSTED SLUDGE SHALL BE SUPPLIED BY, OR ORIGINATE FROM, A PERSON OR PERSONS WHO ARE PERMITTED (AT THE TIME OF ACQUISITION OF THE COMPOST) BY THE MARYLAND DEPARTMENT OF THE
 - b. COMPOSTED SLUDGE SHALL CONTAIN AT LEASE 1 PERCENT NITROGEN, 1.5 PERCENT PHOSPHOURUS, AND 0.2 PERCENT POTASSIUM AND HAVE A Ph OF 7.0 TO 8.0. IF COMPOST DOES NOT MEET THESE REQUIREMENTS,
 - THE APPROPRIATE CONSTITUENTS MUST BE ADDED TO MEET THE REQUIREMENTS PRIOR TO USE. c. COMPOSTED SLUDGE SHALL BE APPLIED AT A RATE OF 1 TON/1.000 SQUARE FEET. COMPOSTED SLUDGE SHALL BE AMENDED WITH A POTASSIUM FERTILLIZER APPLIED AT THE RATE OF 4 LB/1,000

REFERENCES: GUIDELINE SPECIFICATIONS, SOIL PREPARATION AND SODDING, MD-VA, PUB. #1, COOPERATIVE EXTENSION SERVICE, UNIVERSITY OF MARYLAND AND VIRGINIA POLYTECHNIC INSTITUTES. REVISED 1973.

TEMPORARY DUST CONTROL MEASURES

- 1. MULCHES SEE STANDARDS FOR VEGETATIVE STABILIZATION WITH MULCHES ONLY. MULCH SHOULD BE CRIMPED OR TACKED TO PREVENT BLOWING.
- 2. VEGETATIVE COVER SEE STANDARDS FOR TEMPORARY VEGETATIVE COVER. 3. TILLAGE - TO ROUGHTN SURFACE AND BRING CLODS TO THE SURFACE. THIS IS AN EMERGENCY MEASURE WHICH SHOULD BE USED BEFORE SOIL BLOWING STARTS. BEGIN PLOWING ON WINDWARD SIDE OF

SQUARE FEET, AND 1/3 THE NORMAL LIME APPLICATION RATE.

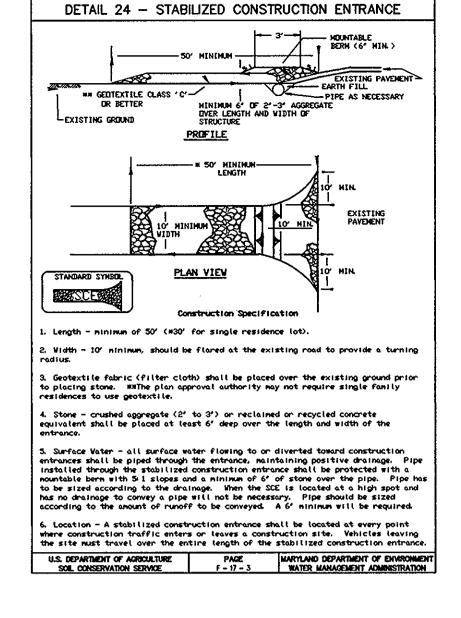
- SITE. CHISEL-TYPE PLOWS APCED ABOUT 12" APART, SPRING-TOOTHED HARROWS, AND SIMILAR PLOWS ARE EXAMPLES OF EQUIPMENT WHICH MAY PRODUCE THE DESIRED EFFECT.
- 4. IRRIGATION THIS IS GENERALLY DONE AS AN EMERGENCY TREATMENT. SITE IS SPRINKLED WITH WATER UNTIL THE SURFACE IS MOIST. REPEAT AS NEEDED. AT NO TIME SHOULD THE SITE BE IRRIGATED TO THE POINT THAT RUNOFF BEGINS TO FLOW.
- 5. BARRIERS SOLID BOARD FENCES, SILT FENCES, SNOW FENCES, BURLAP FENCES, STRAW BALES, AND SIMILAR MATERIAL CAN BE USED TO CONTROL AIR CURRENTS AND SOIL BLOWING. BARRIERS PLACED AT RIGHT ANGLES TO PREVAILING CURRENTS AT INTERVALT OF ABOUT 10 TIMES THEIR HEIGHT ARE EFFECTIVE IN CONTROLLING SOIL BLOWING.
- 6. CALCIUM CHLORIDE APPLY AT RATES THAT WILL KEEP SURFACE MOIST. MAY NEED RETREATMENT.

SEQUENCE OF CONSTRUCTION

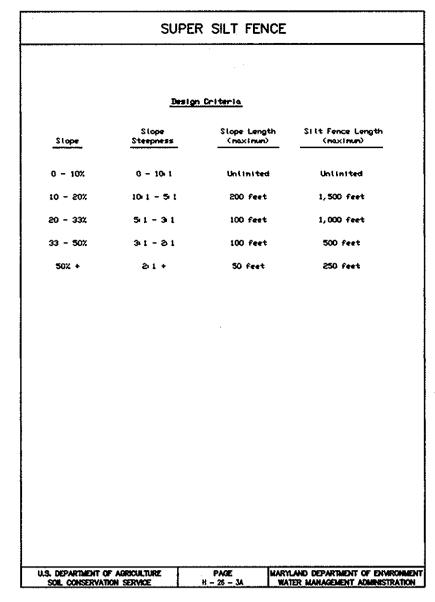
- OBTAIN GRADING PERMIT (ONE DAY) 2. CONSTRUCT STABILIZED CONSTRUCTION ENTRANCE AT LOCATION SHOWN. (ONE DAY)
- CONSTRUCT SUPER SILT FENCE (TWO DAYS)
- 4. COMPLETE CONSTRUCTION AS SHOWN. (90 DAYS) 5. COMPLETE FINE GRADING OF SITE TO GRADES INDICATED.(TWO DAYS)
- 6. SEED AND MULCH ALL REMAINING DISTURBED AREAS. (TWO DAYS)
- 7. UPON STABILIZATION OF THE SITE AND WITH THE APPROVAL OF THE SEDIMENT CONTROL INSPECTOR, REMOVE SEDIMENT CONTROL DEVICES AND STABILIZE REMAINING DISTURBED AREAS. (ONE DAY)

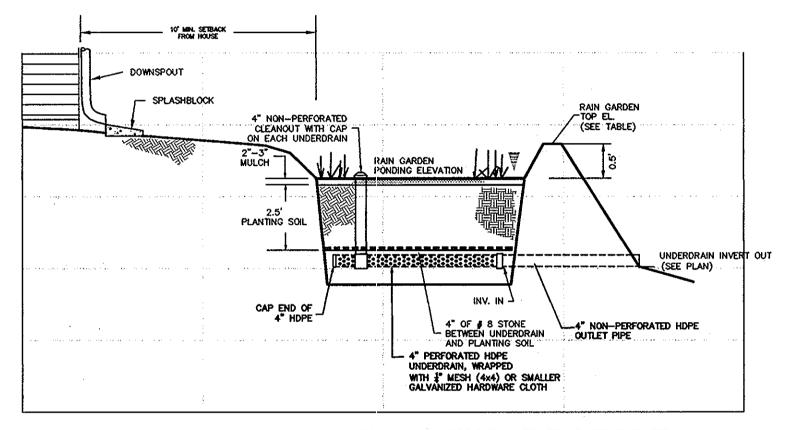
OPERATION AND MAINTENANCE SCHEDULE FOR RAIN GARDES

- a. ANNUAL MAINTENANCE OF PLANT MATERIAL, MULCH LAYER AND SOIL LAYER IS REQUIRED. MAINTENANCE OF MULCH AND SOIL IS LIMITED TO CORRECTING AREAS OF EROSION OR WASH OUT. ANY MULCH REPLACEMENT SHALL BE DONE IN THE SPRING, PLANT MATERIAL SHALL BE CHECKED FOR DISEASE AND INSECT INFESTATION AND MAINTENANCE WILL ADDRESS DEAD MATERIAL AND PRUNING.
- b. SCHEDULE OF PLANT INSPECTION WILL BE TWICE A YEAR IN SPRING AND FALL. THIS INSPECTION WILL INCLUDE REMOVAL OF DEAD AND DISEASED VEGETATION CONSIDERED BEYOND TREATMENT, TREATMENT OF ALL DISEASED TREES AND SHRUBS AND REPLACEMENT OF ALL DEFICIENT STAKES AND WIRES.
- c. MULCH SHALL BE INSPECTED EACH SPRING. REMOVE PREVIOUS MULCH LAYER BEFORE APPLYING NEW LAYER ONCE EVERY 2 TO 3 YEARS.
- d. SOIL EROSION TO BE ADDRESSED ON AN AS NEEDED BASIS, WITH A MINIMUM OF ONCE PER MONTH AND AFTER HEAVY STORM EVENT.

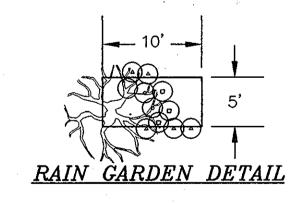


	33 - SUPER SI	LITEROL
NOTE: FENCE POST SPACING SHALL NOT EXCEED 10'	, 10' HEXIMUM	- ĭ
CENTER TO CENTER		<u> </u>
		34° MINIMUM
GROUND	***************************************	
SURFACE	· / / / / / / / / / / / / / / / / / / /	
FLOV	√ /	36' HINIHUH
21/2' DIANETE		FLOV
GALVANIZED DR ALLMINUM	WITH 1 LAYER	
POSTS	FILTER CLOTH	
CHAIN LINK FENCING-	- 	
FLONFILITER CLOTH-	34' MINIMUM	1
TATATA	16. 1	ntn. 19t layer of Er Cloth ^{ik}
EMBED FILTER CLOTH 8'	THE THE TAX	ar valin
		STANDARD SYNBOL
MIF MULTIPLE LAYERS ARE REQUIRED TO ATTAIN 42'	•	
Constr	uction Specifications	(
latest Manyland State Highway is for a 6' fence shall be used, posts. 2. Chain link fence shall be fi the lower tension wine, brace a required except on the ends of	substituting 42" fabr astened securely to t and truss rods, drive	ic and 6' length ne fence posts with wire ties.
3. Filter cloth shall be faster		min tink rence with ties spac
every 24" at the top and mid s		
•		nto the ground.
4. Filter cloth shall be enbed 5. When two sections of filter	ded a nininum of 8° i	
 Fitter cloth shall be enbed When two sections of fitter by 6° and folded. Haintenance shall be perfor 	ded a nininun of 8° i cloth adjoin each ot ned as needed and sil	ner, they shall be overlapped t buildups renoved when "bulge
 Fitter cloth shall be enbed When two sections of fitter by 6° and folded. Haintenance shall be perfor 	ded a minimum of 8° i cloth adjoin each ot med as needed and silt when silt reaches 50% ned securely to each	ner, they shall be overlapped t buildups renoved when "bulge of fence height Fence post with wire ties or
 Filter cloth shall be enled When two sections of filter by 6' and folded. Haintenance shall be perfor develop in the silt fence, or 17. Filter cloth shall be faste staples at top and nid section Geotextile Class Fi Tensile Strength 	ded a nininum of 8° i cloth adjoin each ot med as needed and silt when silt reaches 50% ned securely to each and shall neet the fi 50 lbs/in (mir.)	t buildups renoved when "bulge of fence height Fence post with wire ties or billowing requirements for Test MSNT 509
5. When two sections of filter by 6' and folded. 6. Maintenance shall be perfordevelop in the silt fence, or 7. Filter cloth shall be faste staples at top and nid section Geotextile Class Fi Tensile Strength Tensile Modulus Flow Rate	ded a minimum of 8° i cloth adjoin each other med as needed and silt when sitt reaches 50% med securely to each and shall neet the for 50 lbs/in (mir.) 0.3 gal/ft/mirute (ner, they shall be overlapped t buildups removed when "bulge of fence height Fence post with wire ties or bllowing requirements for Test MSHT 509 Test MSHT 509 MAX.> Test MSHT 322
 Filter cloth shall be enbed When two sections of filter by 6" and folded. Maintenance shall be perfor develop in the silt fence, or : Filter cloth shall be faste staples at top and nid section Geotextile Class Fi Tensile Strength Tensile Modulus 	ded a minimum of 8° i cloth adjoin each other med as needed and silt when silt reaches 50% ned securely to each and shall neet the fi 50 lbs/in (mir.)	ner, they shall be overlapped t buildups renoved when "bulge of fence height fence post with wire ties or bllowing requirements for Test MSNT 509 Test MSNT 509





TYPICAL RAIN GARDEN PROFILE



PLANT LIST

<u> </u>								
QUANTITY	SYMBOL	BOTANICAL NAME	COMMON NAME	SIZE				
1	彩	PLATANUS OCCIDENTALIS	AMERICAN SYCAMORE	2-1/2" - 3" CAL.				
1		ILEX GLABRA	INK BERRY	2' – 3' HT.				
6	(a)	LOBELIA SIPHILITICA	GREAT BLUE LOBELIA	1 GAL. CONTAINER				
4	0	ONOCLEA SENSIBILIS	SENSITIVE FERN	1 GAL. CONTAINER				
3	0	ASTER NOVAE-ANGLIAE	NEW ENGLAND ASTER	1 GAL. CONTAINER				

TOTAL: 13 PERENNIALS, 1 SHRUB, 1 TREE (PER EACH RAIN GARDEN)

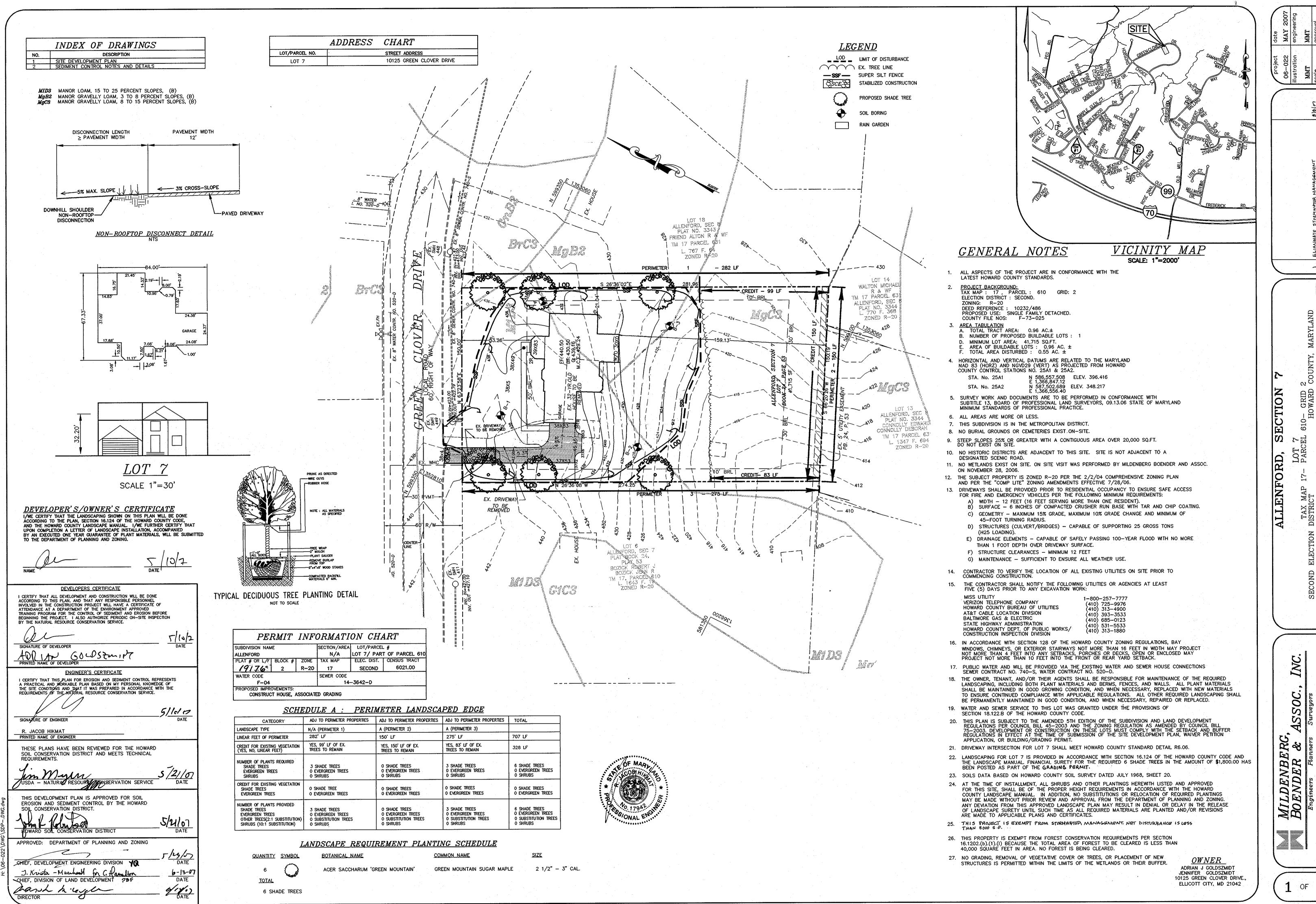
RAINGARDEN INFORMATION

RAINGARDEN	DIMENSIONS	PONDING ELEVATION	TOP ELEVATION	INV. IN ELEVATION	INV. OUT ELEVATION
1	5'X10'	437.50'	438.00'	434.60'	434.00'
2	5'X10'	424.50'	425.00'	421.60'	421.50'
3	5'X10'	424.50'	425.00'	421.60'	421.50'
4	5'X10'	424.50	425.00	421.60'	421.50'
5	5'X10'	425.50	426.00'	422.60'	422.40'
6	5'X10'	427.50	428.00'	424.60'	424.50'

y ≥ Z 6

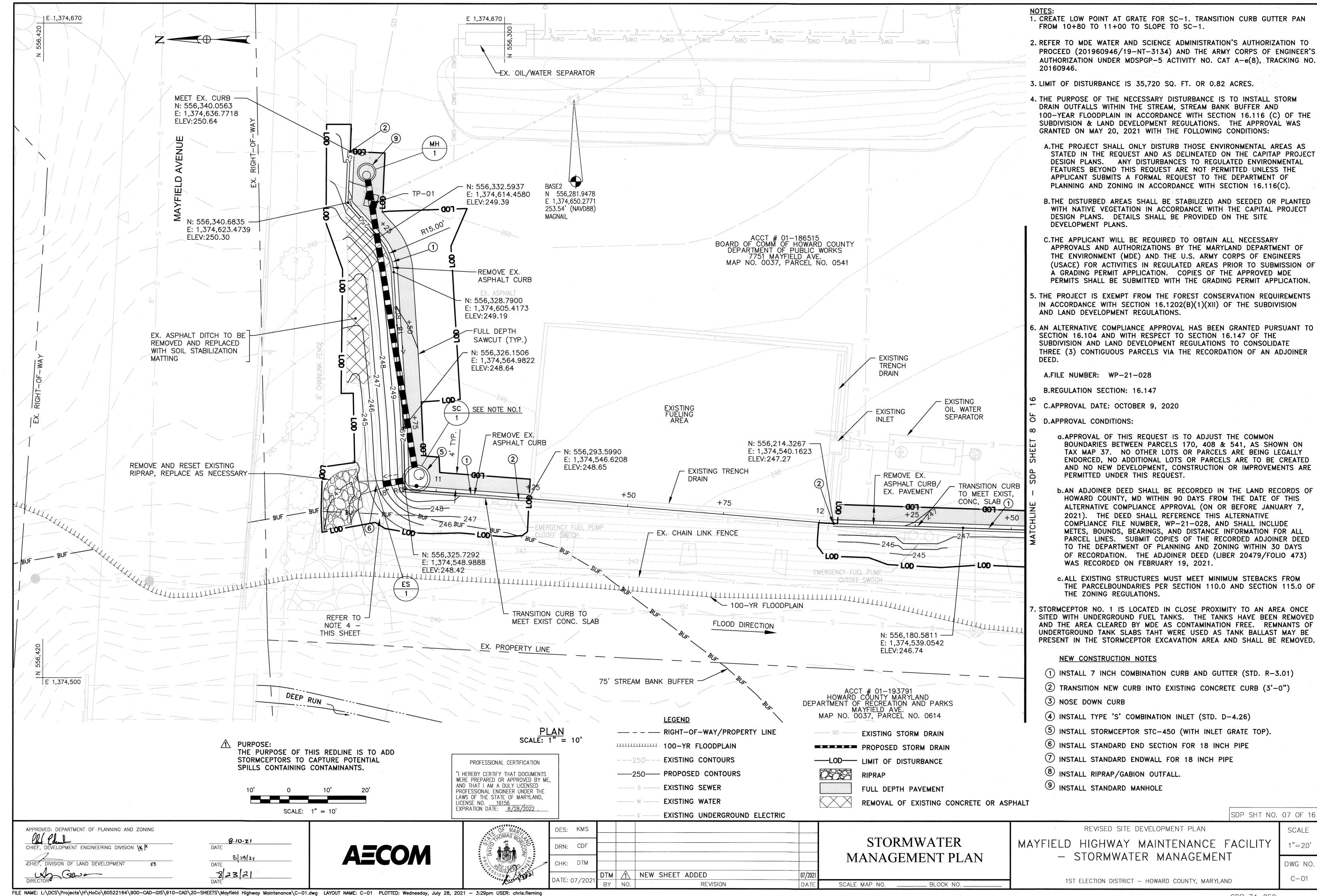
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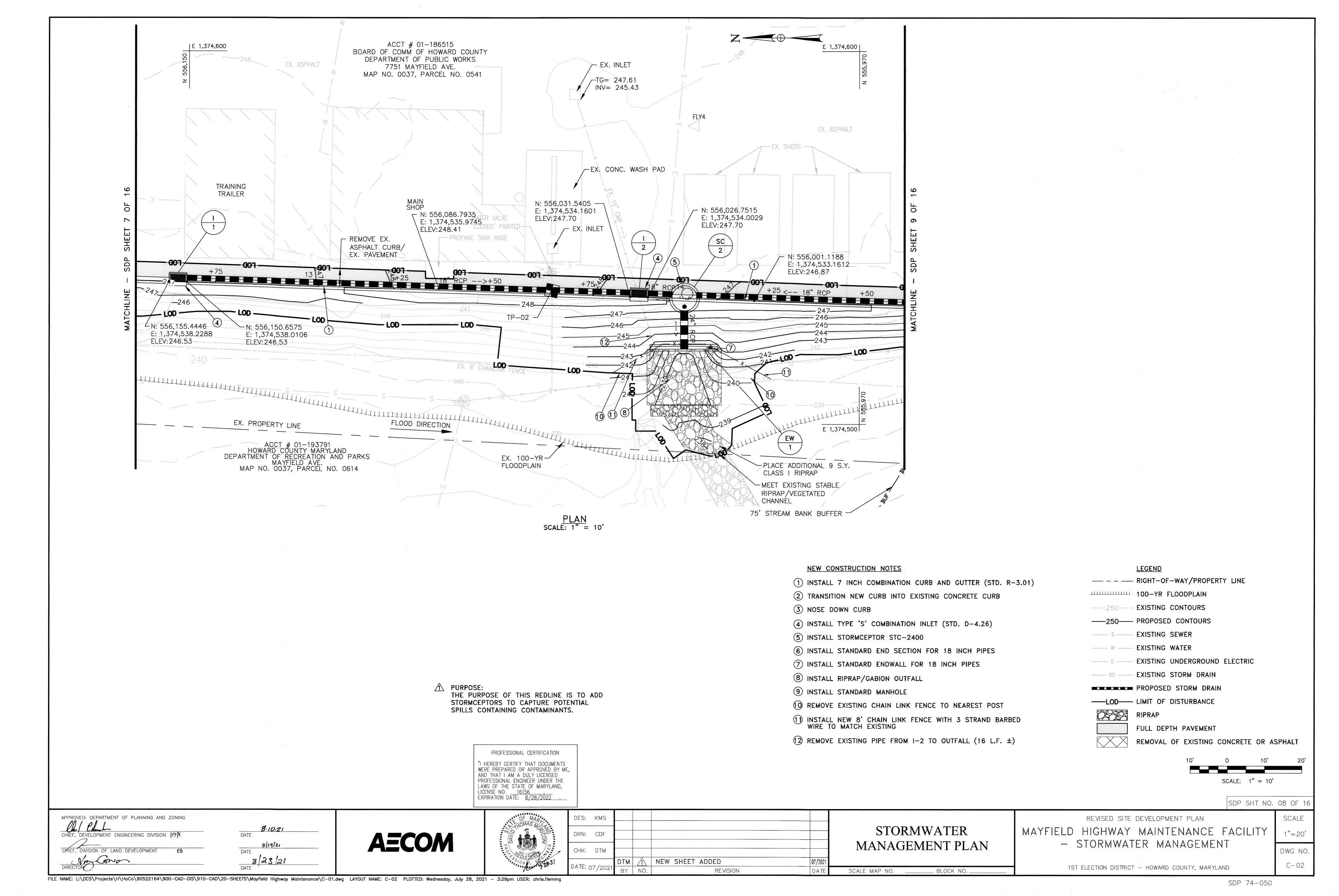
SDP 07-050

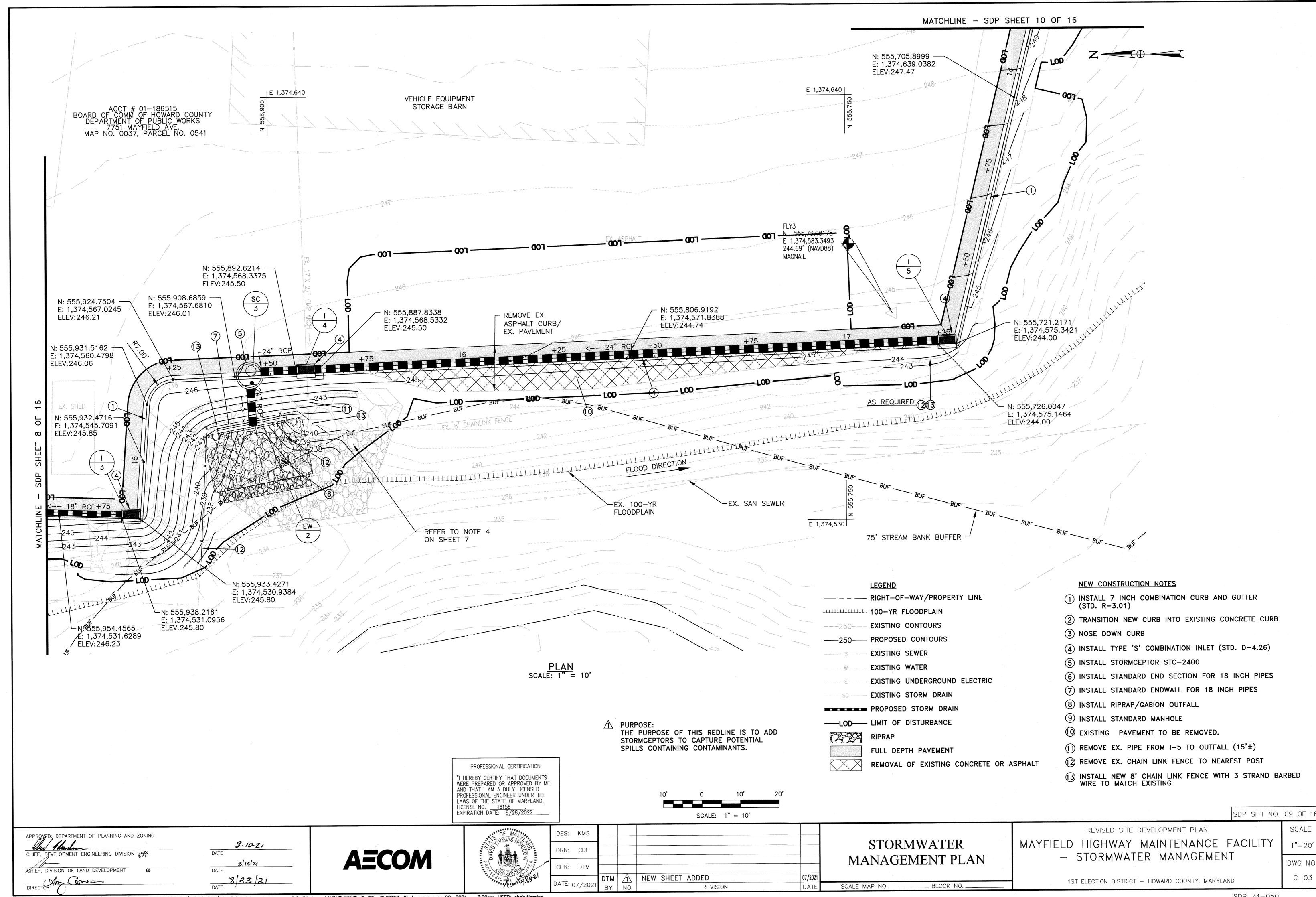


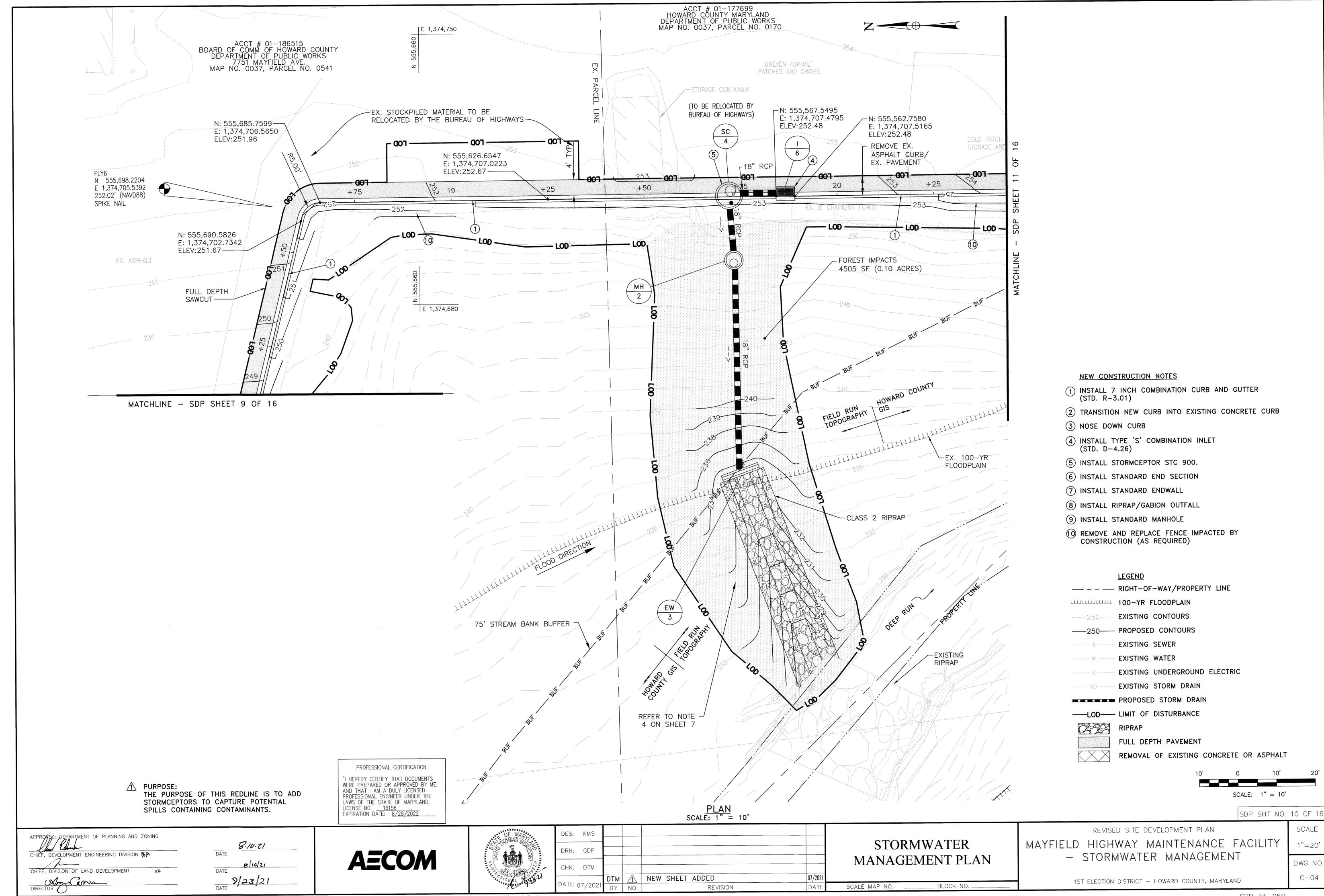
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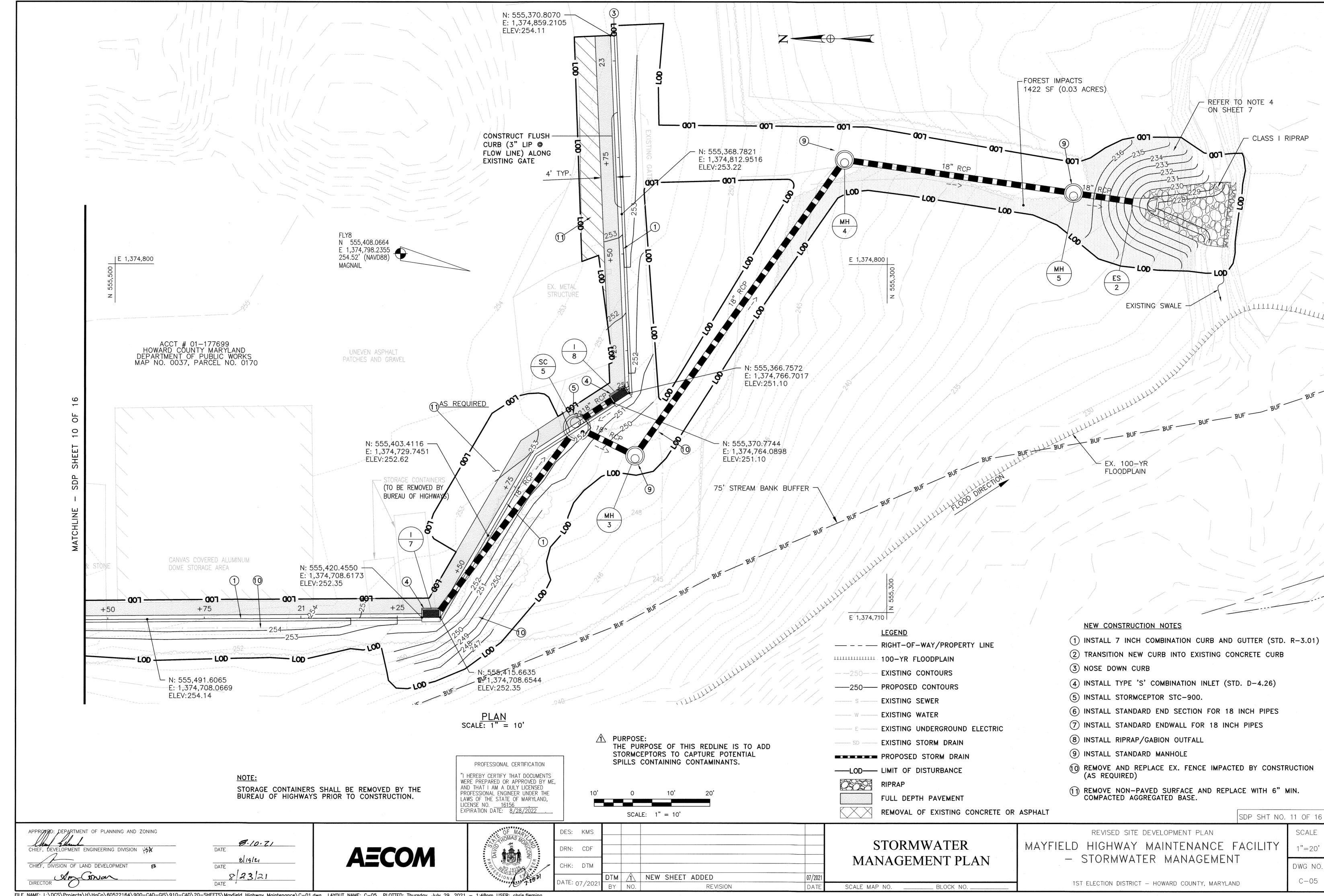
SDP 07-050

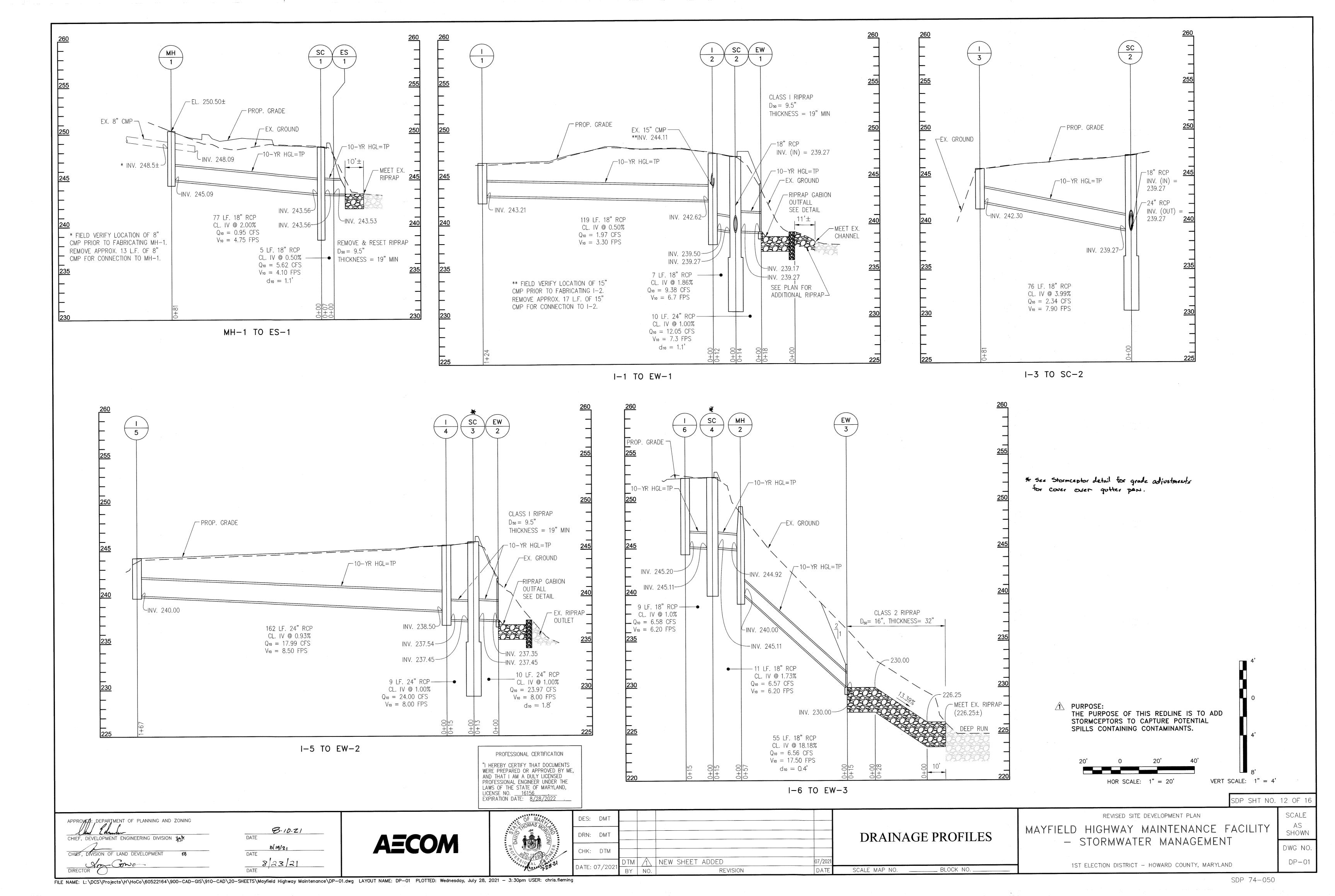


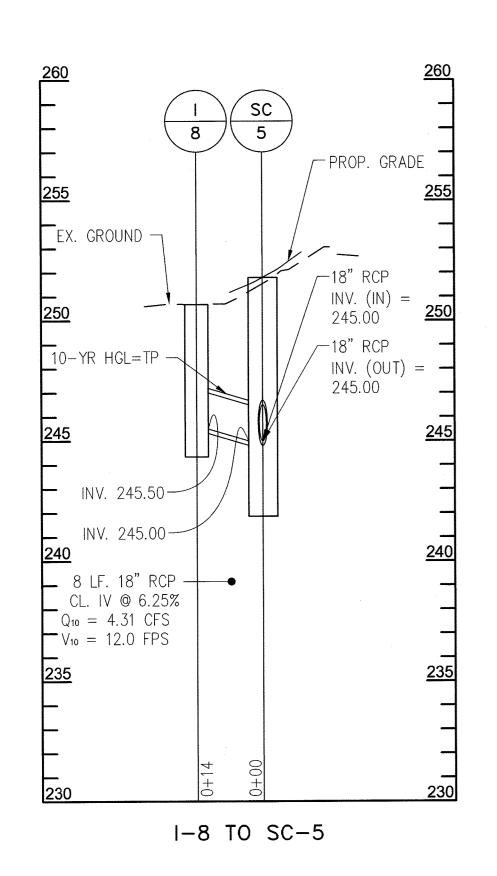


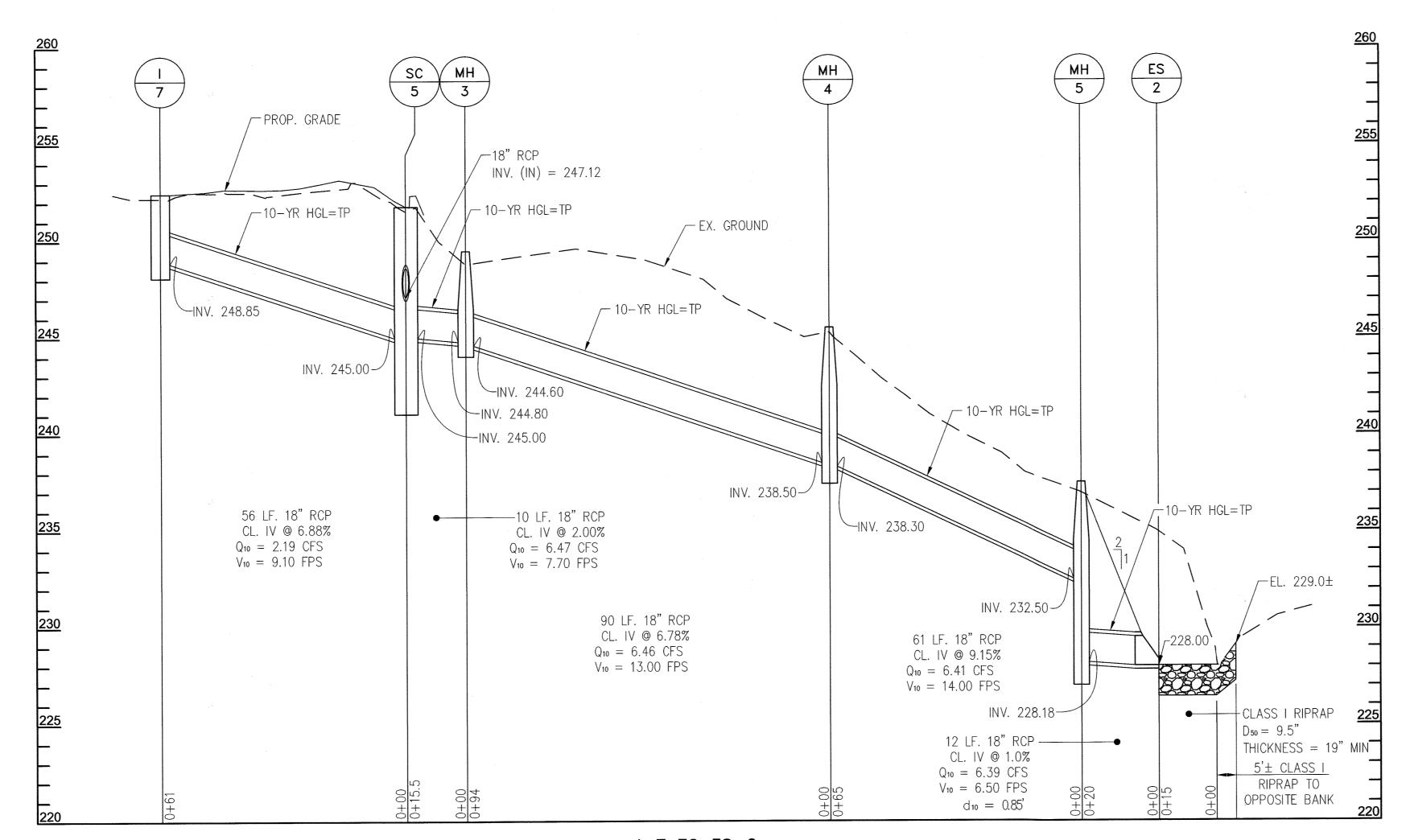










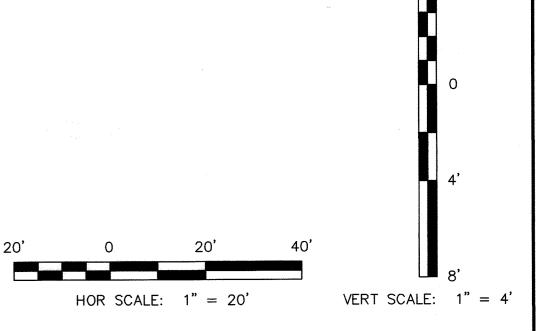


I-7 TO ES-2

,					STRUCTURE SCHEDULE		,			I
STRUCTURE		WORKPOINT			STRUCTURE TYPE	TOP OF STRUCT.	INVERT	INVERT	STD. NO.	REMARKS
DESIGNATION	N STATION OFF		NORTHING	EASTING	3.11.0 S.11.1 E	ELEV.	IN	OUT		
I-1	12+65.00	0.00	1,374,538.15	556,153.05	TYPE S COMBINATION INLET	246.53	-	243.21	D-4.26	
I-2	13+88.97	0.00	1,374,534.08	556,029.15	TYPE S COMBINATION INLET	247.70	242.62	239.50	D-4.26	
I-3	14+82.35	0.00	1,374,531.02	555,935.82	TYPE S COMBINATION INLET	245.80	-	242.39	D-4.26	
1-4	15+59.22	0.00	1,374,568.43	555,890.23	TYPE S COMBINATION INLET	245.50	239.00	237.54	D-4.26	
I-5	17+25.98	0.00	1,374,575.24	555,723.61	TYPE S COMBINATION INLET	244.00	-	240.50	D-4.26	
I-6	19+86.64	0.00	1,374,707.49	555,565.15	TYPE S COMBINATION INLET	252.48	-	245.20	D-4.26	
I-7	21+33.74	0.00	1,374,708.64	555,418.06	TYPE S COMBINATION INLET	252.35	-	248.85	D-4.26	
I-8	22+11.63	0.00	1,374,765.40	555,368.77	TYPE S COMBINATION INLET	251.10	-	245.00	D-4.26	
				,						
MH-1	10+05.26	4.45	1,374,631.31	556,335.86	PRECAST MANHOLE	250.50+/-	248.5+/-	245.09	G-5.12	CONNECT EX. 8" CMP
MH-2	19+73.05	16.40	1,374,691.00	555,578.62	PRECAST MANHOLE	249.00	244.92	240.00	G-5.12	
MH-3	22+06.44	14.42	1,374,750.48	555,365.26	PRECAST MANHOLE	249.50	244.80	244.60	G-5.12	
MH-4	22+71.88	58.23	1,374,827.07	555,311.12	PRECAST MANHOLE	245.50	238.50	238.30	G-5.12	
MH-5	22+60.72	117.06	1,374,818.47	555,251.85	PRECAST MANHOLE	237.50	232.50	228.18	G-5.12	
ES-1	10+90.15	3.74	1,374,550.68	556,329.51	CONCRETE END SECTION	-	-	243.50	D-5.51	REMOVE/RESET RIPRAP
ES-2	22+57.83	132.13	1,374,816.25	555,236.54	CONCRETE END SECTION	-	-	228.00	D-5.51	
EW-1	14+01.59	13.56	1,374,520.11	556,016.97	MOD. TYPE C ENDWALL	-		239.17	D-5.21	USE DIMENSIONS FOR 42" RCP
EW-2	15+44.86	13.10	1,374,554.76	555,904.04	MOD. TYPE C ENDWALL	-		237.35	D-5.21	USE DIMENSIONS FOR 42" RCP
EW-3	19+72.94	70.49	1,374,694.44	555,578.75	TYPE C ENDWALL	-		230.00	D-5.21	
SC-1	10+89.22	3.00	1,374,551.79	556,322.80	STC 450i PRECAST STORMCEPTOR	248.30	243.56	243.56	STC-450	SEE DETAIL, SHEET C-06
SC-2	14+01.15	0.00	1,374,533.71	556,016.97	STC 450i PRECAST STORMCEPTOR	245.27	239.27	239.27	STC-450	SEE DETAIL, SHEET C-06
SC-3	15+44.59	0.00	1,374,567.99	555,904.85	STC 2400 PRECAST STORMCEPTOR	245.88	237.45	237.45	STC-2400	SEE DETAIL, SHEET C-06
SC-4	19+72.02	0.00	1,374,707.66	555,579.78	STC 900 PRECAST STORMCEPTOR	252.63	245.11	245.11	STC-900	SEE DETAIL, SHEET C-06
SC-5	21+97.77	0.00	1,374,757.81	555,380.37	STC 900 PRECAST STORMCEPTOR	251.62	245.00	245.00	STC-900	SEE DETAIL, SHEET C-06

-	PIPE SCHEDULE							
FROM	TO	SIZE	TYPE	LENGTH	REMARKS			
MH-1	SC-1	18"	RCP	77'				
SC-1	ES-1	18"	RCP	5'				
I-1	1-2	18"	RCP	119'				
1-2	SC-2	18"	RCP	7'				
SC-2	EW-1	24"	RCP	10'				
1–3	SC-2	18"	RCP	76'				
1-5	1-4	24"	RCP	162'				
1-4	SC-3	24"	RCP	9'				
SC-3	EW-2	24"	RCP	10'				
1-6	SC-4	18"	RCP	9'				
SC-4	MH-2	18"	RCP	11'				
MH-2	EW-3	18"	RCP	55'				
1-7	SC-5	18"	RCP	56'	:			
1-8	SC-5	18"	RCP	8'				
SC-5	MH-3	18"	RCP	10'				
MH-3	MH-4	18"	RCP	90'				
MH-4	MH-5	18"	RCP	61'				
MH-5	ES-2	18"	RCP	12'				

PROFESSIONAL CERTIFICATION "I HEREBY CERTIFY THAT DOCUMENTS THE PURPOSE OF THIS REDLINE IS TO ADD STORMCEPTORS TO CAPTURE POTENTIAL SPILLS CONTAINING CONTAMINANTS.



APPROVED: DEPARTMENT OF PLANNING AND ZONING

CHIEF, DEVELOPMENT ENGINEERING DIVISION CHIÉF, DIVISION OF LAND DEVELOPMENT

>/23/21 DATE

AECOM

OF MARIAN MONOR ON NO 15 ES NO 16 ES NO
--

DES: DMT				
DRN: DMT				
OLUK D.TM				
CHK: DTM				
DATE: 07 /0001	DTM	1	NEW SHEET ADDED	07/2021
DATE: 07/2021	BY	NO.	REVISION	DATE

DRAINAGE PROFILES AND SCHEDULES

SCALE MAP NO.

___ BLOCK NO. .

REVISED SITE DEVELOPMENT PLAN MAYFIELD HIGHWAY MAINTENANCE FACILITY - STORMWATER MANAGEMENT

1ST ELECTION DISTRICT - HOWARD COUNTY, MARYLAND

SDP SHT NO. 13 OF 16

SCALE

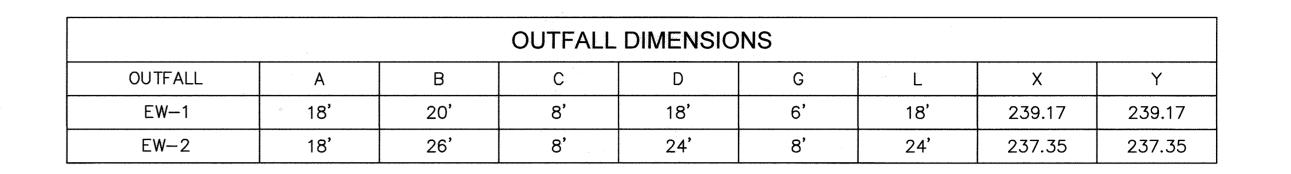
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DWG NO

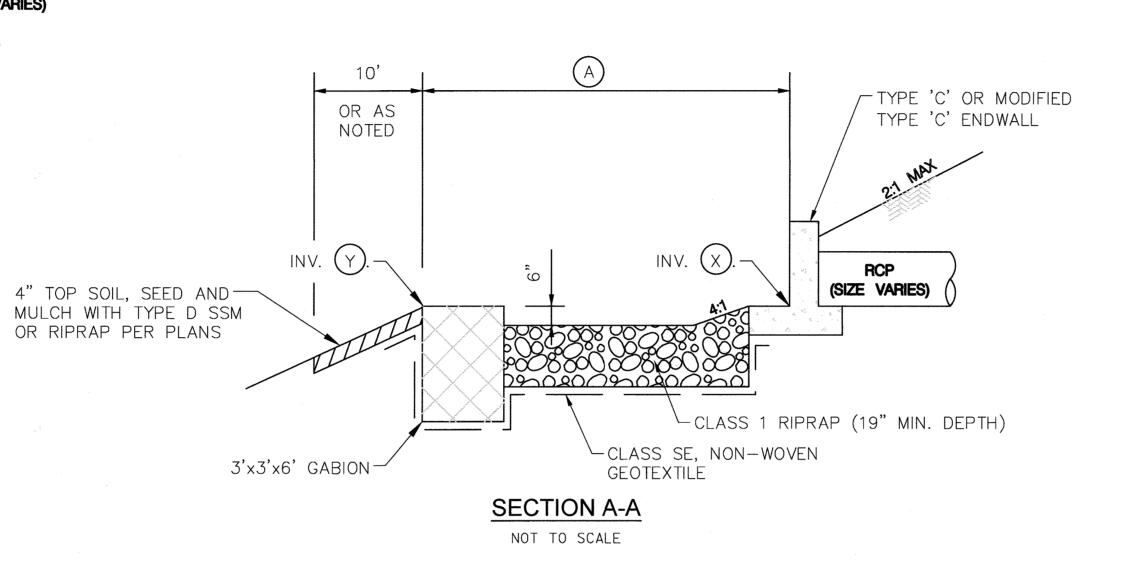
DP-02

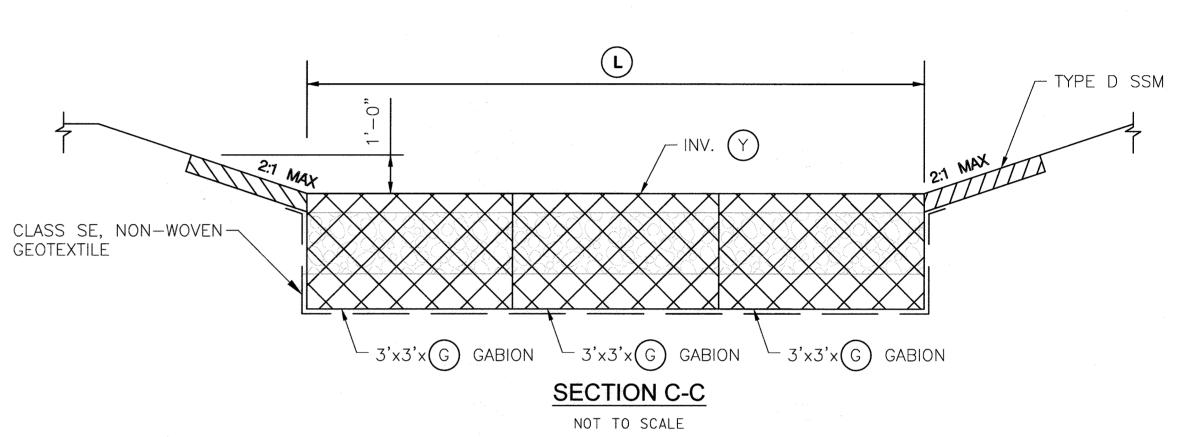


RCP (SIZE VARIES)

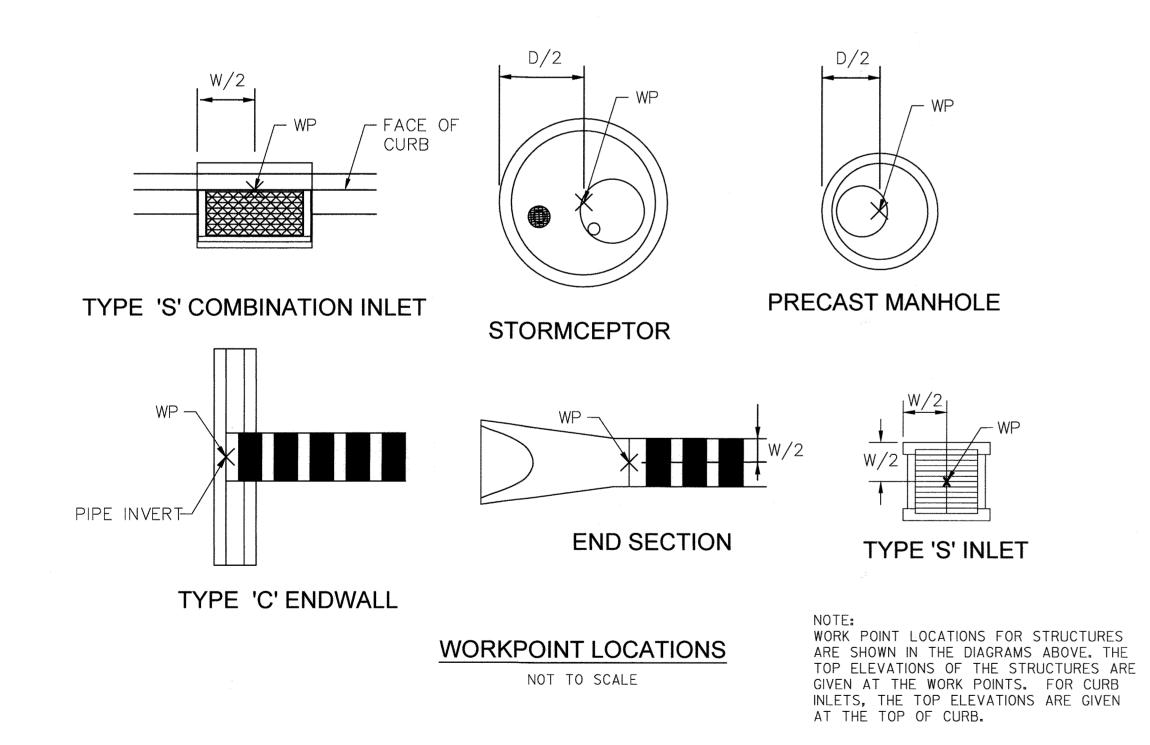








RIPRAP/GABION OUTFALL DETAIL



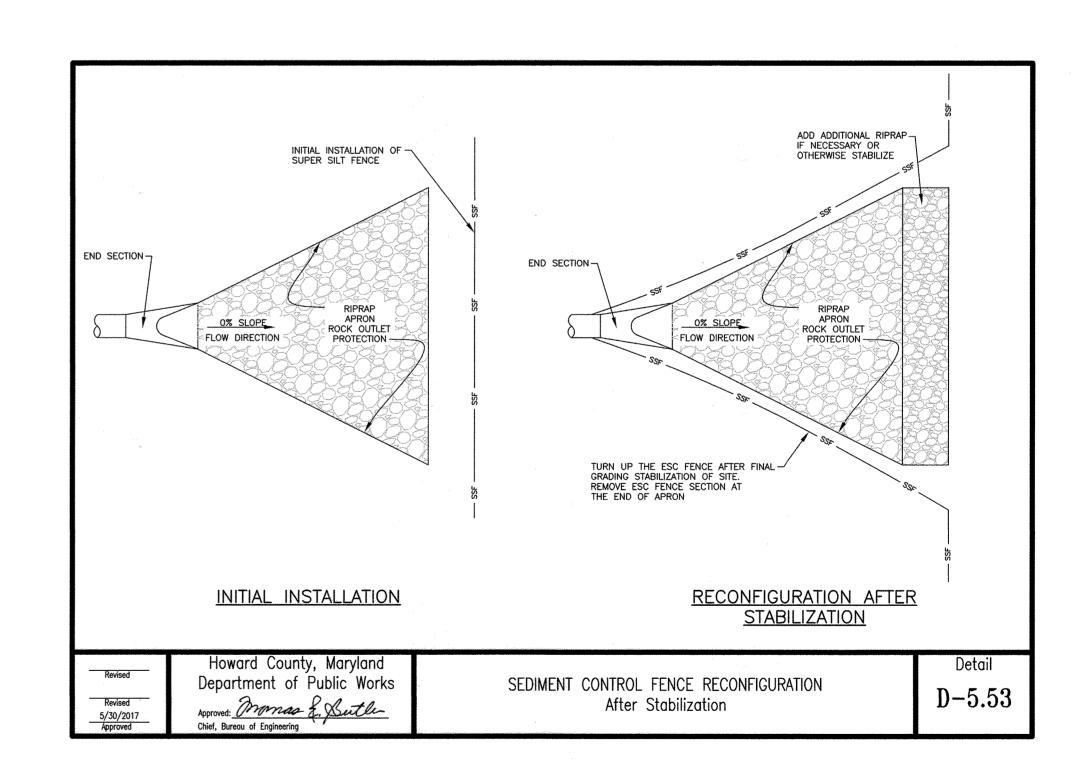
C -

APPROVED: DEPARTMENT OF PLANNING AND ZONING

CHIEF, DEVELOPMENT ENGINEERING DIVISION WAR

PLAN

NOT TO SCALE



PROFESSIONAL CERTIFICATION "I HEREBY CERTIFY THAT DOCUMENTS WERE PREPARED OR APPROVED BY ME, AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE

1 PURPOSE: THE PURPOSE OF THIS REDLINE IS TO ADD STORMCEPTORS TO CAPTURE POTENTIAL SPILLS CONTAINING CONTAMINANTS.

REVISION

DES: DMT DRN: DMT STORM DRAIN DETAILS CHK: DTM DTM 1 NEW SHEET ADDED

DATE

SCALE MAP NO.

_ BLOCK NO.

SDP SHT NO. 14 OF 16 SCALE REVISED SITE DEVELOPMENT PLAN

 STORMWATER MANAGEMENT 1ST ELECTION DISTRICT - HOWARD COUNTY, MARYLAND

MAYFIELD HIGHWAY MAINTENANCE FACILITY

DATE: 07/202

AECOM

SDP 74-050

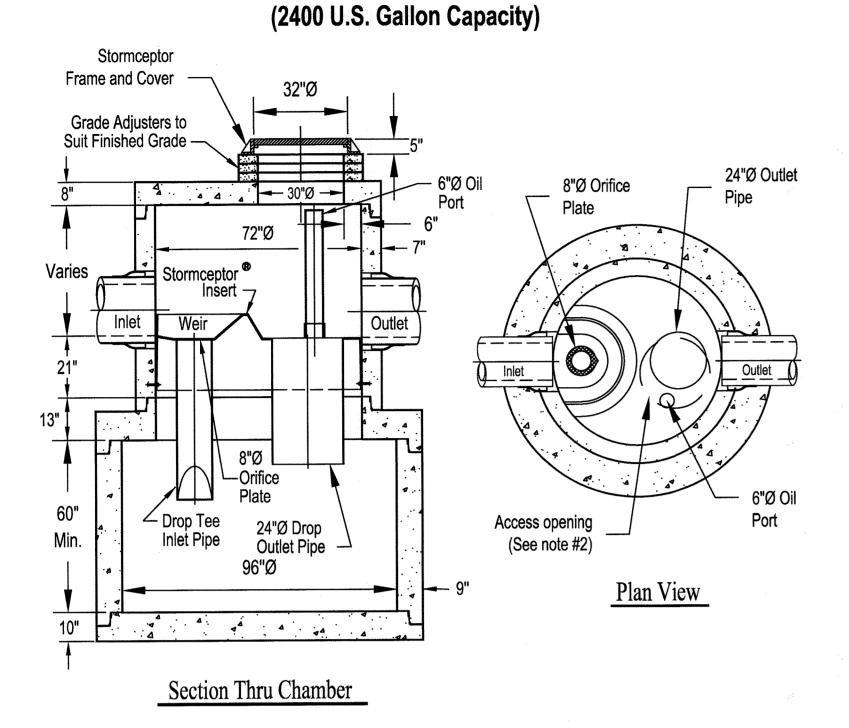
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DWG NO

DD-01

FILE NAME: L:\DCS\Projects\H\HoCo\60522164\900-CAD-GIS\910-CAD\20-SHEETS\Mayfield Highway Maintenance\DD-01.dwg LAYOUT NAME: DD-01 PLOTTED: Wednesday, July 28, 2021 - 3:30pm USER: chris.fleming

STC 450i Precast Concrete Stormceptor® (450 U.S. Gallon Capacity)

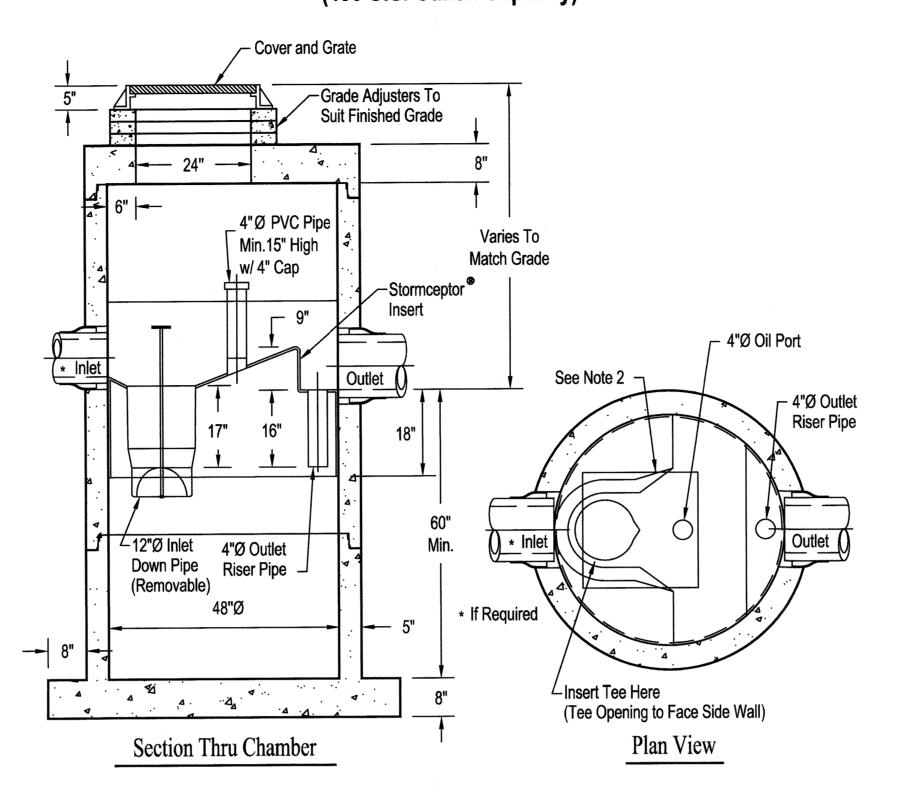


STC 2400 Precast Concrete Stormceptor®

Notes:

- 1. The Use Of Flexible Connection is Recommended at The Inlet and Outlet Where Applicable.
- 2. The Cover Should be Positioned Over The Outlet Drop Pipe and The Oil Port.
- 3. The Stormceptor System is protected by one or more of the following U.S. Patents: #4985148, #5498331, #5725760, #5753115, #5849181, #6068765, #6371690.
- 4. Contact a Concrete Pipe Division representative for further details not listed on this drawing.

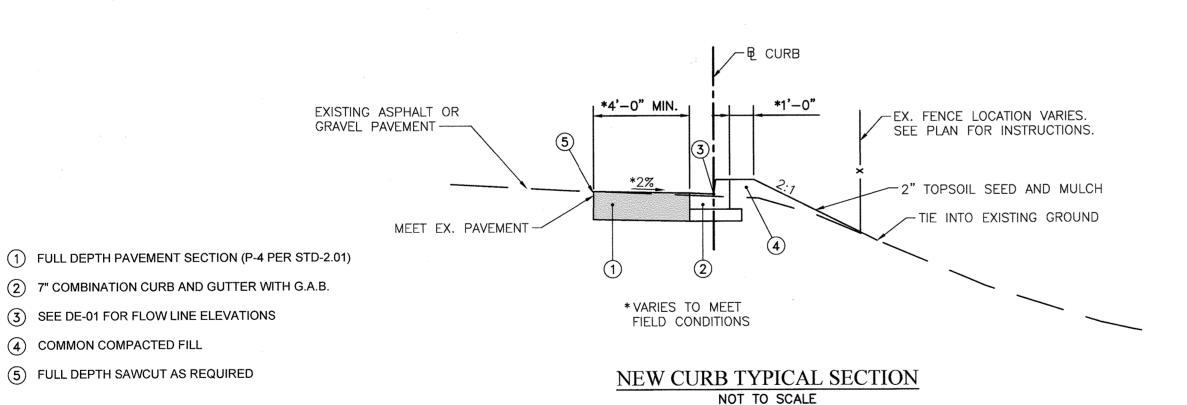
Rinker 031



Notes:

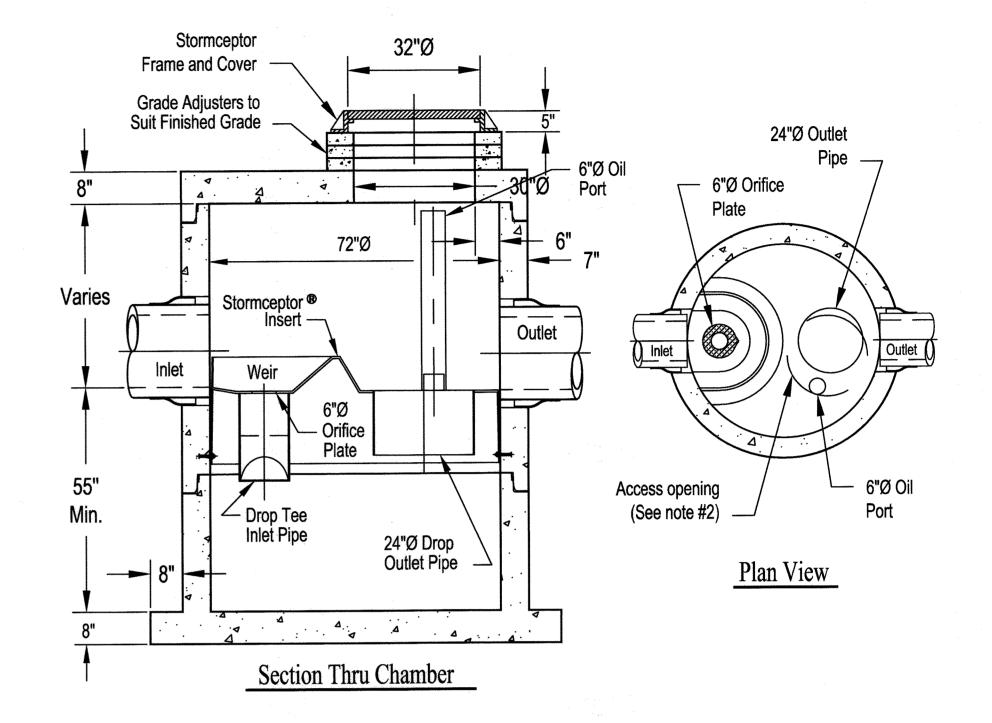
- 1. The Use Of Flexible Connection is Recommended at The Inlet and Outlet Where Applicable.
- 2. The Cover Should be Positioned Over The Inlet Drop Pipe and The Oil Port.
- 3. The Stormceptor System is protected by one or more of the following U.S. Patents: #4985148, #5498331, #5725760, #5753115, #5849181, #6068765, #6371690.
- 4. Contact a Concrete Pipe Division representative for further details not listed on this drawing. 5. For SC-1 and 2.

Rinker 027



PURPOSE:
THE PURPOSE OF THIS REDLINE IS TO ADD
STORMCEPTORS TO CAPTURE POTENTIAL
SPILLS CONTAINING CONTAMINANTS.

STC 900 Precast Concrete Stormceptor (900 U.S. Gallon Capacity)



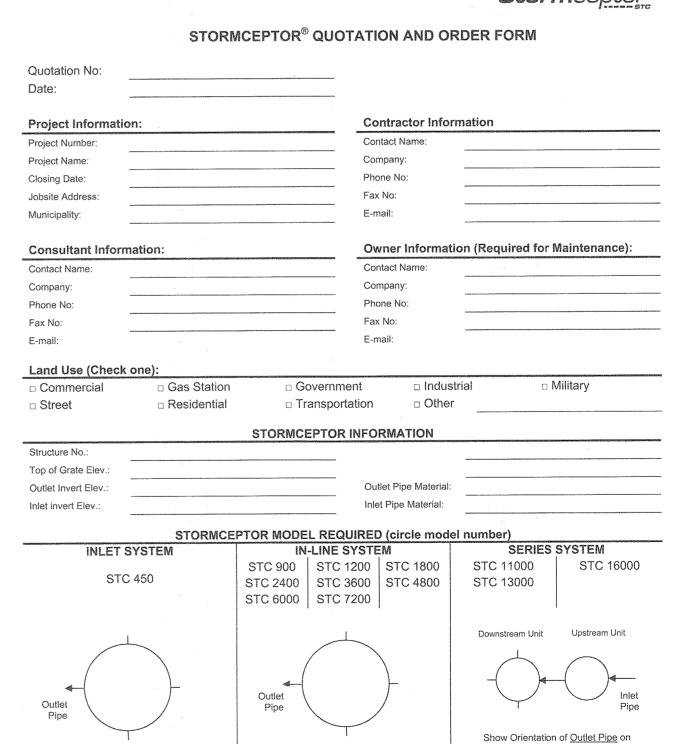
Notes:

- 1. The Use Of Flexible Connection is Recommended at The Inlet and Outlet Where Applicable.
- 2. The Cover Should be Positioned Over The Outlet Drop Pipe and The Oil Port.
- 3. The Stormceptor System is protected by one or more of the following U.S. Patents: #4985148, #5498331, #5725760, #5753115, #5849181, #6068765, #6371690.
- 4. Contact a Concrete Pipe Division representative for further details not listed on this drawing.

5. for SC-4, 5, 6 and 7.

Rinker (

Stormceptor*



Please complete the attached form and fax to your local Stormceptor representative

Show Orientation of Inlet Pipe

www.rinkerstormceptor.com

SDP SHT NO. 15 OF 16

APPROVED: DEPARTMENT OF PLANNING AND ZONING

CHIEF, DEVELOPMENT ENGINEERING DIVISION 1358

8.10.21 DATE 8/23/21

AECOM



						_
	DES: KMS					
	DRN:					
_	CHK:					
	/0004	DTM	1	NEW SHEET ADDED	07/2021	
	DATE: 07/2021	BY	NO.	REVISION	DATE	
10ED						

STORMCEPTOR DETAILS

SCALE MAP NO.

__ BLOCK NO.

Show Orientation of Inlet Pipe

REVISED SITE DEVELOPMENT PLAN

MAYFIELD HIGHWAY MAINTENANCE FACILITY

- STORMWATER MANAGEMENT

1ST ELECTION DISTRICT — HOWARD COUNTY, MARYLAND

SCALE

N/A

DWG NO.

C-06

