

GENERAL NOTES

1. SPECIFICATIONS: ALL WORK IS TO BE PERFORMED IN ACCORDANCE WITH MARYLAND STATE HIGHWAY ADMINISTRATIONS "SPECIFICATIONS FOR CONSTRUCTION AND MATERIALS" DATED JANUARY 2001, AND THE MOST RECENT REVISIONS THEREOF AND ADDITIONS THERETO.

THE GENERAL PROVISIONS FOR THIS PROJECT ARE THOSE INCLUDED IN THE "HARFORD COUNTY ROAD CODE" GENERAL PROVISIONS COUNTY FUNDED PROJECTS, SECTIONS 100-110.

2. UTILITIES: UTILITY LOCATIONS SHOWN ON THE PLANS ARE BASED ON LIMITED INFORMATION AVAILABLE. HOWEVER, IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THE ACCURACY OF THIS INFORMATION. THE COST OF REPAIR OR REPLACEMENT OF ANY SUCH FACILITIES DAMAGED BY THE CONTRACTOR'S OPERATIONS SHALL BE BORNE BY HIM.

3. UTILITY RELOCATIONS: UTILITY RELOCATIONS MADE NECESSARY BY THE HIGHWAY WORK WILL BE ACCOMPLISHED BY THE UTILITY OWNERS AT NO COST TO THE CONTRACTOR. WHEN SUCH WORK IS NECESSARY, THE CONTRACTOR SHALL NOTIFY APPROPRIATE PERSONNEL AS FOLLOWS:

CONTACT "MISS UTILITY" PHONE 1-800-257-7777, 48 HOURS IN ADVANCE FOR LOCATION OF ANY UTILITIES.

CONTACT BALTIMORE GAS & ELECTRIC CO. - PHONE NO. 1-410-291-3119, 48 HOURS IN ADVANCE OF BEGINNING ANY CONSTRUCTION.

4. STANDARD DETAILS: REFERENCE MADE TO STANDARDS ARE TAKEN FROM THE HARFORD COUNTY DEPARTMENT OF PUBLIC WORKS, BOOK OF STANDARD DETAILS DATED JUNE 2000, AND FROM STANDARD DETAILS FOR DESIGN AND CONSTRUCTION AND FROM "THE MARYLAND STATE HIGHWAY ADMINISTRATION'S BOOK OF STANDARDS-HIGHWAY AND INCIDENTAL STRUCTURES"; IT WILL BE THE CONTRACTOR'S RESPONSIBILITY THAT THE STANDARD DRAWINGS IN HIS POSSESSION ARE THE LATEST REVISED STANDARDS UP TO AND INCLUDING THE DATE OF THE ADVERTISEMENT OF THIS CONTRACT.

5. RIGHT-OF-WAY LINES: RIGHT-OF-WAY LINES SHOWN ON THESE PLANS DO NOT INCLUDE EASEMENTS. THEY ARE FOR ASSISTANCE IN INTERPRETING THE PLANS ONLY. THESE LINES DO NOT REPRESENT THE OFFICIAL PROPERTY ACQUISITION LINES. FOR OFFICIAL FEE RIGHT-OF-WAY AND EASEMENT INFORMATION, SEE THE APPROPRIATE RIGHT-OF-WAY PLATS.

6. SOIL CONSERVATION: THE CONTRACTOR SHALL TAKE EXTREME CAUTION NOT TO DISTURB THE EXISTING VEGETATION OUTSIDE THE LIMITS OF CONSTRUCTION. STOCKPILING AND STAGING WILL NOT BE ALLOWED ON SITE. THE CONTRACTOR MUST SECURE AN OFF-SITE AREA AND ANY NECESSARY PERMITS. SOIL STABILIZATION WILL CONFORM TO 1994 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL. THE CONTRACTOR WILL OBTAIN APPROVAL OF THE HARFORD COUNTY SOIL CONSERVATION DISTRICT FOR HIS PLANS IN CONTROLLING SEDIMENT EROSION FOR THE BORROW AREA AND DISPOSING OF ANY WASTE EXCAVATION.

7. EXISTING MAILBOXES AND EXISTING SIGNS: ALL EXISTING MAILBOXES, SIGNS AND PAPER BOXES DISTURBED DURING CONSTRUCTION SHALL BE TEMPORARILY RESET IMMEDIATELY AND PERMANENTLY RESET AS DIRECTED BY THE ENGINEER. THIS WORK WILL BE INCIDENTAL TO ALL OTHER ITEMS IN THE CONTRACT.

8. NEW INLETS SHALL BE BACKFILLED WITH NO. 57 AGGREGATE FOR A WIDTH OF 1.5 FEET OUTSIDE PERIMETER OF STRUCTURE AS PER SECTION 305 OF THE HARFORD COUNTY ROAD CODE.

9. SURVEYS: PRIMARY CONTROLS COORDINATES SHOWN HEREON ARE REFERRED TO THE MARYLAND COORDINATE SYSTEM (NAD 83/1991) AND ARE BASED ON THE FOLLOWING HARFORD COUNTY SURVEY CONTROL MONUMENTS:  
NORRIS: N 740,931.33 E 1,443,828.10

ELEVATIONS SHOWN HEREON ARE REFERRED TO THE 1988 (NAVD 88) WITH LOCAL REFERENCE TO THE FOLLOWING HARFORD COUNTY SURVEY CONTROL MONUMENT:  
NORRIS: ELEV 715.35'

10. HARFORD COUNTY REQUIRES ALL INLETS TO BE BICYCLE SAFE CONSTRUCTION. GRATES SHALL BE APPROVED BY HARFORD COUNTY DEPARTMENT OF PUBLIC WORKS.

11. NEW CONSTRUCTION PAVING JOINTS SHAA NOT END UP IN WHEEL PATHS.

12. THE FOLLOWING SHA STANDARDS (CONSTRUCTION AND TEMPORARY TRAFFIC CONTROL) ARE REQUIRED FOR THIS PROJECT:  
A) MD 620.02 - SHA TYPE 'A' CURB AND GUTTER  
B) MD 655.12 - SIDEWALK RAMPS PARALLEL  
C) MD 104.02-02 - FOR MAINTENANCE OF TRAFFIC

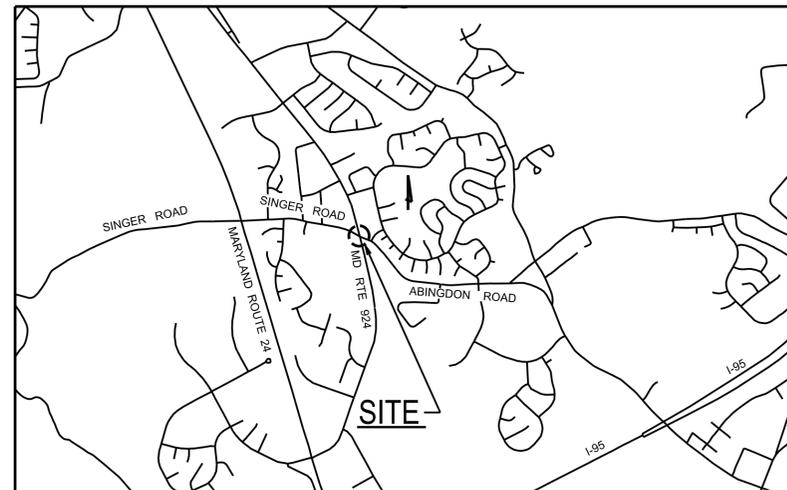
FOR ALL STANDARDS REFER TO ON THE PLANS THE CONTRACTOR MUST GO TO THE SHA BOOK OF STANDARDS WHICH WILL HAVE THE CURRENT VERSION. THE BOOK OF STANDARDS CAN BE ACCESSED AT:  
<http://apps.roads.maryland.gov/BusinessWithSHA/bizStdsSpecs/desManualStdPub/publicationsonline/ohd/bookstd/index.asp>

ALL ITEMS ARE TO BE CONSTRUCTED IN ACCORDANCE WITH THE CURRENT VERSION OF THE REFERENCED STANDARD AT THE TIME OF CONSTRUCTION.

# HARFORD COUNTY, MARYLAND

## DEPARTMENT OF PUBLIC WORKS BID NO. 16-061

### SINGER ROAD AT MD RT 924 INTERSECTION IMPROVEMENTS EAST BELCREST DRAINAGE IMPROVEMENTS EAST HEATHER DRAINAGE IMPROVEMENTS



LOCATION MAP - SINGER AT 924

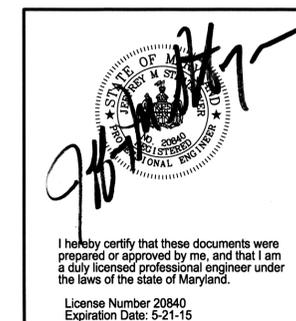
SCALE 1" = 2000'

#### INDEX OF SHEETS

1. TITLE SHEET
2. PLAN AND DETAILS (SINGER AT 924)
3. STRIPING PLAN AND DETAILS (SINGER AT 924)
4. DETAILS (SINGER AT 924)
5. DRAINAGE IMPROVEMENTS (E. HEATHER)
6. DRAINAGE IMPROVEMENTS (E. BELCREST)

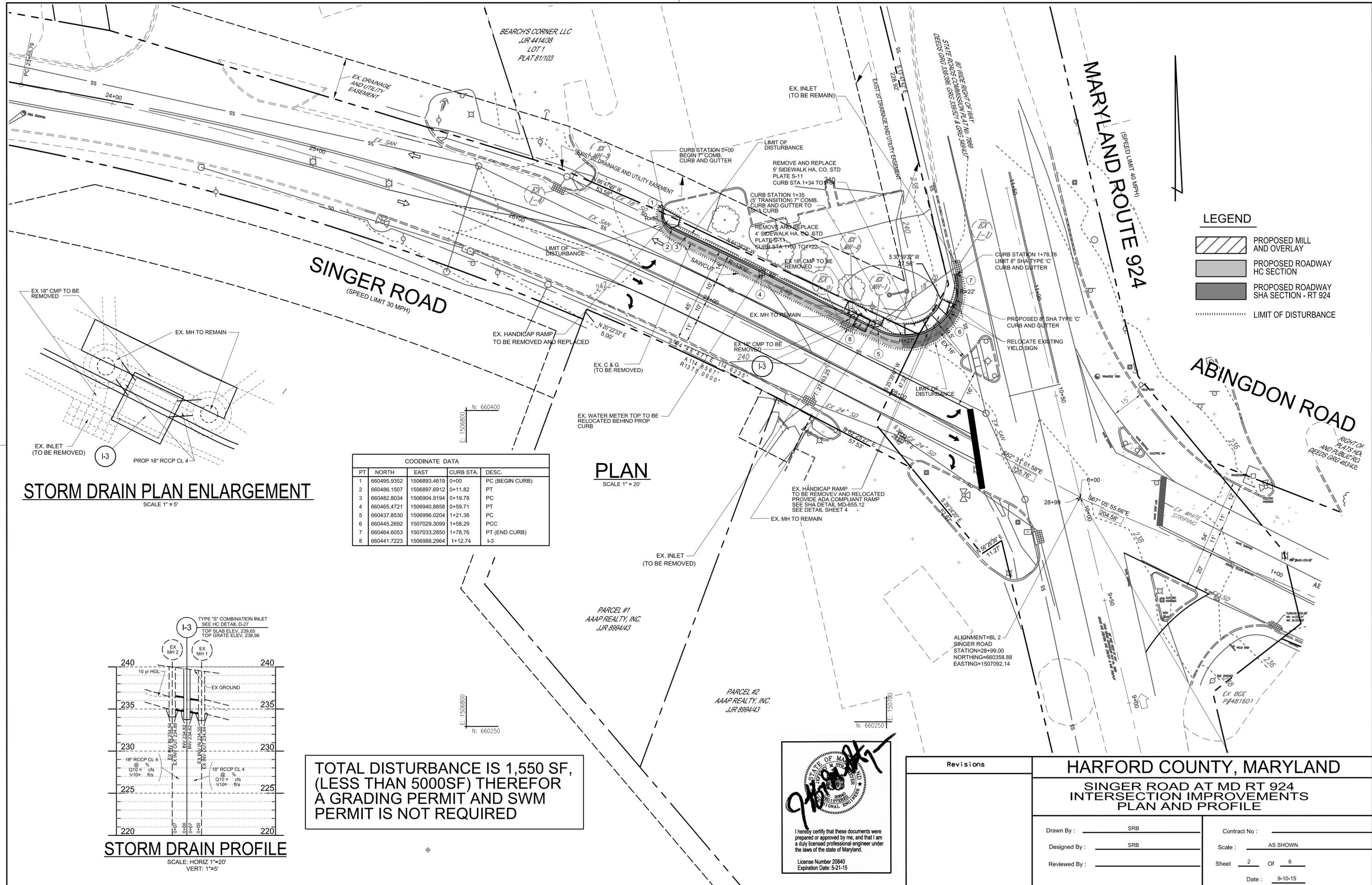
Owner:  
HARFORD COUNTY GOVERNMENT  
HARFORD COUNTY MARYLAND  
220 South Main Street  
Bel Air, Maryland  
Contact Person: Rick Bates  
Phone No. 410-638-3509

Prepared By :  
DEPARTMENT OF PUBLIC WORKS  
HARFORD COUNTY MARYLAND  
212 South Bond Street  
Bel Air, Maryland  
Phone No. 410-638-3509



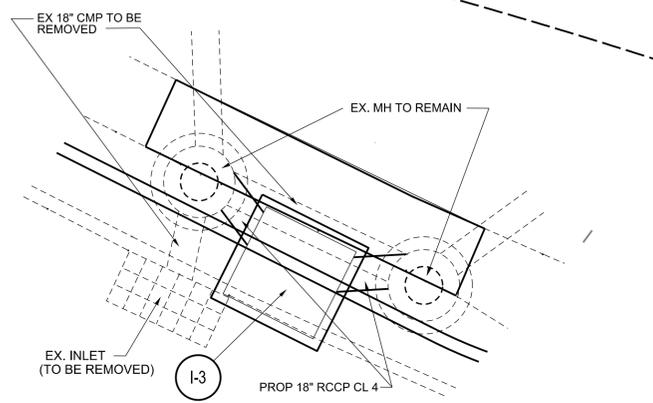
I hereby certify that these documents were prepared or approved by me, and that I am a duly licensed professional engineer under the laws of the state of Maryland.  
License Number 20840  
Expiration Date: 5-21-15

CAPITAL PROJECT APPROVALS	
REVIEWED AND APPROVAL RECOMMENDED:	
<i>[Signature]</i>	
PROJECT ENGINEER	
APPROVAL RECOMMENDED:	
<i>[Signature]</i> 9-11-15	
DEPT ENGINEER	
APPROVED:	
<i>[Signature]</i> 9-22-15	
DIRECTOR OF PUBLIC WORKS	



**LEGEND**

- PROPOSED MILL AND OVERLAY
- PROPOSED ROADWAY HC SECTION
- PROPOSED ROADWAY SHA SECTION - RT 924
- LIMIT OF DISTURBANCE

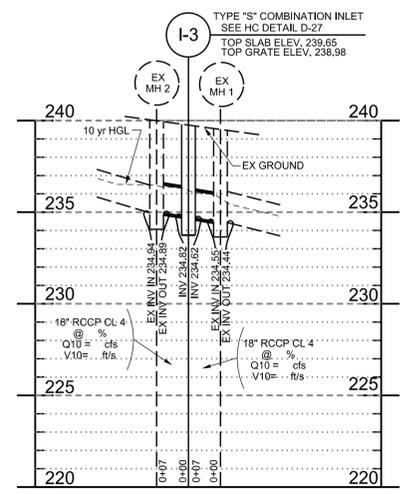


**STORM DRAIN PLAN ENLARGEMENT**  
SCALE 1" = 5'

**COORDINATE DATA**

PT	NORTH	EAST	CURB STA.	DESC.
1	660495.9352	1506893.4619	0+00	PC (BEGIN CURB)
2	660486.1507	1506897.6912	0+11.82	PT
3	660482.8034	1506904.9194	0+19.78	PC
4	660465.4721	1506940.8858	0+59.71	PT
5	660437.8530	1506996.0204	1+21.38	PC
6	660445.2692	1507029.3099	1+58.29	PCC
7	660464.6053	1507033.2850	1+78.76	PT (END CURB)
8	660441.7223	1506988.2964	1+12.74	I-3

**PLAN**  
SCALE 1" = 20'



**STORM DRAIN PROFILE**  
SCALE: HORIZ 1"=20'  
VERT: 1"=5'

**TOTAL DISTURBANCE IS 1,550 SF,  
(LESS THAN 5000SF) THEREFOR  
A GRADING PERMIT AND SWM  
PERMIT IS NOT REQUIRED**

**9/15/15**

STATE OF MARYLAND  
DEPARTMENT OF TRANSPORTATION  
DIVISION OF HIGHWAYS  
I hereby certify that these documents were prepared or approved by me, and that I am a duly licensed professional engineer under the laws of the state of Maryland.  
License Number 20840  
Expiration Date: 5-21-15

**Revisions**

No.	Description

**HARFORD COUNTY, MARYLAND**

**SINGER ROAD AT MD RT 924  
INTERSECTION IMPROVEMENTS  
PLAN AND PROFILE**

Drawn By: SRB

Designed By: SRB

Reviewed By: \_\_\_\_\_

Contract No.: \_\_\_\_\_

Scale: AS SHOWN

Sheet 2 Of 6

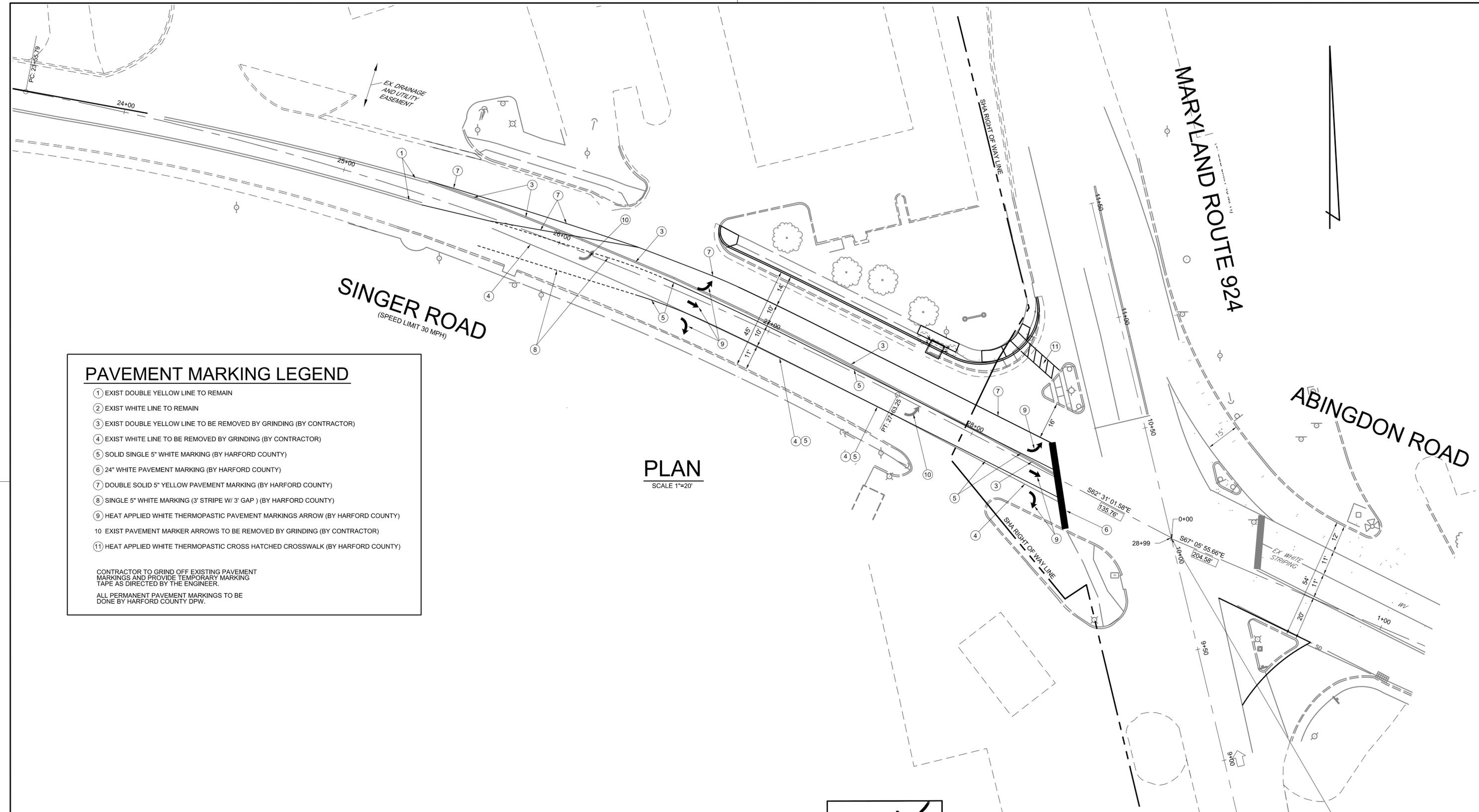
Date: 9-10-15

ADC MAP :

TAX MAP :

HCG BILLING ID No.:

HCG DWG ID No.:

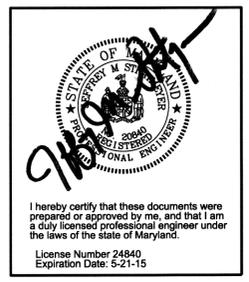


**PAVEMENT MARKING LEGEND**

- ① EXIST DOUBLE YELLOW LINE TO REMAIN
- ② EXIST WHITE LINE TO REMAIN
- ③ EXIST DOUBLE YELLOW LINE TO BE REMOVED BY GRINDING (BY CONTRACTOR)
- ④ EXIST WHITE LINE TO BE REMOVED BY GRINDING (BY CONTRACTOR)
- ⑤ SOLID SINGLE 5" WHITE MARKING (BY HARFORD COUNTY)
- ⑥ 24" WHITE PAVEMENT MARKING (BY HARFORD COUNTY)
- ⑦ DOUBLE SOLID 5" YELLOW PAVEMENT MARKING (BY HARFORD COUNTY)
- ⑧ SINGLE 5" WHITE MARKING (3" STRIPE W/ 3" GAP) (BY HARFORD COUNTY)
- ⑨ HEAT APPLIED WHITE THERMOPASTIC PAVEMENT MARKINGS ARROW (BY HARFORD COUNTY)
- ⑩ EXIST PAVEMENT MARKER ARROWS TO BE REMOVED BY GRINDING (BY CONTRACTOR)
- ⑪ HEAT APPLIED WHITE THERMOPASTIC CROSS HATCHED CROSSWALK (BY HARFORD COUNTY)

CONTRACTOR TO GRIND OFF EXISTING PAVEMENT MARKINGS AND PROVIDE TEMPORARY MARKING TAPE AS DIRECTED BY THE ENGINEER.  
 ALL PERMANENT PAVEMENT MARKINGS TO BE DONE BY HARFORD COUNTY DPW.

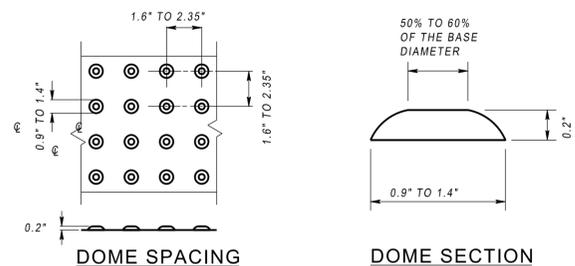
**PLAN**  
 SCALE 1"=20'



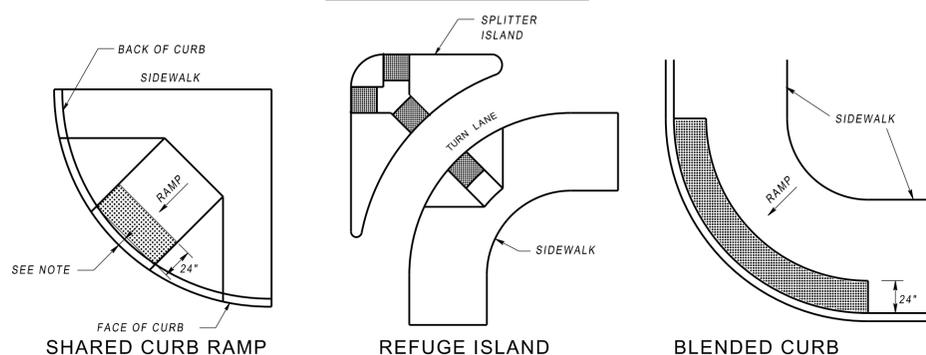
Revisions   	<b>HARFORD COUNTY, MARYLAND</b>	
	<b>SINGER ROAD AT MD RT 924 INTERSECTION IMPROVEMENTS STRIPPING PLAN AND DETAILS</b>	
	Drawn By : <u>SRB</u> Designed By : <u>SRB</u> Reviewed By : _____	Contract No : _____ Scale : <u>AS SHOWN</u> Sheet <u>3</u> Of <u>6</u> Date : <u>9-10-14</u>

**MAT DETAILS**

SEE PLACEMENT GUIDELINES BELOW



**PLACEMENT GUIDELINES**

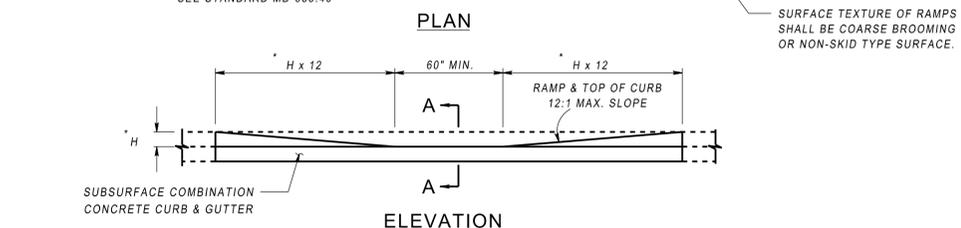
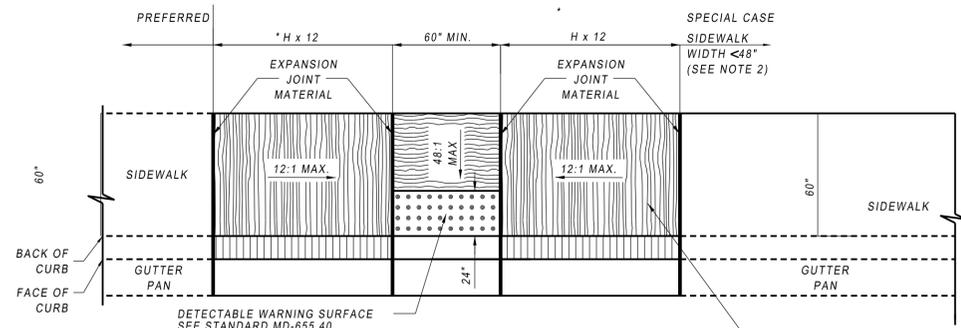


WHERE ISLANDS OR MEDIANS ARE LESS THAN 6 FEET WIDE, THE DETECTABLE WARNING SHOULD EXTEND ACROSS THE FULL LENGTH OF THE CUT THROUGH THE ISLAND OR MEDIAN

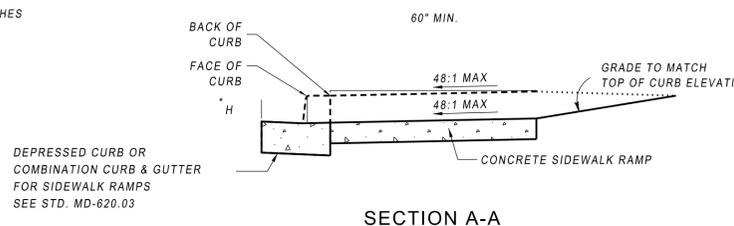
**NOTES**

1. THE DETECTABLE WARNING SURFACE SHALL BE LOCATED SO THAT THE EDGE NEAREST THE CURB LINE IS 6 TO 8 INCHES FROM THE FACE OF CURB.
2. FOR SKEWED APPLICATIONS DETECTABLE WARNING SHALL BE PLACED SUCH THAT THE DOMES CLOSEST TO THE BACK OF CURB ARE NO LESS THAN 0.5' AND NO MORE THAN 3.0' FROM THE BACK OF CURB. TRUNCATED DOME SURFACES SHALL BE FABRICATED TO PROVIDE FULL DOMES ONLY.
3. DETECTABLE WARNING SURFACES ARE REQUIRED AT STREET CROSSING & SIGNALIZED INTERSECTIONS.

**BRICK DETECTABLE WARNING SURFACES MD 655.40**



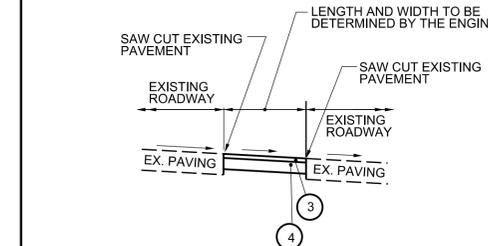
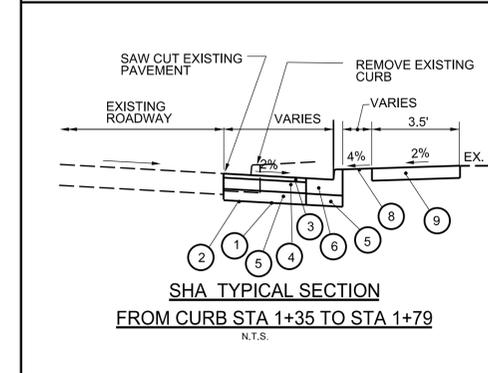
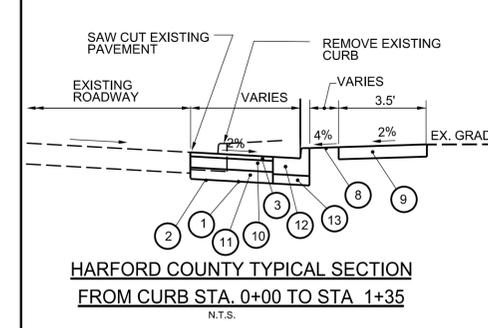
\* - H = HEIGHT OF CURB ALL MEASUREMENTS IN INCHES



**NOTES**

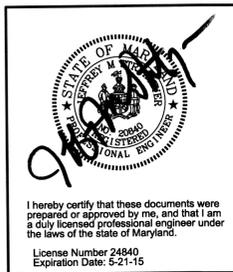
1. TO BE USED WHERE SIDEWALK IS ADJACENT TO THE CURB. THIS STANDARD MAY BE MODIFIED TO SUIT A PARTICULAR LOCATION.
2. WHERE 60" SIDEWALK CAN NOT BE PROVIDED, A DESIGN WAIVER MUST BE REQUESTED.
3. NO TRAVERSABLE SLOPE ON THE RAMP OR SIDEWALK SHALL EXCEED 12:1 IN THE DIRECTION OF PEDESTRIAN TRAVEL, OR 48:1 PERPENDICULAR TO THE DIRECTION OF PEDESTRIAN TRAVEL. THE CROSS-SLOPE OF THE LANDING AREA CANNOT EXCEED GRADE OF ROADWAY.
4. EXPANSION JOINT MATERIAL SHALL BE INSTALLED IN ACCORDANCE WITH STD. MD-655.01.
5. SIDEWALK RAMPS TO BE SHOWN ON PLANS SYMBOLICALLY AND REFERENCED WITH THE CENTER OF THE RAMP ALIGNED TO A STATION ON THE CONSTRUCTION CENTERLINE. SEPARATE DETAILS SHALL BE SHOWN WHERE PROPOSED RAMP VARIES FROM STANDARD CASES.
6. TRANSITION PANELS TO TIE INTO EXISTING SIDEWALK MUST BE A MINIMUM OF 5' IN LENGTH

**SIDEWALK RAMPS PARALLEL MD 655.12**

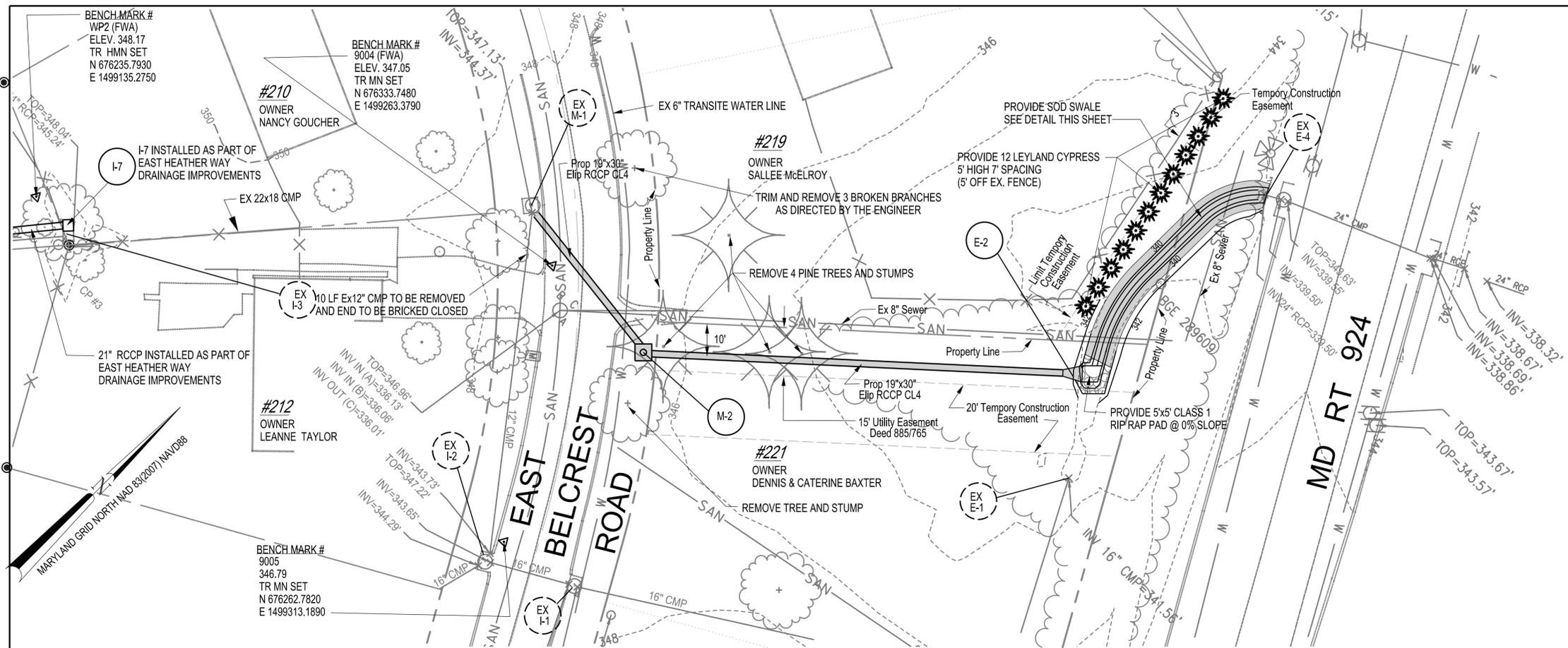


**SHA PATCHING DETAIL TO ADDRESS ANY PAVEMENT DISTRESSES INDUCED DURING CONSTRUCTION**

- 1 TOP OF SUBGRADE
- 2 LIMIT OF CLASS 1 EXCAVATION
- 3 2" HOT MIX ASPHALT SURFACE SUPERPAVE 12.5MM PG 64-22 LEVEL 2
- 4 6" HOT MIX ASPHALT BASE SUPERPAVE 19MM PG 64-22 (2-3" LIFTS) LEVEL 2
- 5 12" BASE COURSE USING GRADED AGGREGATE BASE (2-6" LIFTS)
- 6 SHA TYPE 'A' COMBINATION CURB & GUTTER
- 7 5-1/2" BASE COURSE USING GRADED AGGREGATE BASE
- 8 2" TOPSOIL SEED & MULCH
- 9 4" CONC SIDEWALK WITH 3" CRUSHED STONE BASE (SEE HC DETAIL S-11)
- 10 3" HOT MIX ASPHALT BASE SUPERPAVE 19MM PG 64-22 (2-3" LIFTS) LEVEL 2
- 11 8" BASE COURSE USING GRADED AGGREGATE BASE (2-4" LIFTS)
- 12 HC 7" COMBINATION CURB & GUTTER (SEE HC DETAIL S-1)
- 13 5" BASE COURSE USING GRADED AGGREGATE BASE

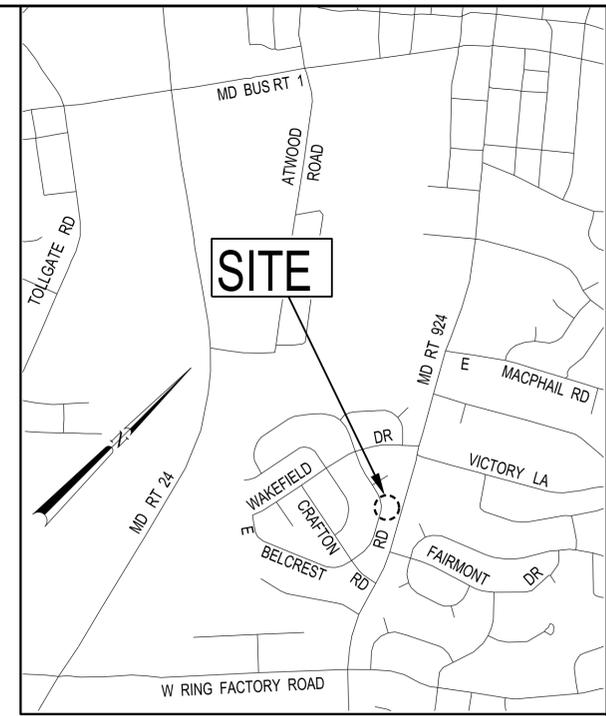


Revisions		HARFORD COUNTY, MARYLAND	
		<b>SINGER ROAD AT MD RT 924 INTERSECTION IMPROVEMENTS DETAILS</b>	
Drawn By :	SRB	Contract No. :	
Designed By :	SRB	Scale :	AS SHOWN
Reviewed By :		Sheet	4 Of 6
		Date :	9-10-14

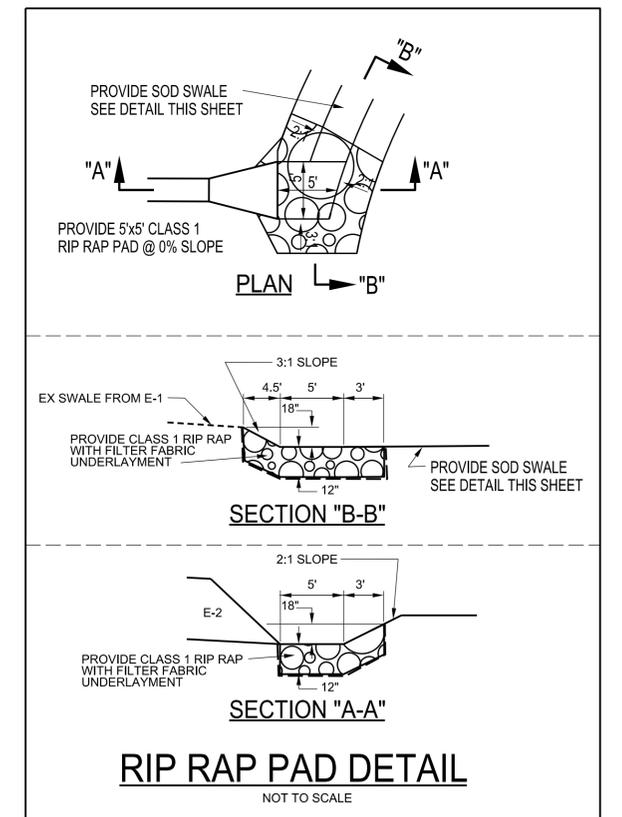


**PLAN**  
SCALE: 1" = 20'

**TOTAL DISTURBANCE IS LESS THAN 5000 SF,  
GRADING PERMIT IS NOT REQUIRED**

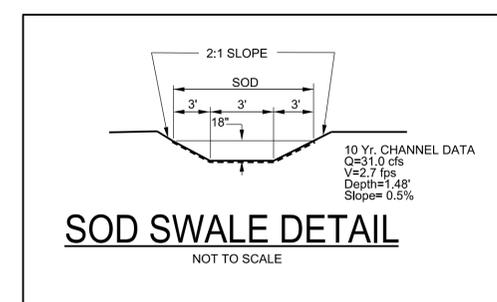


**LOCATION MAP**  
SCALE: 1" = 1000'

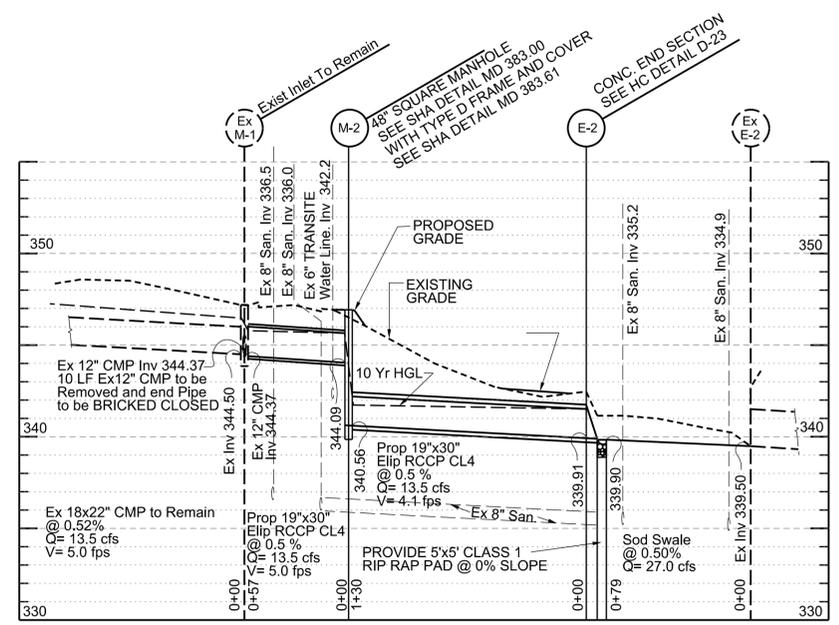


**RIP RAP PAD DETAIL**  
NOT TO SCALE

**8 CY TO BE REMOVED  
WITHIN SHA RIGHT OF WAY**



**SOD SWALE DETAIL**  
NOT TO SCALE



**STORM DRAIN PROFILE**  
SCALE: HORIZ. 1" = 50'  
VERT. 1" = 5'

<b>Revisions</b>		<b>HARFORD COUNTY, MARYLAND</b>	
<b>East Belcrest Road DRAINAGE IMPROVEMENT PLAN</b>		<b>Contract No : _____</b>	
Drawn By : _____	SRB	Scale : _____	AS SHOWN
Designed By : _____	SRB	Sheet <u>5</u> Of <u>6</u>	Date : 9-9-2015
Reviewed By : _____			

ADC MAP : TAX MAP : HCC BILLING ID No. : HCC DWG ID No. : SCALE: 1" = 20'

