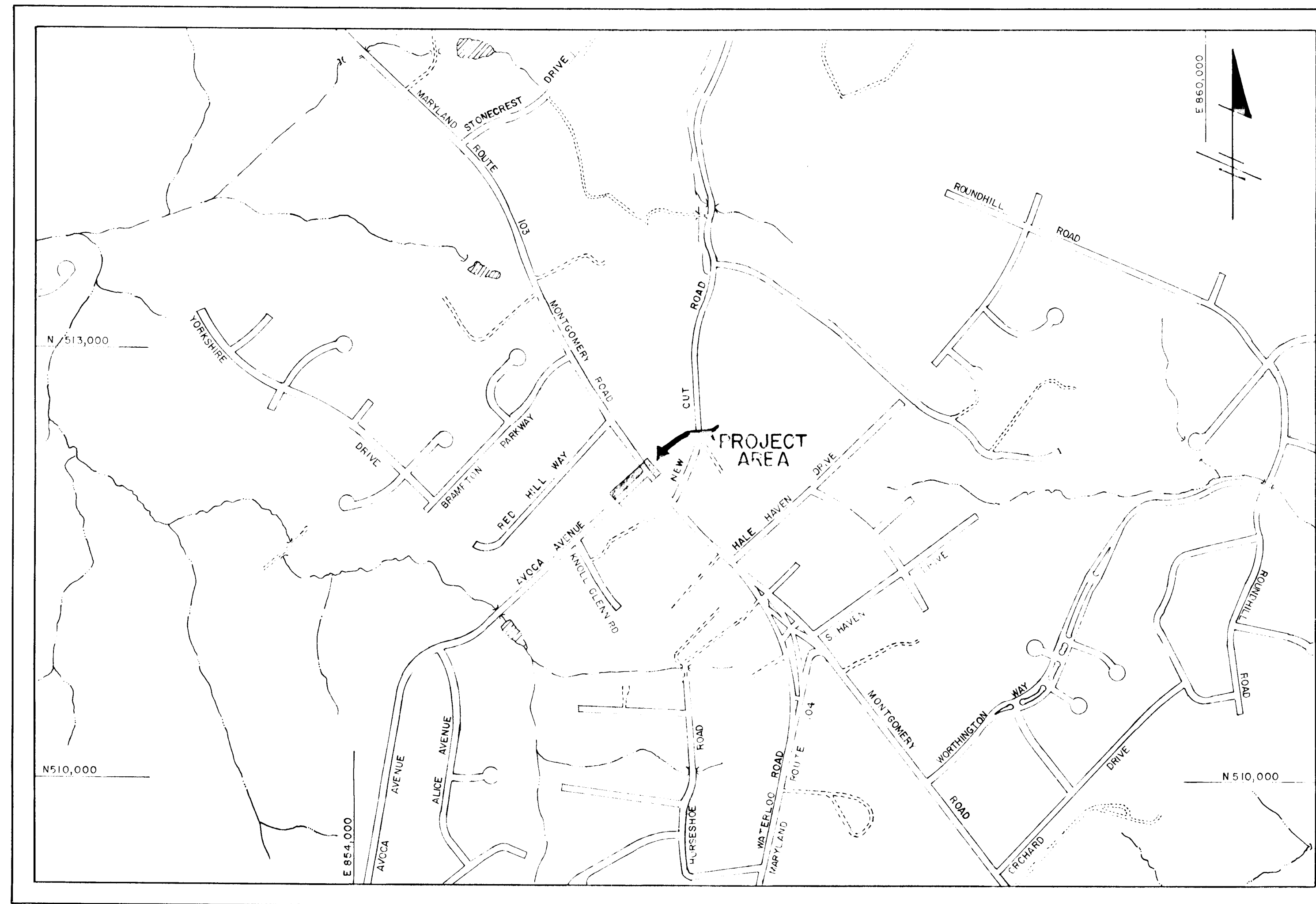


GENERAL NOTES

1. THE EXISTING UTILITIES AND OBSTRUCTIONS SHOWN ON THE PLANS ARE FROM THE BEST AVAILABLE RECORDS AND SHALL BE VERIFIED BY THE CONTRACTOR TO HIS OWN SATISFACTION BEFORE STARTING CONSTRUCTION. NEITHER THE ENGINEER NOR THE HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS WARRANT OR GUARANTEE THE COMPLETENESS OR CORRECTNESS OF THE INFORMATION SHOWN.
2. THE CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS TO PROTECT EXISTING UTILITIES. ANY DAMAGE INCURRED SHALL BE REPAIRED IMMEDIATELY TO THE SATISFACTION OF THE ENGINEER BY THE CONTRACTOR AT THE CONTRACTOR'S EXPENSE.
3. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE RESTORATION OF ALL DRIVEWAYS DAMAGED AS A RESULT OF HIS CONSTRUCTION ACTIVITIES.
4. TREES, SHRUBS AND BUSHES ARE TO BE PROTECTED TO THE MAXIMUM EXTENT POSSIBLE. TREES, SHRUBS, BUSHES, MAILBOXES, FENCES AND ROADWAY SIGNS WHICH INTERFERE WITH ROADWAY INSTALLATION AND RELATED GRADING ACTIVITIES SHALL BE RELOCATED AS DIRECTED BY THE ENGINEER. NO SEPARATE MEASUREMENT OR PAYMENT WILL BE MADE FOR THIS WORK.
5. PLACE REGULATION "MEN WORKING" AND WARNING SIGNS AS REQUIRED TO COMPLY WITH MARYLAND STATE HIGHWAY ADMINISTRATION MANUAL OF TRAFFIC CONTROL FOR HIGHWAY CONSTRUCTION AND MAINTENANCE OPERATIONS.
6. PERFORMANCE OF WORK SHALL CONFORM TO THE HOWARD COUNTY DESIGN MANUAL VOLUME IV, STANDARD SPECIFICATIONS AND DETAILS FOR CONSTRUCTION, WHERE SPECIFIED IN THE PLANS OR STIPULATED IN THE SPECIFICATIONS. THE WORK SHALL CONFORM TO THE STATE HIGHWAY ADMINISTRATION BOOK TITLED "SPECIFICATIONS FOR MATERIALS, HIGHWAYS AND INCIDENTAL STRUCTURES".
7. REFERENCE MADE TO STANDARD DRAWINGS REFER TO THE STANDARDS BOUND IN THE HOWARD COUNTY DESIGN MANUAL, VOLUME IV, STANDARD SPECIFICATIONS AND DETAILS FOR CONSTRUCTION, UNLESS OTHERWISE SPECIFIED. IT WILL BE THE CONTRACTOR'S RESPONSIBILITY THAT THE STANDARD DETAILS IN HIS POSSESSION ARE LATEST REVISED STANDARDS UP TO THE DATE OF THE ADVERTISEMENT OF THIS CONTRACT.
8. ALL HORIZONTAL CONTROLS AND COORDINATES SHOWN ARE BASED ON THE MARYLAND STATE COORDINATE SYSTEM.
9. ONLY THOSE BENCH MARKS SHOWN ON THE PLAN INDICATED BY THE SYMBOL SHALL BE USED FOR CONSTRUCTION.
10. STOPPING SIGHT DISTANCE FOR VERTICAL CREST CURVES SHOWN AS (C.S.D. 400) ON PLANS IS BASED ON HEIGHT OF EYE BEING 5.0 FEET ABOVE THE ROAD SURFACE, SIGHTING AN OBJECT 6 INCHES HIGH.
11. ALL LAWNS DISTURBED BY CONSTRUCTION SHALL BE SODDED. ALL OTHERS SHALL BE REPAIRED BY TOPSOIL, SEEDING, AND MULCHING.
12. THE CONTRACTOR SHALL TAKE ALL PRECAUTIONS SO AS NOT TO DISTURB THE EXISTING VEGETATION OUTSIDE THE LIMITS OF CONSTRUCTION. SOIL STABILIZATION WILL CONFORM TO U.S.D.A. SOIL CONSERVATION SERVICE STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL IN DEVELOPING AREAS.
13. THE CONTRACTOR SHALL SUBMIT HIS SCHEDULE OF CONSTRUCTION AND PLAN FOR MAINTENANCE OF TRAFFIC TO HOWARD COUNTY BEFORE GRADING OR EXCAVATING OPERATIONS ARE INITIATED. THESE CONSTRUCTION AND TRAFFIC MAINTENANCE SCHEDULES SHALL BE DEVELOPED SO AS TO MAINTAIN TWO (2) LANES OF TRAFFIC AT ALL TIMES. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ESTABLISHING AND MAINTAINING ALL TRAFFIC CONTROL DEVICES AND SIGNS.
14. THE CONTRACTOR SHALL NOTIFY THE FOLLOWING AGENCIES AT LEAST THREE (3) DAYS PRIOR TO BEGINNING CONSTRUCTION OF THIS PROJECT.
 HOWARD COUNTY FIRE DEPARTMENT 992-2311
 HOWARD COUNTY POLICE DEPARTMENT 992-2222
 MISS UTILITY 559-6100
 STATE HIGHWAY ADMINISTRATION 531-5533
 CHESAPEAKE & POTOMAC TELEPHONE COMPANY 795-1390
15. THE CONTRACTOR SHALL NOTIFY THE HOWARD COUNTY DIVISION OF TRAFFIC FORTY-EIGHT (48) HOURS PRIOR TO BEGINNING THE ACTUAL INSTALLATION OF PAVEMENT MARKINGS AND/OR STRIPES.



VICINITY MAP
SCALE: 1"=600'

ENGINEER'S CERTIFICATE

I HEREBY CERTIFY THAT THIS PLAN FOR EROSION AND SEDIMENT CONTROL REPRESENTS A PRACTICAL AND WORKABLE PLAN BASED ON MY PERSONAL KNOWLEDGE OF THE SITE CONDITIONS AND THAT IT WAS PREPARED IN ACCORDANCE WITH THE REQUIREMENTS OF THE HOWARD SOIL CONSERVATION DISTRICT.

SIGNATURE OF ENGINEER _____ DATE _____

DEVELOPER'S CERTIFICATE

I/WE CERTIFY THAT ALL DEVELOPMENT AND CONSTRUCTION WILL BE DONE ACCORDING TO THIS PLAN OF DEVELOPMENT AND PLAN FOR EROSION AND SEDIMENT CONTROL AND THAT ALL RESPONSIBLE PERSONNEL INVOLVED IN THE CONSTRUCTION PROJECT WILL HAVE A CERTIFICATE OF ATTENDANCE AT A DEPARTMENT OF NATURAL RESOURCES APPROVED TRAINING PROGRAM FOR THE CONTROL OF SEDIMENT AND EROSION BEFORE BEGINNING THE PROJECT. I ALSO AUTHORIZE PERIODIC ONSITE INSPECTION BY THE HOWARD SOIL CONSERVATION DISTRICT OR THEIR AUTHORIZED AGENTS, AS ARE DEEMED NECESSARY.

SIGNATURE OF DEVELOPER _____ DATE _____

ROADWAY IMPROVEMENTS

AVOCA AVENUE AT MARYLAND ROUTE 103

CAPITAL PROJECT T-7032

HOWARD COUNTY, MARYLAND

DEPARTMENT OF PUBLIC WORKS

SEDIMENT CONTROL MEASURES FOR THIS CONTRACT WILL BE IMPLEMENTED IN ACCORDANCE WITH DIVISION III OF VOLUME IV OF THE HOWARD COUNTY DESIGN MANUAL AND THE STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL. THIS PLAN IS APPROVED FOR EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT.

HOWARD SOIL CONSERVATION DISTRICT _____ DATE _____

REVIEWED FOR HOWARD COUNTY SOIL CONSERVATION DISTRICT AND MEETS TECHNICAL REQUIREMENTS

U.S. SOIL CONSERVATION SERVICE _____ DATE _____

DEPARTMENT OF PUBLIC WORKS
HOWARD COUNTY, MARYLAND

DIRECTOR OF PUBLIC WORKS _____ DATE _____

CHIEF, BUREAU OF ENGINEERING _____ DATE _____

CHIEF, ROADS, BRIDGE & STORM DRAINAGE DIVISION _____ DATE _____

FISHER, COLLINS & CARTER
CONSULTING ENGINEERS AND LAND SURVEYORS
2388 COLLETT AVENUE
ELLCOTT CITY, MARYLAND 21043

DESIGNER					
DRN: B.S.					
CHK: T.A.F.					
DATE:	BY:	NO.	REVISION	DATE	

TITLE SHEET

600' SCALE MAP NO. 31 BLOCK NO. _____

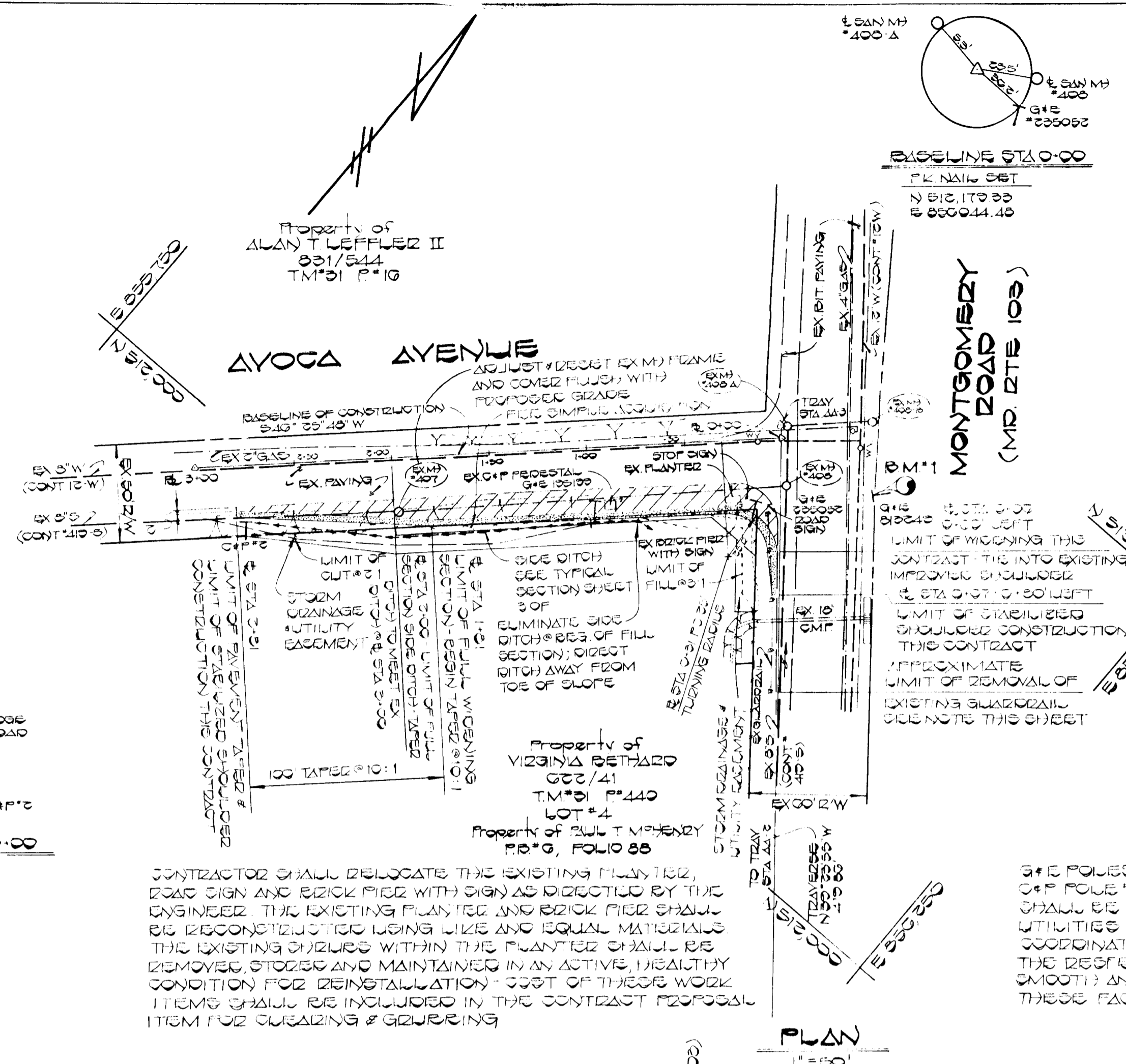
ROADWAY IMPROVEMENTS
AVOCA AVENUE AT MARYLAND ROUTE 103
CAPITAL PROJECT NO. T-7032
SECOND ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

SCALE AS SHOWN
SHEET 1 OF 3

C280AZ01

BENCH MARK
 B.M. #1 ELEV. 476.00

R.R. SPIKE SET IN G+6
 POLE #13243, NORTH SIDE
 MONTGOMERY ROAD OPPOSITE
 AVOCA AVENUE

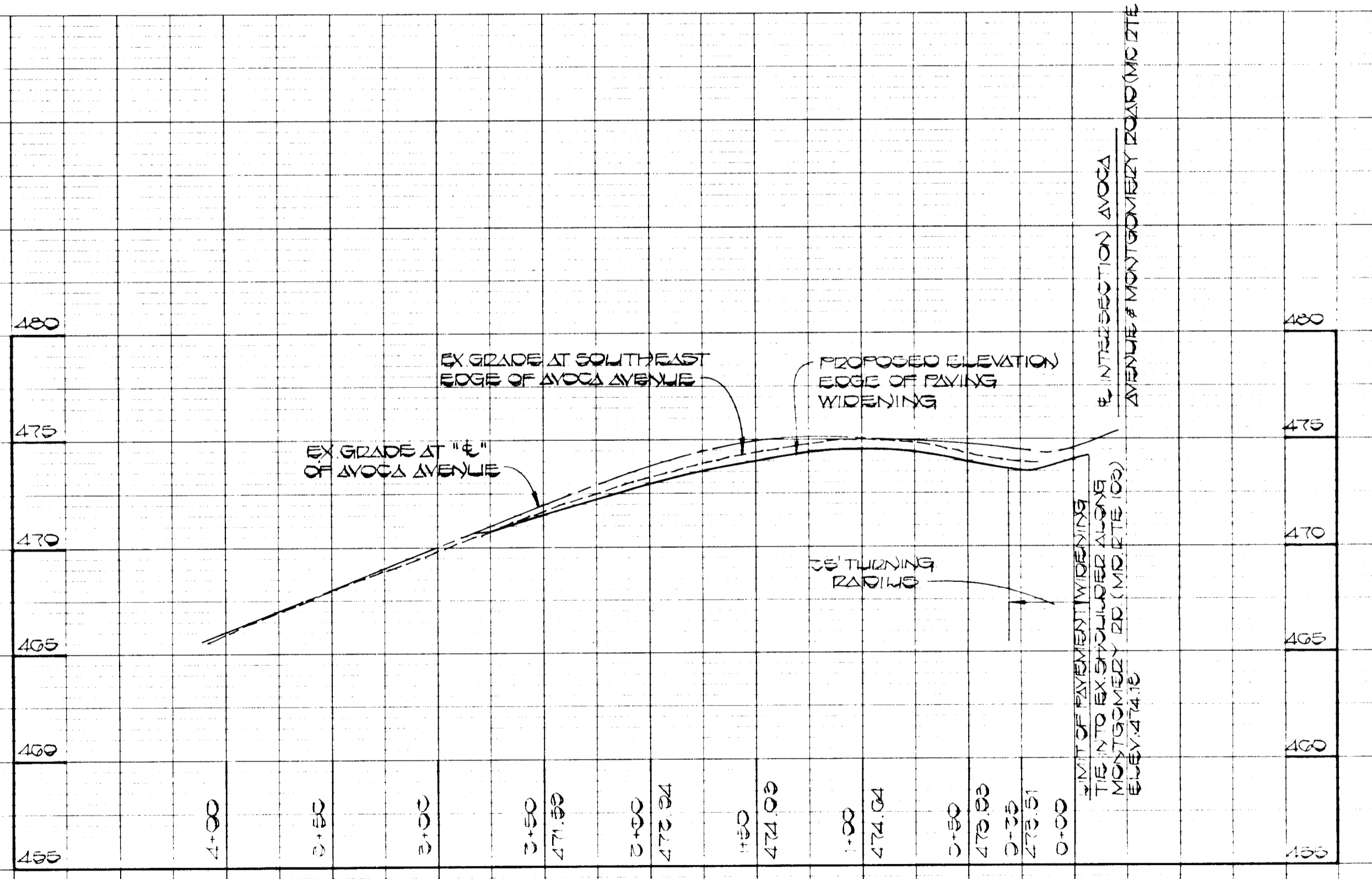


NOTE GUARDRAIL RELOCATION
 THE CONTRACTOR SHALL REMOVE APPROXIMATELY 90 FEET OF EXISTING GUARDRAIL ALONG MONTGOMERY ROAD BEGINNING AT THE LIMIT OF REMOVAL. THE CONTRACTOR SHALL REINSTALL APPROXIMATELY 70 FEET OF GUARDRAIL AS SHOWN IN THE PLAN ON SHEET 3 OF 3. COSTS OF REMOVAL AND REINSTALLATION OF THE GUARDRAIL SHALL BE INDICATED TO AND INCLUDED IN THE PRICE BID FOR THIS PAY ITEM OF THE PROPOSAL.

- SEE SHEET 3 OF 3 FOR:**
1. TYPICAL ROADWAY WIDENING SECTION
 2. TYPICAL PAVING SECTION
 3. MAIN TRIANGLE OF TRAFFIC PLAN, NOTICES AND DETAILS
 4. EROSION AND SEDIMENT CONTROL PLAN, NOTES AND DETAILS

CONTRACTOR SHALL RELOCATE THE EXISTING TRAFFIC SIGN, ROAD SIGN AND BENCH MARK WITH SIGN AS DIRECTED BY THE ENGINEER. THE EXISTING PAVING AND BENCH MARK SHALL BE RECONSTRUCTED USING LIKE AND EQUAL MATERIALS. THE EXISTING CURBS WITHIN THE PAVING SHALL BE REMOVED STORED AND MAINTAINED IN AN ACTIVE HEALTHY CONDITION FOR REINSTALLATION. COST OF THESE WORK ITEMS SHALL BE INCLUDED IN THE CONTRACT PROPOSAL ITEM FOR CURBING & GUTTERING.

3" x 6" POLES # 133100 & # 33003 AND 6" x 6" POLE # 21 EXISTING 3" x 6" PEDESTAL SHALL BE RELOCATED BY THE RESPECTIVE UTILITIES. THE CONTRACTOR SHALL COORDINATE HIS ACTIVITIES WITH THE RESPECTIVE UTILITIES TO ASSURE THE SMOOTH AND EFFICIENT RELOCATION OF THESE FACILITIES.



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

DEPARTMENT OF PUBLIC WORKS
 HOWARD COUNTY, MARYLAND

DIRECTOR OF PUBLIC WORKS _____ DATE _____
 CHIEF, BUREAU OF ENGINEERING _____ DATE _____
 CHIEF, ROADS, BRIDGES & STORM DRAINAGE DIVISION _____ DATE _____

FISHER, COLLINS & CARTER, INC.
 CONSULTING ENGINEERS AND LAND SURVEYORS
 8388 COURT AVENUE
 ELLICOTT CITY, MARYLAND 21043

DES. P.W.K.
 DRN. D.B.S.
 CHK. T.A.F.
 DATE: _____ BY: _____ NO. _____ REVISION: _____ DATE: _____

PLAN AND PROFILE

ROADWAY IMPROVEMENTS
 AVOCA AVENUE AT MARYLAND ROUTE 103
 CAPITAL PROJECT NO. T-7032

SECOND ELECTION DISTRICT
 HOWARD COUNTY, MARYLAND

SCALE AS SHOWN

SHEET 2 OF 3

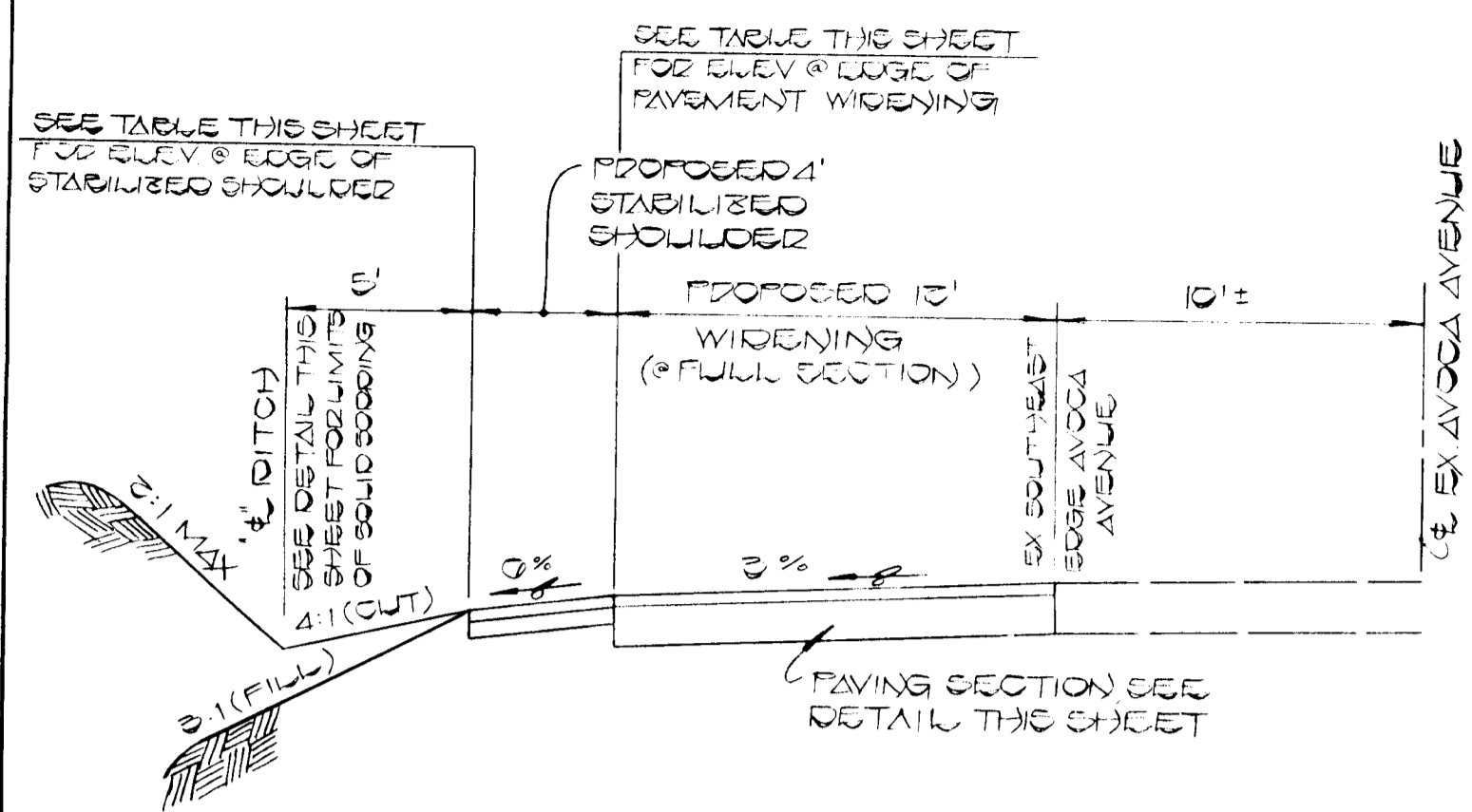
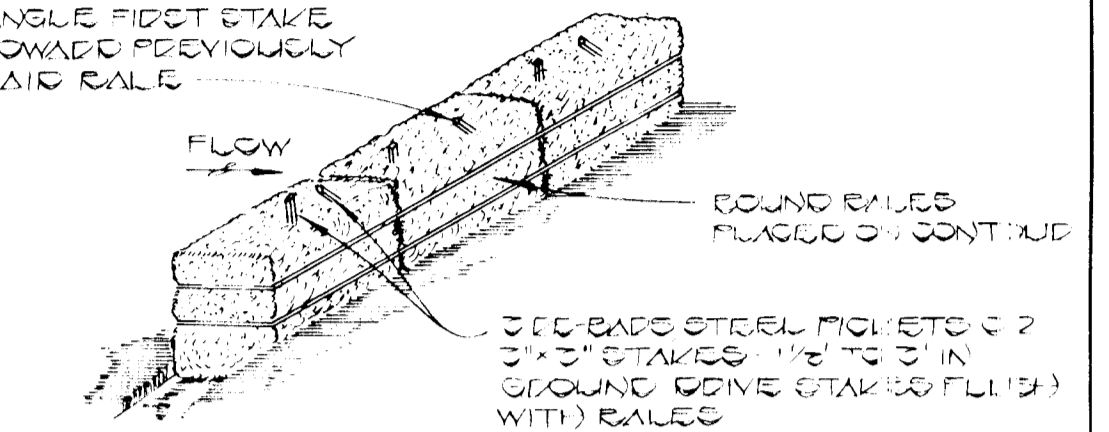
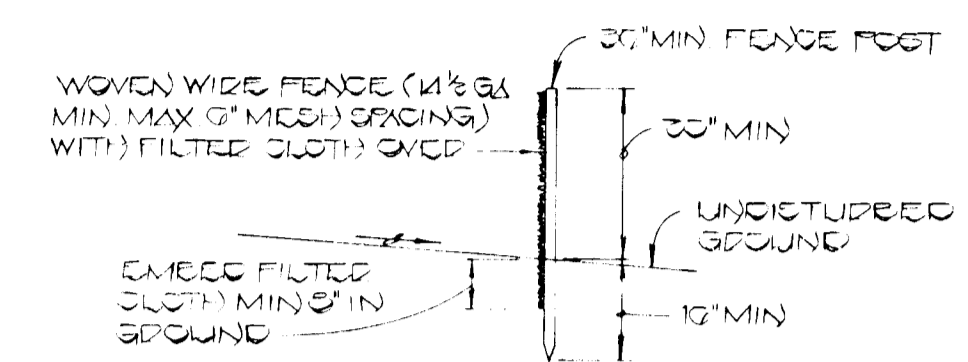
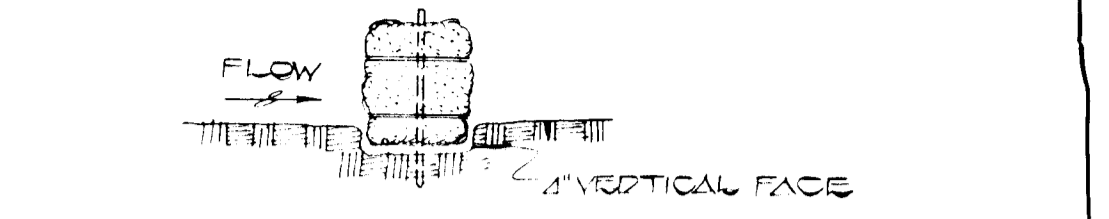
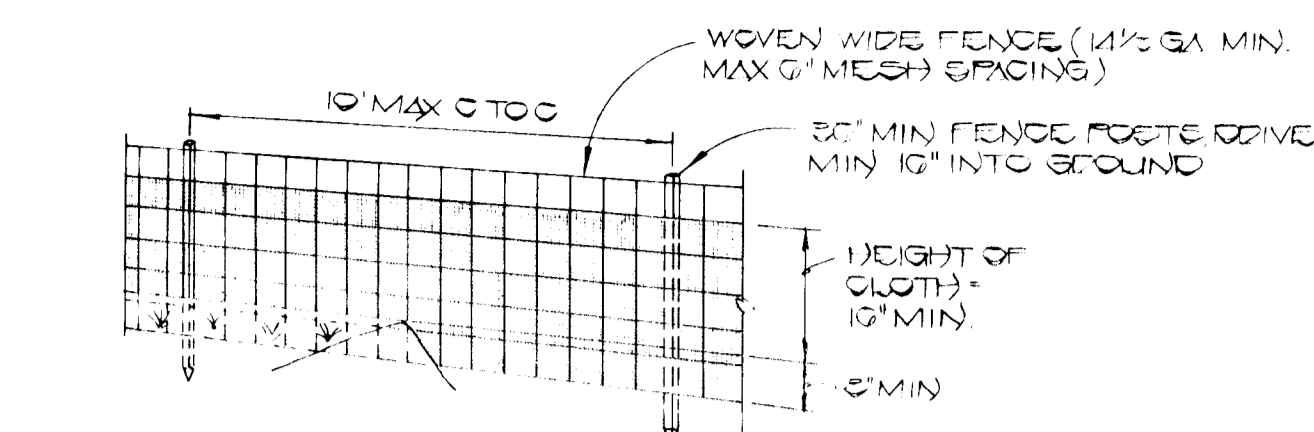
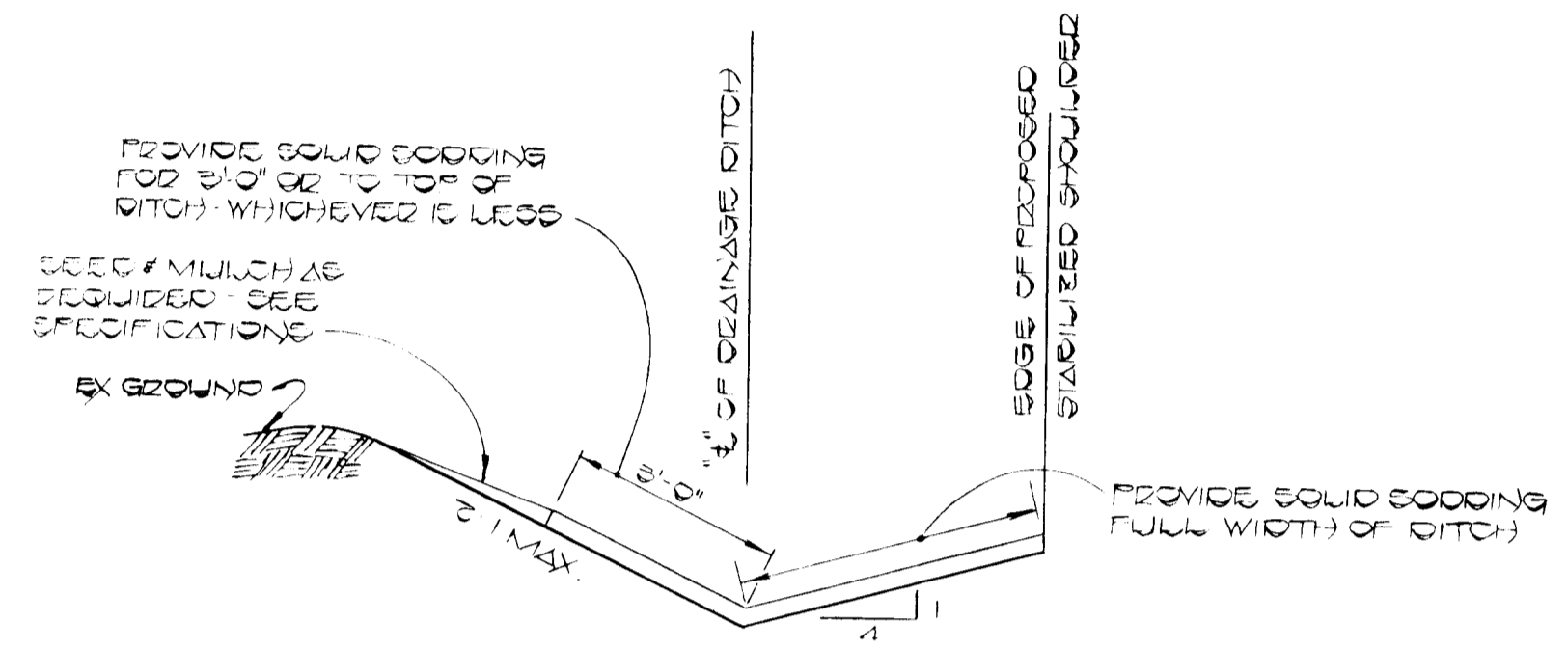
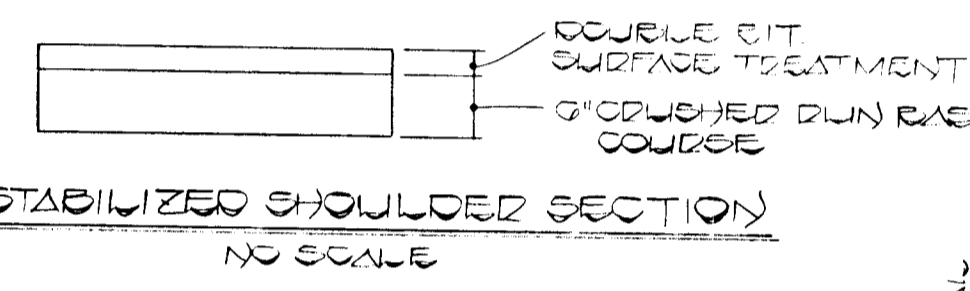
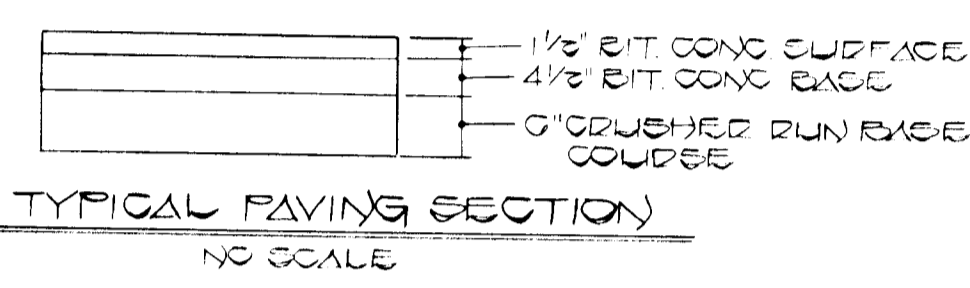


TABLE OF ROADWAY WIDENING ELEVATIONS

BASILINE STATION	WIDTH OF PAVING	ELEVATION EDGE OF PAVING	ELEVATION EDGE OF STABILIZED SHOULDER
0+35	10'	473.51	473.37
0+50	10'	473.93	473.69
0+70	10'	474.33	474.09
1+00	10'	474.64	474.40
1+35	10'	474.84	474.50
1+50	10'	474.80	473.70
1+75	10'	473.40	473.30
2+00	10' IN TAPER	473.04	473.70
2+25	7' IN TAPER	473.30	473.08
2+50	5' IN TAPER	471.50	471.35
2+75	3' IN TAPER	470.70	470.40
3+00	0'	470.45	470.35



TYPICAL SECTION NO SCALE

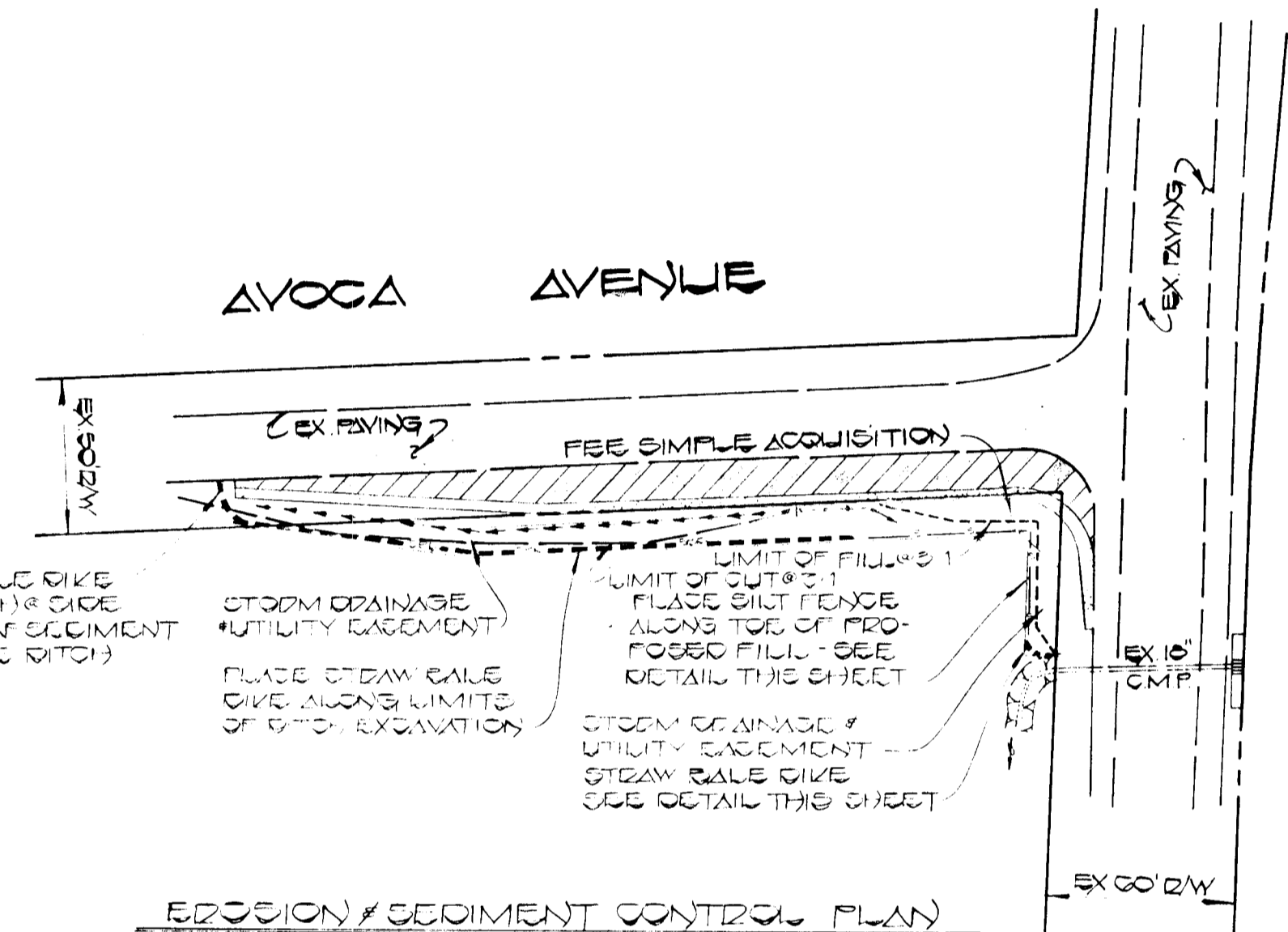


DETAIL SOLID SODDING @ DRAINAGE DITCH NO SCALE

NOTE: SEE SECTION 3.31 OF THE SPECIAL PROVISIONS FOR SPECIFICATIONS REGARDING SOLID SODDING

TABLE OF SIDE DRAINAGE DITCH ELEVATIONS

BASILINE STATION	DISTANCE - EDGE OF STABILIZED SHOULDER TO 1/2\"/>		
1+00	0' 0"	474.40	1/2\"/>
1+25	0' 0"	473.30	1/2\"/>
1+50	0' 0"	473.51	1/2\"/>
1+75	0' 0"	471.97	1/2\"/>
2+00	4' 0"	471.45	1/2\"/>
2+25	4' 0"	471.03	1/2\"/>
2+50	0' 0"	470.00	1/2\"/>
2+75	1' 0"	470.17	1/2\"/>
3+00	0' 0"	470.00	1/2\"/>
3+00	0' 0"	469.74	1/2\"/>



PLACE STRAW BALE DIKE APPROX. 10' FROM EDGE OF ROAD TO TOP OF EXCAVATION (SEE NB DRAINAGE DITCH EXCAVATION)

STORM DRAINAGE UTILITY EASEMENT

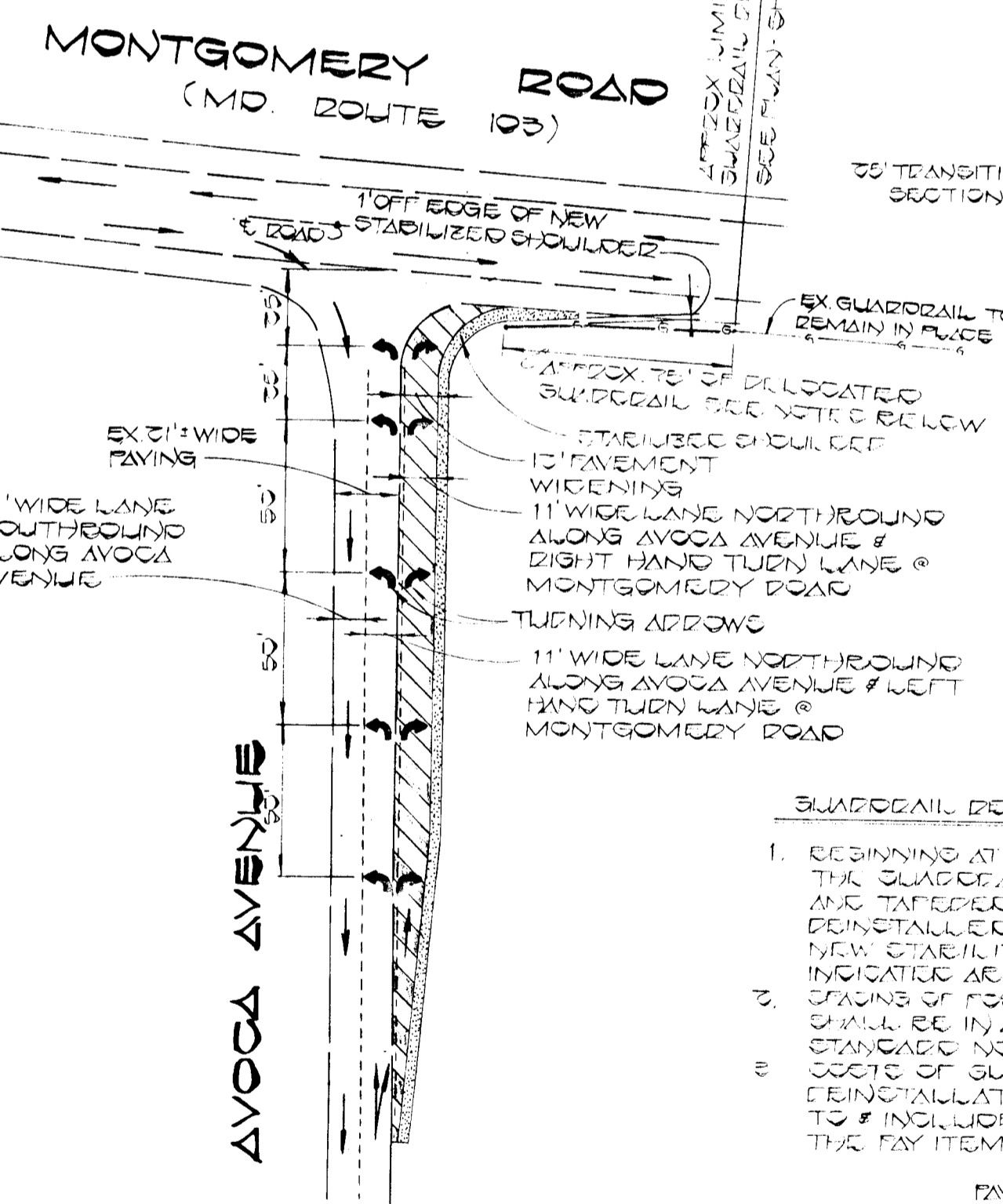
PLACE STRAW BALE DIKE ALONG LIMITS OF EXCAVATION

LIMIT OF FILLING 1

PLACE SILT FENCE ALONG TOP OF PROPOSED FILL - SEE DETAIL THIS SHEET

STORM DRAINAGE & UTILITY EASEMENT STRAW BALE DIKE SEE DETAIL THIS SHEET

NOTE: PERMANENT STABILIZATION OF ALL DISTURBED AREAS INCLUDING THE PLACING OF SALVAGED TOPSOIL (1\"/>

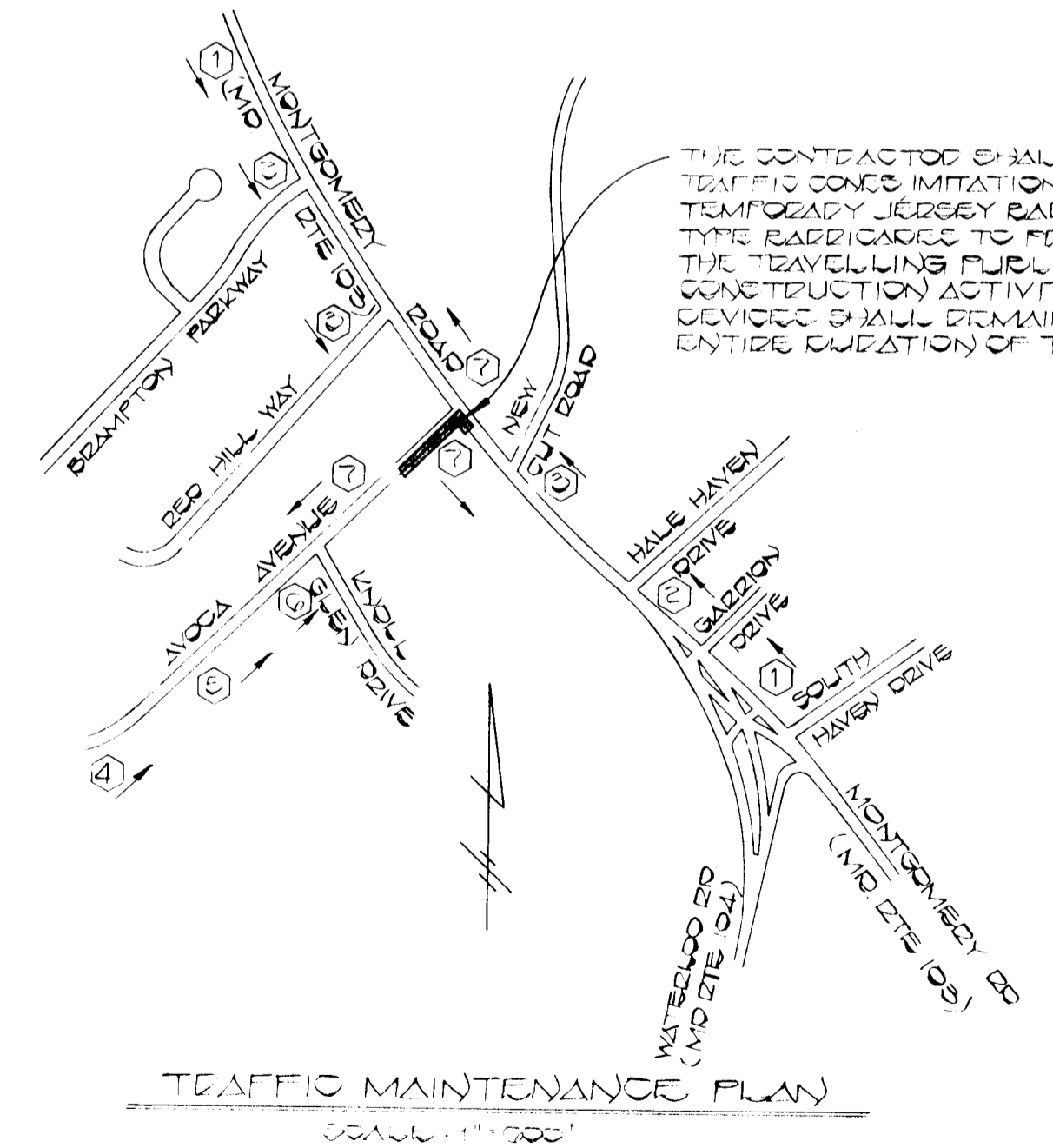
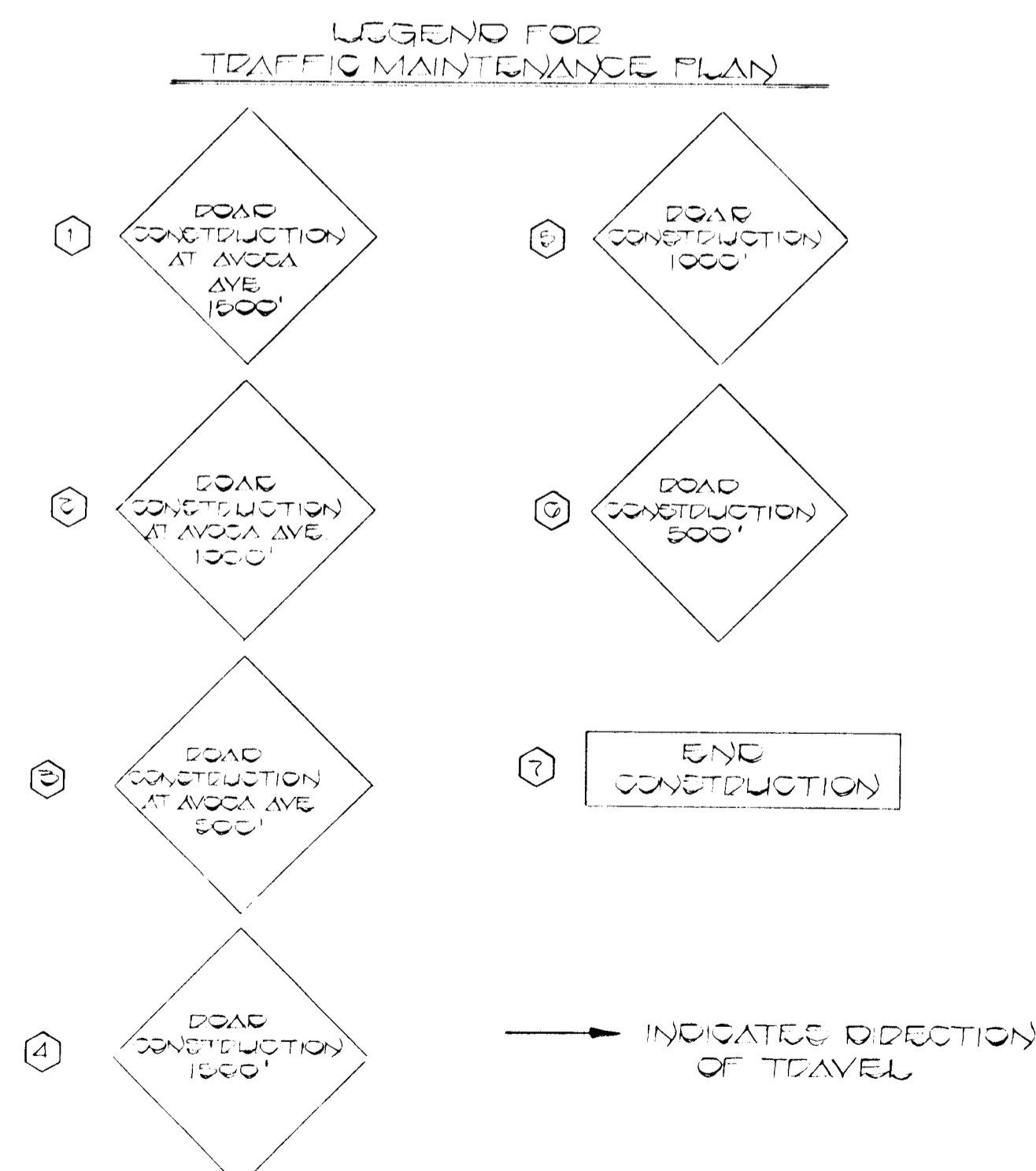


- GUARDRAIL DELOCATION NOTES
1. BEGINNING AT THE LIMIT OF REMOVAL THE GUARDRAIL SHALL BE DELOCATED AND TAPERED SUCH THAT IT IS REINSTALLED 11' OFF THE EDGE OF THE NEW STABILIZED SHOULDER AS INDICATED ABOVE.
 2. GRADES OF PILES & CONNECTION DETAILS SHALL BE IN ACCORDANCE WITH CHA STANDARD NO. MC-330 B1.
 3. SITES OF GUARDRAIL REMOVAL AND REINSTALLATION SHALL BE INCIDENTAL BEING INCLUDED IN THE FENCE BID FOR THE EX ITEMS OF THE PROPOSAL.

- PAVEMENT MARKINGS & STRIPING NOTES
1. THE CONTRACTOR SHALL NOTIFY THE HOWARD COUNTY DIVISION OF TRAFFIC SAFETY (15) 1 HOUR PRIOR TO BEGINNING THE ACTUAL INSTALLATION OF PAVEMENT MARKINGS AND/OR STRIPING.
 2. THIS PROVISION OF PAVEMENT MARKINGS & STRIPING WILL NOT BE MEASUREMENT FOR SEPARATELY, BUT SHALL BE CONSIDERED INCIDENTAL TO THE CONTRACT WORK. ALL APPROPRIATE COSTS SHALL BE INCLUDED IN THE VARIOUS EX ITEMS OF THE BID PROPOSAL.

STRIPING AND PAVEMENT MARKING PLAN

GUARDRAIL DELOCATION PLAN



THE CONTRACTOR SHALL UTILIZE TRAFFIC CONE LIMITATION BARRIERS, TEMPORARY JERSEY BARRIER OR SIMILAR TYPE BARRIERS TO PROTECT THE TRAVELLING PUBLIC FROM THE CONSTRUCTION ACTIVITIES. THESE DEVICES SHALL REMAIN IN PLACE THE ENTIRE DURATION OF THE PROJECT.

