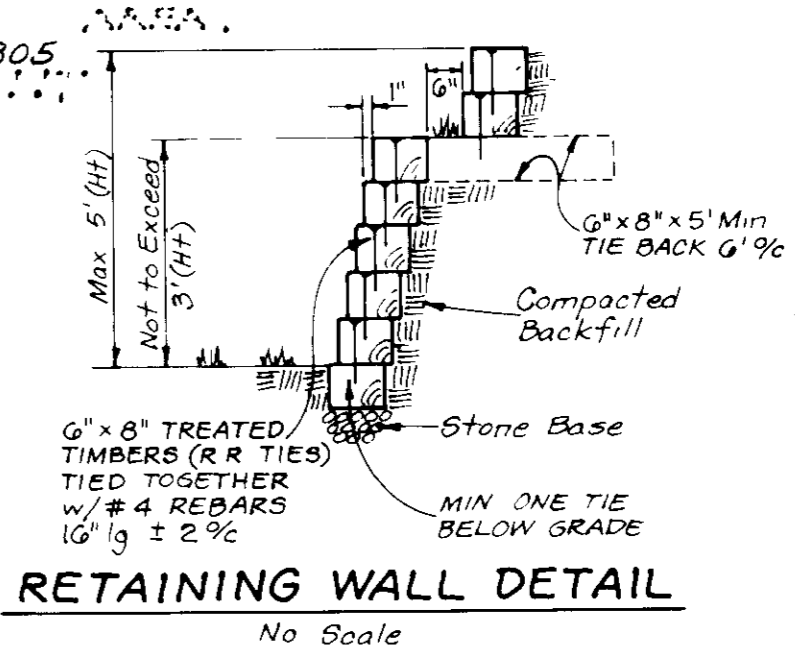


REVISION DATE
 Moved the back 10' of B7 rotated
 house on lot 78 to be 30' from
 the 77' 30' 00" street line
 on lot 41. See notes on sheet
 Comments 5/26/88



LEGEND

Contour Interval 2 FT
 Existing Contour 400
 Proposed Contour 340
 Spot Elevation +400
 Direction of Drainage

GENERAL NOTES

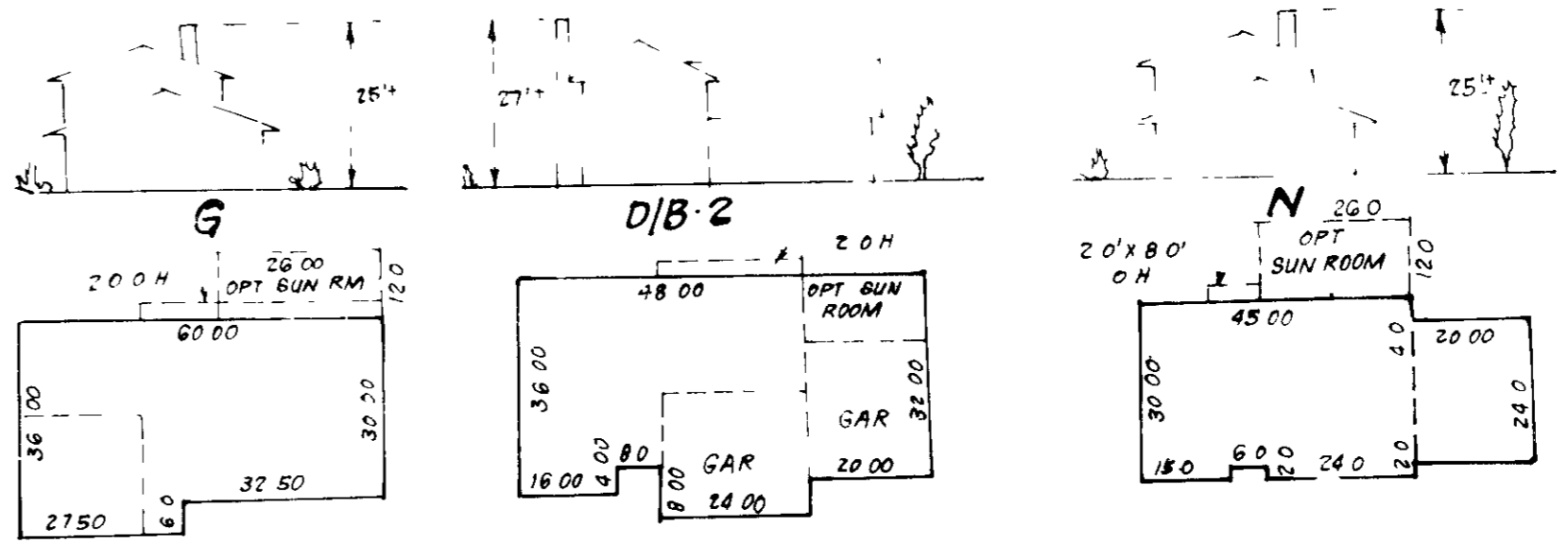
- 1 Subject property is zoned NT per Comprehensive Zoning Plan dated 8.2.86
- 2 The coordinates shown hereon are based upon the Maryland State Grid System and derived from the following Howard County Control Stations 2544002 and 2544008
- 3 All roads are public and existing
- 4 Any damage to county owned right-of-ways to be corrected at the Developer's expense
- 5 Total area included 4.013 Acres
- 6 Total number of lots 15
- 7 Reference Final Development Plan Section 2 Phase 196, Section 4 Phase 197 Part 1
- 8 Maximum lot coverage is 30%
- 9 The retention of developer shall contact the Construction Inspection Survey Division, 24 hours in advance of commencement of work, at 792-2630

SPECIAL NOTES

- 1 Approved Road Construction Plans shall be used for all public utilities
- 2 The water and sewer house connections not included in a 'Developers Agreement' shall conform to Howard County Plumbing Code. The on-site work shall be copper and the S.H.C. shall be 4 inches
- 3 Stormwater management provided for in The Village of Longreach, F 89-78
- 4 Public water & sewer shown for reference only. For more detailed information see water & sewer plans Contract No. 24-1738-D and 24-1664-D

ADDRESS CHART

| LOT NO | STREET ADDRESS |
|--------|---------------------|
| 39 | 8501 TAMAR DRIVE |
| 74 | 6312 SADDLE DRIVE |
| 75 | 6307 DRY STONE GATE |
| 76 | 6311 |
| 77 | 6315 |
| 78 | 6319 |
| 79 | 6322 |
| 80 | 6318 |
| 81 | 6316 |
| 82 | 6310 |
| 83 | 6306 |
| 84 | 6304 SADDLE DRIVE |
| 85 | 6300 |
| 86 | 8504 TAMAR DRIVE |
| 87 | 8500 |



TYPICAL HOUSES
 SCALE 1" = 30'
 Note: All units have 1" roof eaves front & rear

APPROVED
 DIVISION OF LAND DEVELOPMENT &
 ZONING ADMINISTRATION
 HOWARD COUNTY, MARYLAND
 DATE 5-26-88

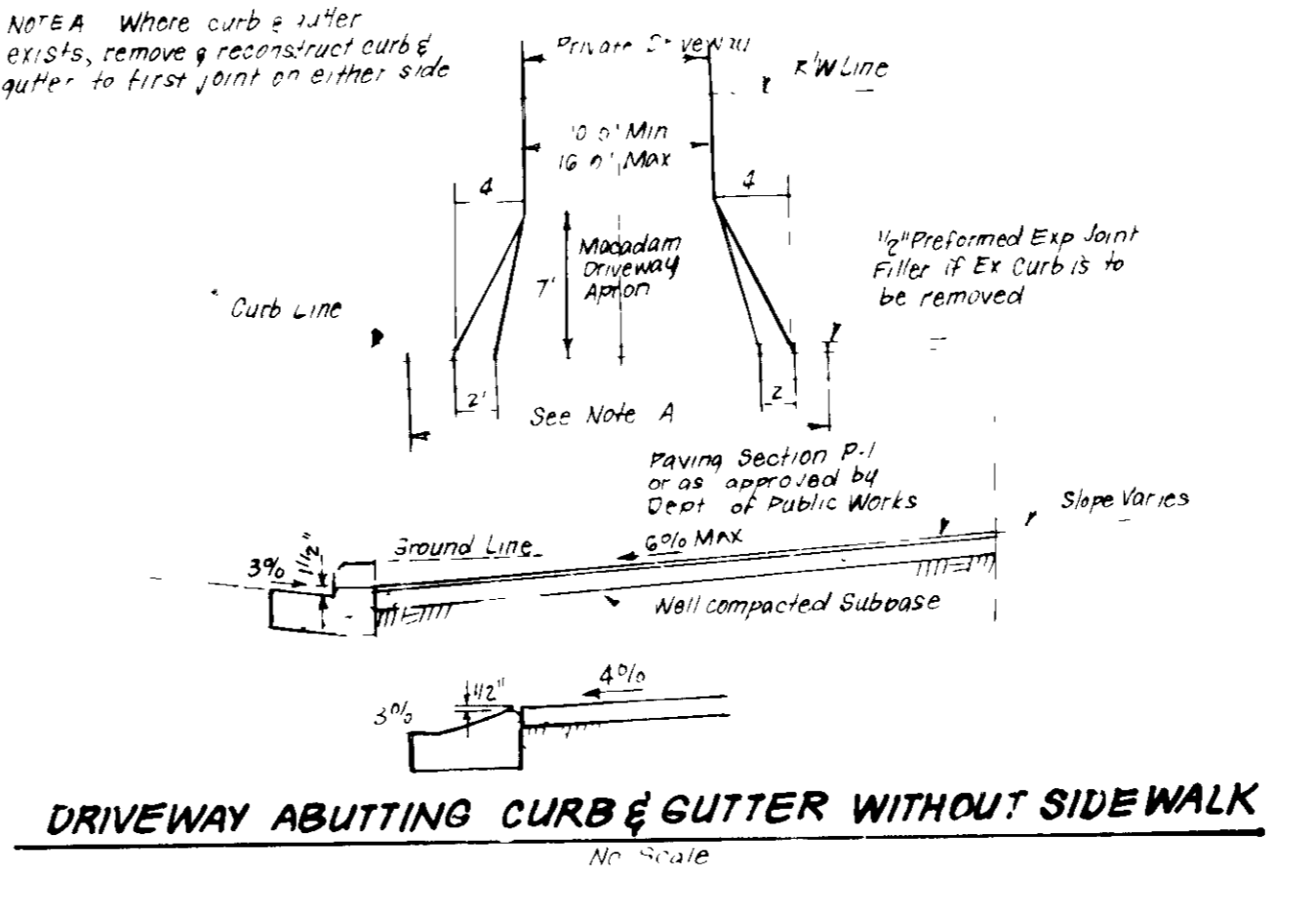
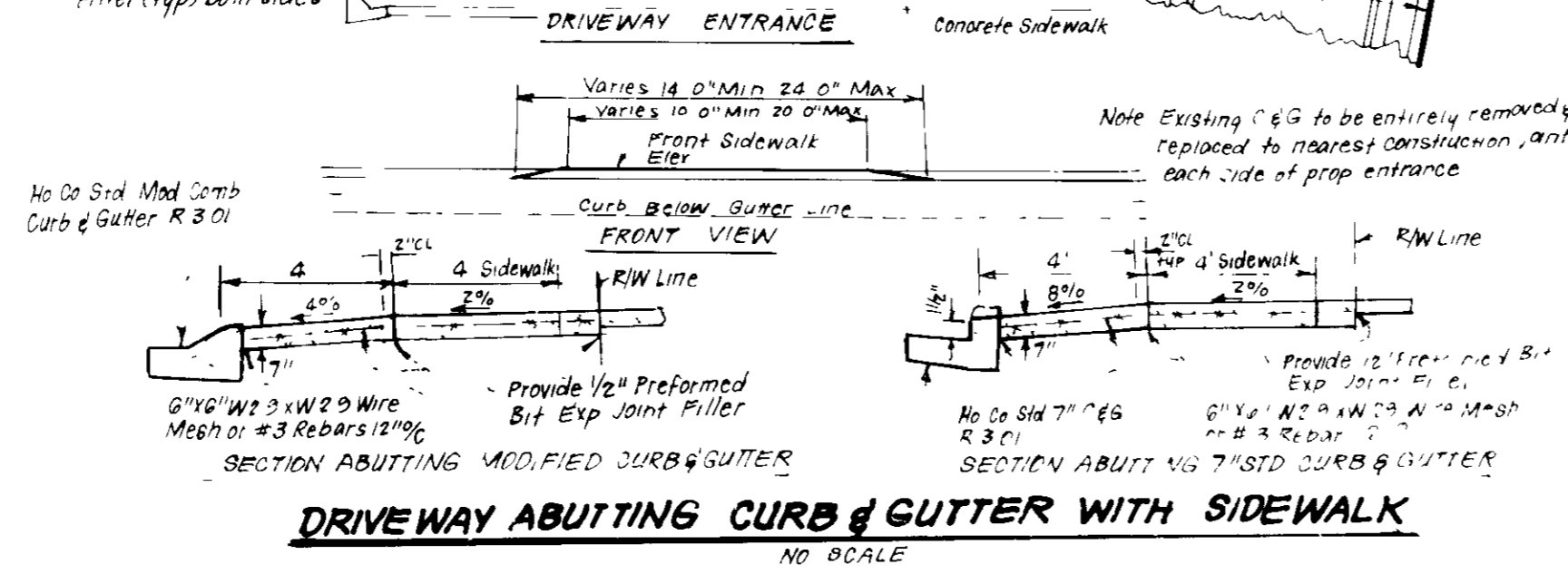
NOTE: Existing topo taken from road construction plans prepared by Fisher, Collins & Carter

| | | | | | |
|------------------|----------|--------------|---------|-----------|----------|
| Subdivision Name | COLUMBIA | Section Area | 2/1,2/2 | Lots | 39,74,87 |
| Block No | 7805 | Tax Map No | 37 | Elec Dist | 6065 02 |
| Water Code | E07 | Sewer Code | 3460000 | | |

APPROVED FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS
 HOWARD COUNTY HEALTH DEPARTMENT
 Joyce M. Boyd, M.D. 7/26/88
 COUNTY HEALTH OFFICER DATE

APPROVED HOWARD COUNTY OFFICE OF PLANNING & ZONING
 Planning Director 8-1-88
 Chief Division of Community Planning and Land Development DATE

APPROVED FOR PUBLIC WATER AND PUBLIC SEWERAGE
 STORM DRAINAGE SYSTEMS AND PUBLIC ROADS
 HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS
 Director DATE
 Chief Bureau of Engineering DATE



TRAP#2 SOST (ST. V) *

D.A. = 1.5 Acres
 Storage Required = 15(1800) = 2700 cf
 Storage Provided = 2700 cf
 Depth = 4'
 Top of Stone Crest = 324.0
 Bottom Elev. = 319.0
 Clean-Out Elev. = 321.0
 Bottom Dimensions = 23' x 21'
 * 1:1 Side Slopes in Cut

TRAP#3 SOST (ST. V) *

D.A. = 0.9 Ac
 Storage Required = 0.9(1800) = 1620 cf
 Storage Provided = 1620 cf
 Depth = 4'
 Top of Stone Crest = 339.0
 Bottom Elev. = 334.0
 Clean-Out Elev. = 336.0
 Bottom Dimensions = 23' x 11'
 * 1:1 Side Slopes in Cut

TRAP #1 SOST (ST. V)

D.A. = 0.6 Ac
 Storage Required = 0.6(1800) = 1080 cf
 Storage Provided = 1080 cf
 Depth = 3'
 Top of Stone Crest = 325.0
 Bottom Elev. = 321.0
 Clean-Out Elev. = 322.5
 Bottom Dimensions = 18' x 9'

LEGEND

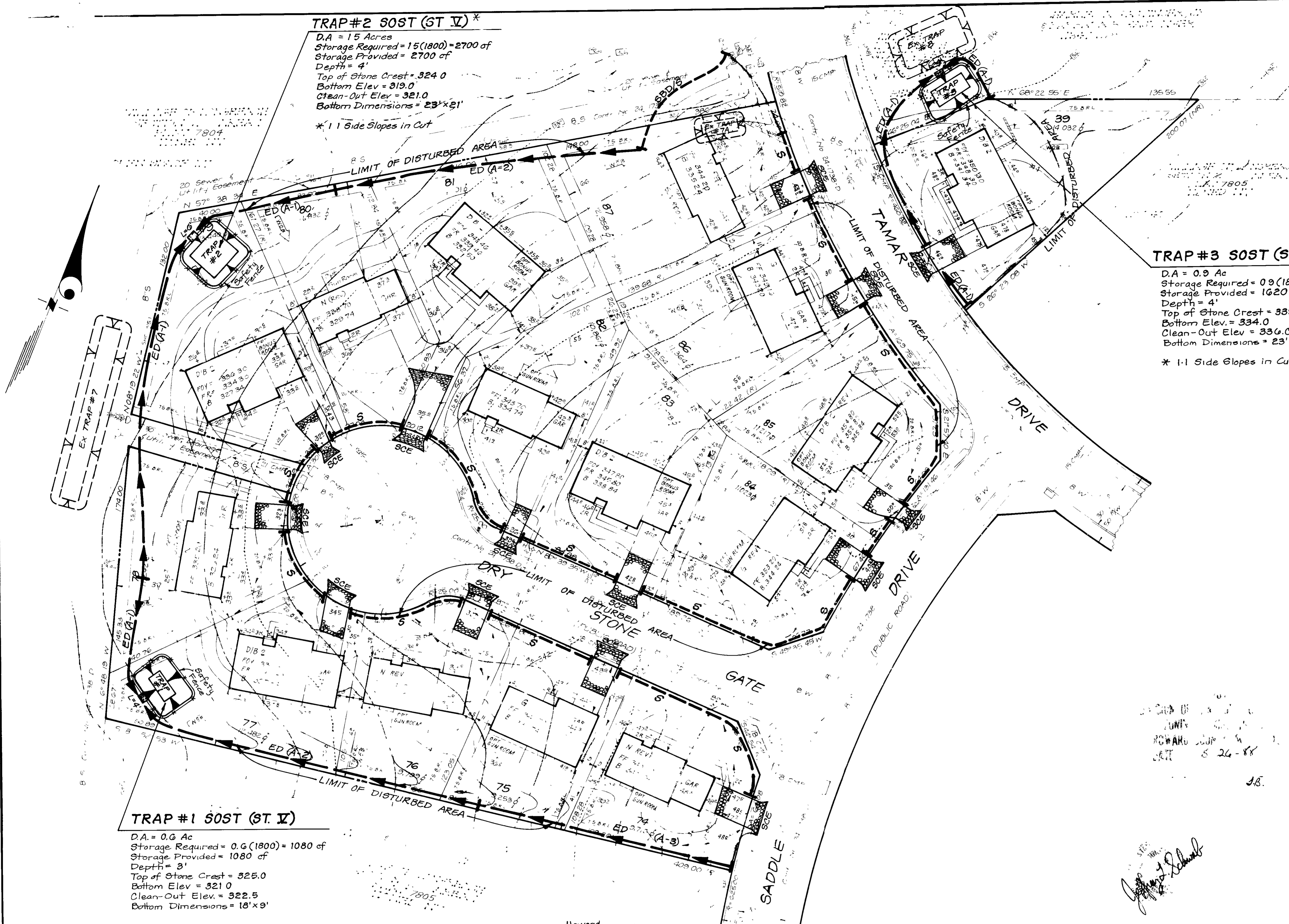
- Contour Interval 2 FT
- Existing Contour 330
- Proposed Contour 330
- Spot Elevation +30±
- Direction of Drainage
- Walk Out Basement
- Earth Dike
- Straw Bale Dike/Silt Fence
- Stabilized Construction Entrance

CONSTRUCTION SEQUENCE

| | # of DAYS |
|--|-----------|
| 1. Obtain Grading Permit. | 7 |
| 2. Install Sediment & Erosion Control Measures. | 14 |
| 3. Clear and Rough Grade Site. | 30 |
| * 4. Construct Houses, driveways & walks | 180 |
| 5. Fine grade and stabilize all disturbed areas on-site in accordance with Specs. & Specs. | 30 |
| 6. Upon approval of the sediment control inspector, remove sediment & erosion control measures & stabilize | 30 |

* House on Lot 87 not to be constructed until permission to remove existing Trap 7A is obtained.

Note: Existing Sediment & Erosion Control Measures shown are taken from previously approved plans F-88-78



DATE 8-26-88
 J.B.

Jeffrey J. Schwab

APPROVED FOR PUBLIC WATER AND SEWERAGE SYSTEMS AND PUBLIC UTILITIES BY THE BOARD OF PUBLIC UTILITIES AND SEWERAGE

Joyce M. Boyd, M.D./ESM 7/26/88

W. R. ... 8-1-88

Frankie S. ... 7-27-88

APPROVED FOR PUBLIC WATER AND SEWERAGE SYSTEMS AND PUBLIC UTILITIES BY THE BOARD OF PUBLIC UTILITIES AND SEWERAGE

John R. ... 7/6/88

DATE 7-22-88

APPROVED FOR PUBLIC WATER AND SEWERAGE SYSTEMS AND PUBLIC UTILITIES BY THE BOARD OF PUBLIC UTILITIES AND SEWERAGE

James Shanfield 5-4-88

Jeffrey J. Schwab 6/16/88

DATE 5-2-88

| | |
|----------------------|----------|
| COLUMBIA | 39/74/87 |
| Village of Longreach | 2/11/2/2 |
| 7805 | 134.14 |
| SEMD | 37 |
| 017 | 0065.02 |
| E07 | 3460000 |

CLARK • FINEFROCK & SACKETT INC
 ENGINEERS • ARCHITECTS • SURVEYORS

381 7800

BEDIMENT AND EROSION CONTROL PLAN
 LOTS 39 & 74 THRU 87

COLUMBIA

VILLAGE OF LONGREACH
 SECTION 2 AREA 1 AND SECTION 2 AREA 2
 6TH ELECTION DISTRICT
 HOWARD COUNTY, MARYLAND

FOR COLUMBIA BUILDERS, INC
 3 Lakefront North Suite 200
 Columbia, Maryland 21044

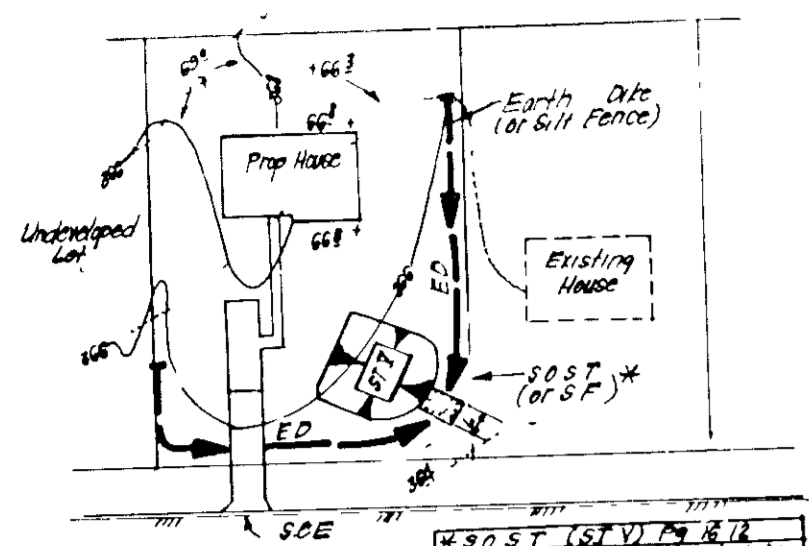
DATE 5-2-88

SCALE 1" = 30'

DRAWING 2 OF 3

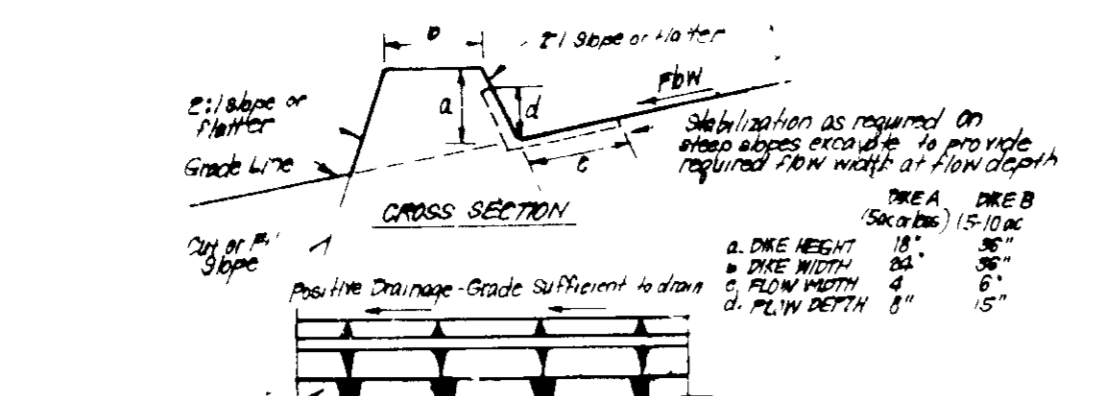
JOB NO 87-155

FILE NO 87-155 SE



SINGLE LOT SEDIMENT CONTROL PLAN
NO SCALE

* NOTE: Single lot detail can not be utilized if any two lots sharing common property lines are to be disturbed at the same time or on any lots showing a sediment trap.



EARTH DIKE DETAIL (E.D.)
NO SCALE

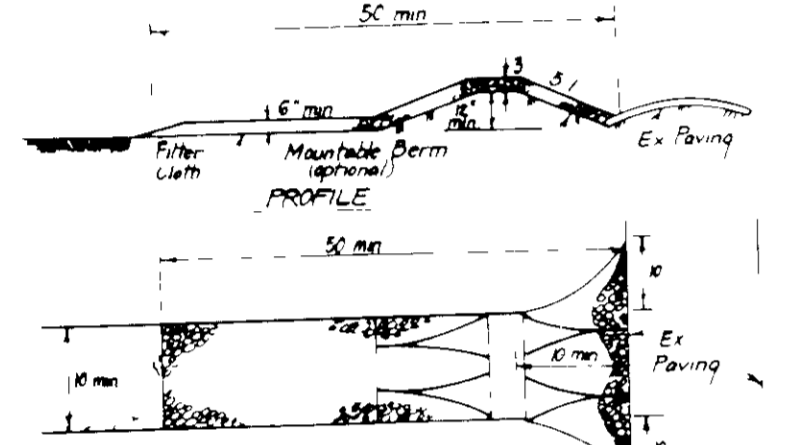
| TYPE OF TREATMENT | CHANNEL DRAINAGE | DIVE A | DIVE B |
|-------------------|------------------|-------------------------------|-------------------------------|
| 1 | 0.5 - 2.0% | Seed or Straw Mulch | Seed or Straw Mulch |
| 2 | 3.1 - 5.0% | Seed or Straw Mulch | Seed with or without 2" Stone |
| 3 | 5.1 - 8.0% | Seed with or without 2" Stone | Lined Rip Rap or Stone |
| 4 | 8.1 - 20.0% | Lined Rip Rap or Stone | Engineering Design |

A Stone to be 2" Stone or recycled concrete equivalent in a layer at least 3" thick and be pressed into soil with construction equipment.
B Rip Rap to be at least 4" in a layer at least 8" thick, pressed into soil.



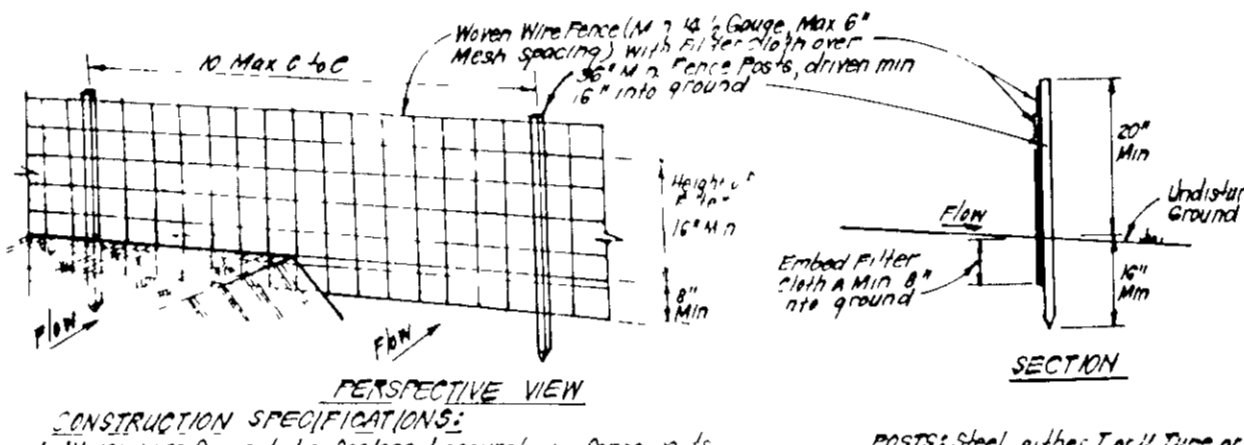
STONE OUTLET SEDIMENT TRAP (S.O.S.T.)
NO SCALE

CONSTRUCTION SPECIFICATIONS:
1. Area under embankment shall be cleared, grubbed and stripped of any vegetation and root mat. The rip rap area shall be compacted.
2. The fill material for the embankment shall be free of roots and other woody vegetation as well as over-size stones, rocks, organic material or other objectionable material. The embankment shall be compacted by hand using equipment while it is being constructed.
3. All cut and fill slopes shall be 2:1 or flatter.
4. The stone used in the outlet shall be small rip rap at least 1" in thickness of 2" aggregate placed on the up-grade side on the small rip rap or embedded filter cloth on the rip rap.
5. Sediment shall be removed and top repaired to its original dimensions when the sediment has accumulated to 1/2 the design depth of the trap.
6. The structure shall be inspected after each rain and repairs made as needed.
7. Construction operations shall be carried out in such a manner that erosion and water pollution is minimized.
8. The structure shall be removed and the area stabilized when the drainage area has been properly stabilized.



CONSTRUCTION SPECIFICATIONS:
1. Stone size Use 2" Stone or rounded or crushed concrete or brick.
2. Length As required for 10' x 10' or 10' x 15' or 15' x 15' stone resistance of where a shorter length is used.
3. Thickness Not less than 6" thick.
4. Width 18" to 24" maximum.
5. Filter Cloth A 1/2" mesh cloth shall be placed over the entire area prior to placing of stone.
6. Rip Rap Stone A 1/2" mesh cloth shall be placed over the entire area prior to placing of stone.
7. Maintenance The entrance shall be maintained in a condition which will prevent tracking or blowing of sediment onto public rights of way. This may require periodic top dressing with additional stone or construction entrance shall be closed across the entrance.
8. Weeping Weeds shall be removed to remove sediment or to prevent entrance of weeds onto public rights of way. When weeding is required, it shall be done on an area stabilized with stone and which drains into an approved sediment trap.
9. Trapping Sediment and water maintenance and be maintained at least 10' from road.

STABILIZED CONSTRUCTION ENTRANCE (SCE)
NO SCALE



CONSTRUCTION SPECIFICATIONS:
1. Woven wire fence to be fastened securely to fence or to 2" diameter wooden posts.
2. Filter cloth to be fastened securely to woven wire fence with ties spaced every 30" at top and mid sections.
3. When 2 sections of filter cloth within each other, they shall be overlapped by 6" and stapled.
4. No openings shall be permitted as needed and material removed when placed development site.
5. Posts: Steel, other Type or 2" diameter wooden posts.
6. Fence: Woven Wire, 1 1/2" Gauge, 6" Max. Mesh Opening.
7. Filter Cloth: Filter, Mesh, 1/2" Mesh, Stabilized, TYPED or Approved equal.
8. PREFABRICATED UNIT: Geotextiles, Equivalent or Approved equal.

SILT FENCE DETAIL (S)
NO SCALE

Subdivision Name COLUMBIA Village of Longreach
Prof No 7805 Block No 1344 Zoned 1344 M.D. Tax Map No 37 Elec Dist 6TH Const 6085.02
Water Code E06 Sewer Code 3460000

DESIGNED JLS
DRAWN BAL
CHECKED JLS
DATE 5-4-88

CLARK • FINEFROCK & SACKETT, INC.
ENGINEERS • PLANNERS • SURVEYORS
7135 MINSTREL WAY • COLUMBIA MD 21045 • (301) 381-7500 - BALTO • (301) 621-8100 - WASH

SEDIMENT & EROSION CONTROL DETAILS
LOTS 39 & 74 THRU 87
COLUMBIA
VILLAGE OF LONGREACH
SECTION 2 AREA 1 AND SECTION 2 AREA 2
6TH ELECTION DISTRICT
HOWARD COUNTY, MARYLAND
FOR COLUMBIA BUILDERS, INC
31 Lakeshore Dr., P.O. Box 200
Columbia, Maryland 21044

1/ We certify that all development and construction will be done in accordance with the plan of development and construction for erosion and sediment control and that all responsible parties involved in the construction project will have a Certificate of Attendance from the Dept. of Natural Resources Approved Training Program for Control of Sediment and Erosion before beginning the project. I also authorize periodic on-site inspection by the Howard County Conservation District or their authorized agents, as are deemed necessary.

DEVELOPER'S/OWNER'S CERTIFICATE
Reviewed for Howard County S.C.D. and met's Technical Requirements
U.S. Soil Conservation Service
THIS DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD COUNTY CONSERVATION DISTRICT.
Signature of Developer/Builder: Jeffrey L. Schueler
Date: 5-4-88

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: Jeffrey L. Schueler
Date: 5/4/88

APPROVED FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS
HOWARD COUNTY HEALTH DEPARTMENT
James M. Boyd, M.D. 7/26/88
COUNTY HEALTH OFFICER
APPROVED HOWARD COUNTY OFFICE OF PLANNING & ZONING
PLANNING DIRECTOR
APPROVED FOR PUBLIC WATER AND PUBLIC SEWERAGE
STORM DRAINAGE SYSTEMS AND PUBLIC ROADS
HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS
DIRECTOR

Reviewed for Howard County S.C.D. and met's Technical Requirements
U.S. Soil Conservation Service
THIS DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD COUNTY CONSERVATION DISTRICT.
Signature of Developer/Builder: John J. Hunter
Date: 7-2-88

STATE OF MARYLAND
Professional Engineer
Jeffrey L. Schueler
5/4/88

DESIGNED JLS
DRAWN BAL
CHECKED JLS
DATE 5-4-88

CLARK • FINEFROCK & SACKETT, INC.
ENGINEERS • PLANNERS • SURVEYORS
7135 MINSTREL WAY • COLUMBIA MD 21045 • (301) 381-7500 - BALTO • (301) 621-8100 - WASH

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