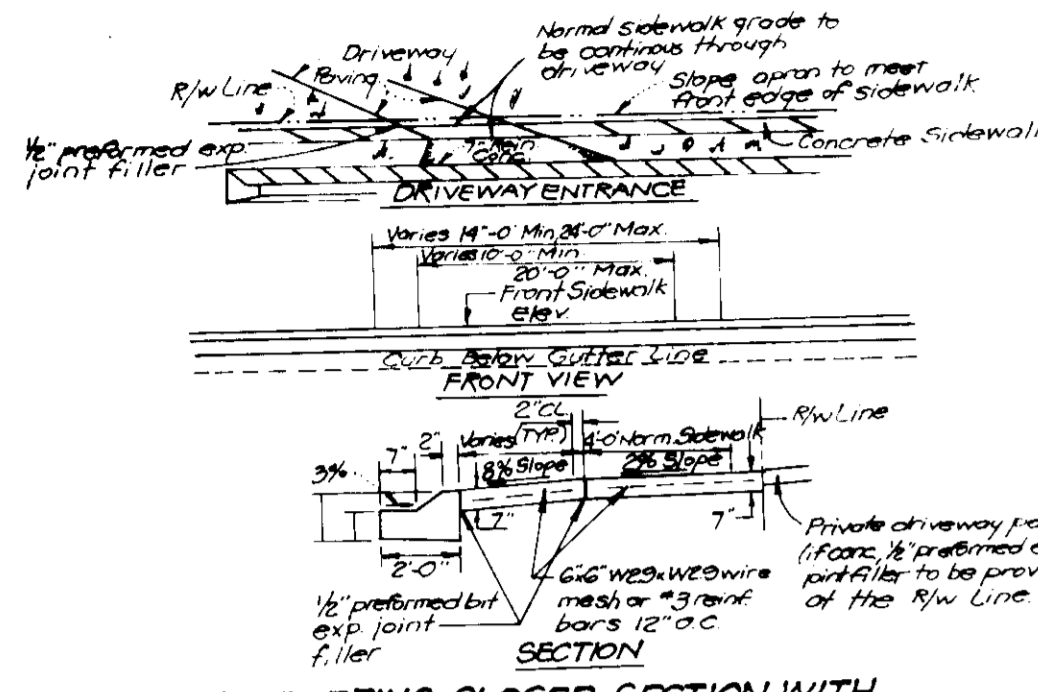
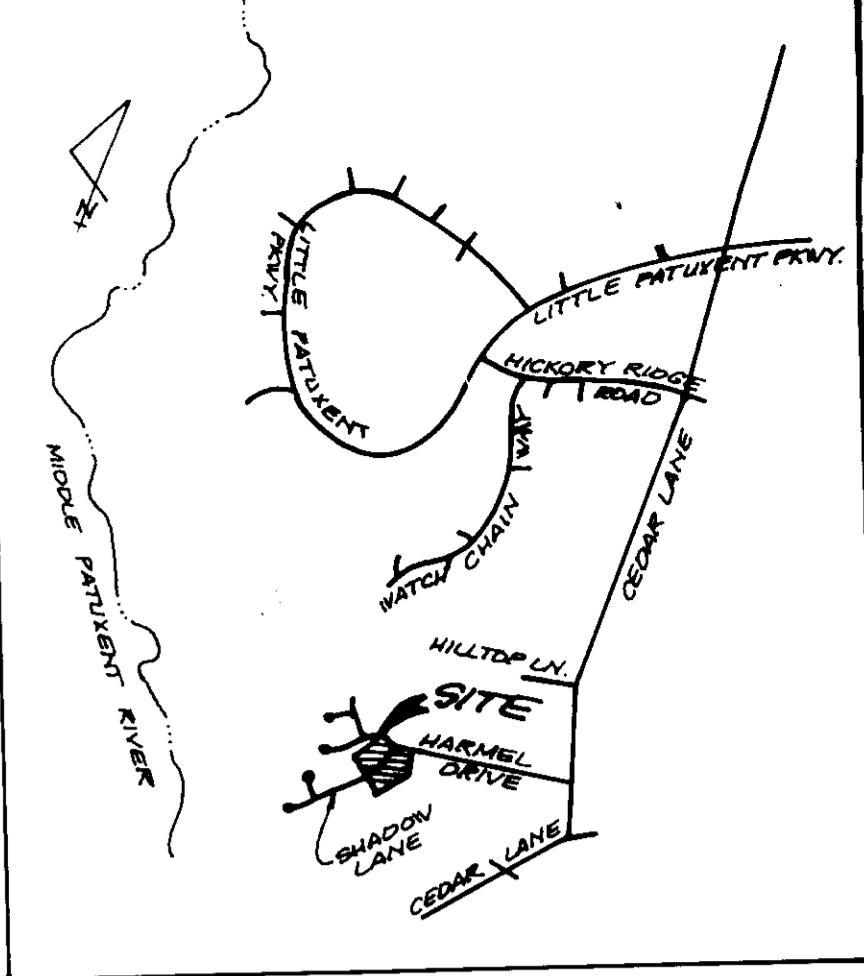


MELVIN E. ANDERS
L. 525 F. 742
ZONED R-20

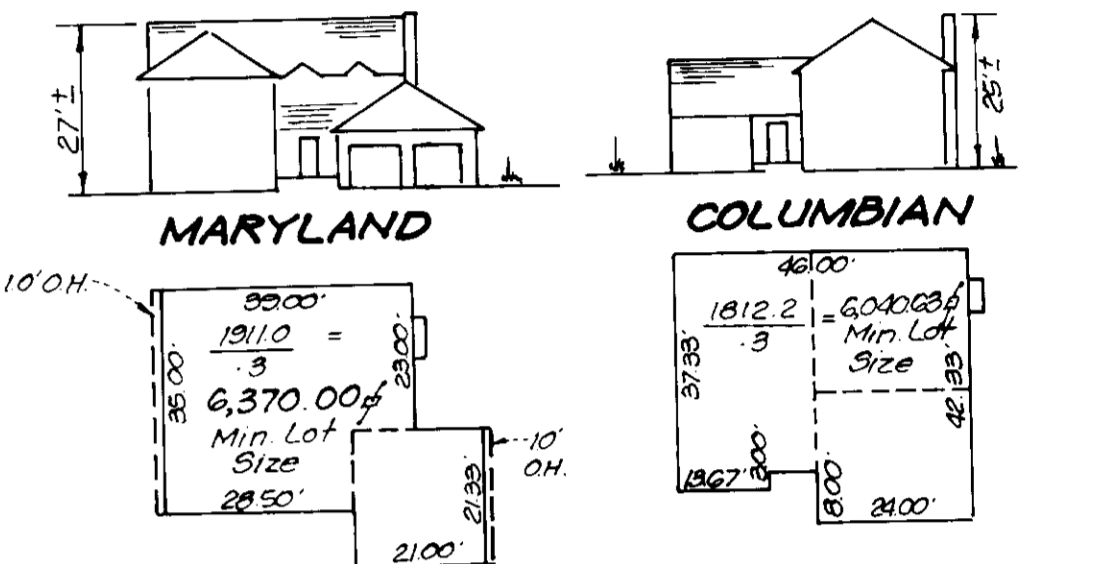
- GENERAL NOTES:**
- The lines indicated is owned: New Town S.F.L.D.
 - Coordinates are based upon The Maryland State Plane Coordinate System. Reference Howard County Control Points # 263902 & 263903.
 - All roads are public and existing.
 - Any damage to county owned rights-of-way to be corrected at the Developers expense.
 - Total area included: 2.8844 Acres
 - Total number of lots: 7
 - Reference Final Development Plan: Phase 1B1, Part VI, Plat 3054 A - 859 Thru 862.
 - The contractor or Developer shall contact the Construction Inspection/Survey Division, 24 hours in advance of commencement of work of 792-2630.
 - Maximum building coverage is 30% per lot.

ADDRESS CHART

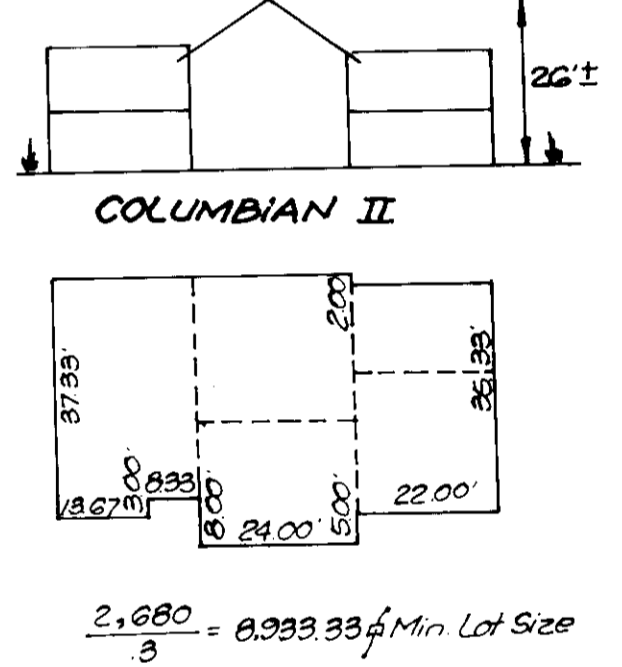
91	10906	SHADOW LANE
92	10910	"
93	10909	"
94	10905	"
95	10921	"
96	10917	"
97	10913	"



DRIVEWAY ABUTTING CLOSED SECTION WITH MODIFIED COMB CURB & GUTTER & SIDEWALK



TYPICAL HOUSES
Scale: 1" = 30'
NOTE: All houses have 6" roof eaves front and rear.



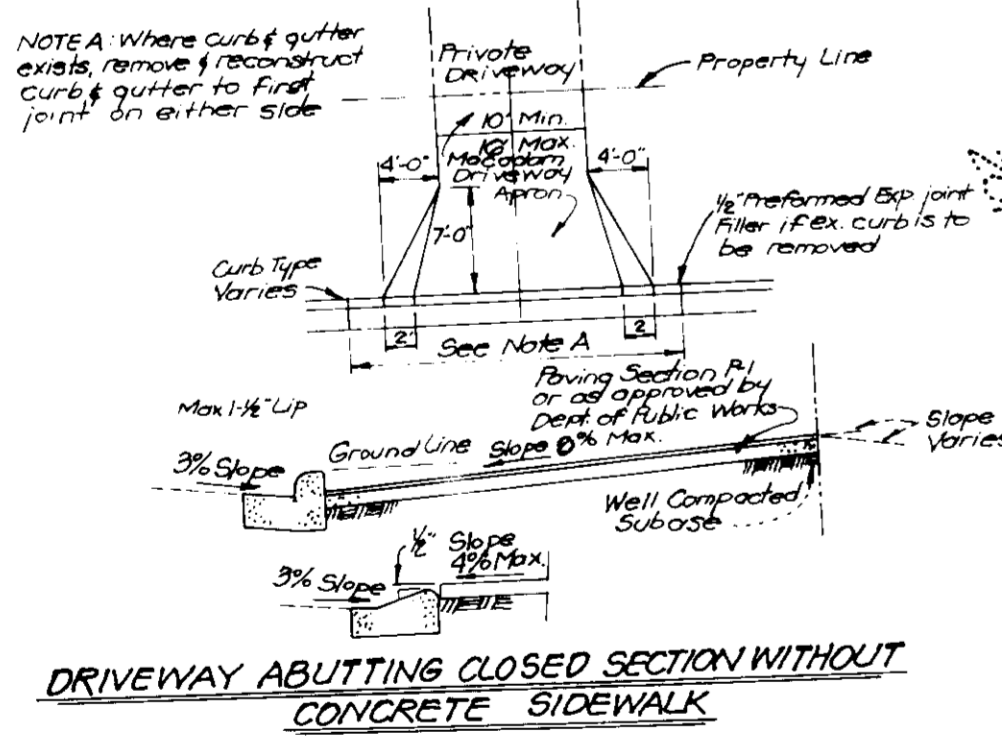
NOTE: Existing contours taken from plans prepared by Kilde Consultants, Inc. P-87-21.

Building Restriction Lines
Front - 20' Min.
Side & Rear - 75' Min.

- SPECIAL NOTES**
- Approved Road Construction Plans shall be used for all public Utilities.
 - Public water & sewer shown for reference only. For more detailed information - see water and sewer plans contract No. 94-1565-D.
 - The water & sewer house connections not included in Developer's Agreement shall conform to Howard County Plumbing Code. The 0" site W.H.C. shall be 1" copper and the site shall be 4" iron.
 - Stormwater Management provided for in plans submitted under F-85-120.

Subdivision Name: Columbia Village of Hickory Ridge		Sect./Area: 4	Lots: 51, 93, 94, 96
Plat #: 7067-127	Block #: 17	Zone: N.T.S.F.L.D.	Tax/Zone Map/Elec Dist: 5TH 605
Water Code: E-27	Sewer Code: 6590000 and 6591000		

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS, HOWARD COUNTY HEALTH DEPARTMENT.
DATE: 10-6-87



DRIVEWAY ABUTTING CLOSED SECTION WITHOUT CONCRETE SIDEWALK

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS, HOWARD COUNTY HEALTH DEPARTMENT.
DATE: 10-29-87

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE, STORM DRAINAGE SYSTEMS AND PUBLIC ROADS, HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS.
DATE: 10-26-87

- LEGEND**
- Contour Interval: 2ft
 - Exist. Contour: 10.0
 - Proposed Contour: +10.8
 - Spot Elevation: 10.8
 - Direction of Drainage: (arrow)
 - Exist. Trees to be Saved: (tree symbol)
 - Walk-Out Basement: (rectangle with 'W.C.B.')



CLARK · FINEFROCK & SACKETT
ENGINEERS · PLANNERS · SURVEYORS
11315 LOCKWOOD DRIVE SILVER SPRING, MARYLAND 20904 (301) 583-3400

SITE DEVELOPMENT PLAN
LOTS 51, 93, 94, & 96-100
COLUMBIA
VILLAGE OF HICKORY RIDGE
SECT. 4 - AREA 1
5TH ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

FOR: Consolidated Home Builders, Inc.
8960 Route 103
Columbia, Maryland 21045

DESIGNED: CMS
DRAWN: BAL
CHECKED: CMS
DATE: August 1987

SCALE: 1" = 50'
DRAWING: 1 of 1
JOB NO.: 87-00
FILE NO.: 87-008

MELVIN E. ANDERS
L. 525 F. 749

DEWITT M. BOYERS
L. 507 F. 791

TRAP No. 1 SOST. ST. V*

Drainage Area	0.8 Acres
Storage Required	0.8 x 1000 = 1440 cf.
Storage Provided	1440 cf.
Depth	4'
Top of Stone Crest	392.0
Bottom Elevation	387.0
Cleanout Elevation	389.0
Bottom Dimension	32' x 6'

* 1:1 side slopes in cut

Reviewed for Howard County S.C.D.
Name
and meets Technical Requirements
David H. Stein 10-22-87
Signature Date
U.S. Soil Conservation Service

THIS DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT.

Approved _____ Date _____

APPROVED
DIVISION OF LAND DEVELOPMENT & ZONING ADMINISTRATION
HOWARD COUNTY, MARYLAND
DATE 10-6-87

DEVELOPER'S/BUILDER'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 Dept. of Natural Resources Approved Training Program for the Control of Sediment and Erosion before beginning the project. I also authorize periodic on-site inspection by the Howard Soil Conservation District or their authorized agents, as are deemed necessary."

David H. Stein 8-27-87
Signature of Developer/Builder

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS.
HOWARD COUNTY HEALTH DEPARTMENT
Joseph Boyles 10-28-87
COUNTY HEALTH OFFICE DATE

APPROVED: HOWARD COUNTY OFFICE OF PLANNING & ZONING
David H. Stein 10-28-87
PLANNING DIRECTOR DATE

David H. Stein 10-29-87
CHIEF DIVISION OF LAND DEVELOPMENT AND ZONING ADMINISTRATION DATE

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE, STORM DRAINAGE SYSTEMS AND PUBLIC ROADS
HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS
James W. Lane 10-6-87
DIRECTOR DATE

James W. Lane 10-24-87
CHIEF BUREAU OF ENGINEERING DATE

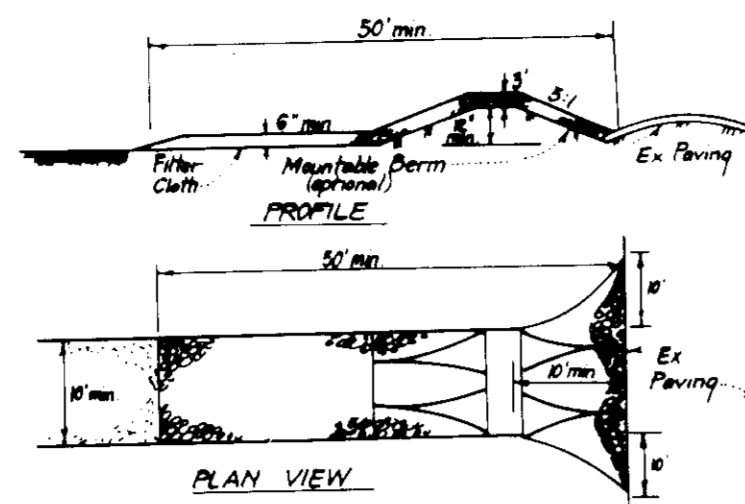
- LEGEND**
1. Contour Interval
 2. Exist. Contour
 3. Proposed Contour
 4. Spot Elevation
 5. Direction of Drainage
 6. Exist. Trees to be Saved
 7. Walk-Out Basement
 8. Straw Bale Dike/Silt Fence
 9. Earth Dike
 10. Stabilized Construction Entrance

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.

Jeffrey L. Schwab 9/3/87
Jeffrey L. Schwab Date

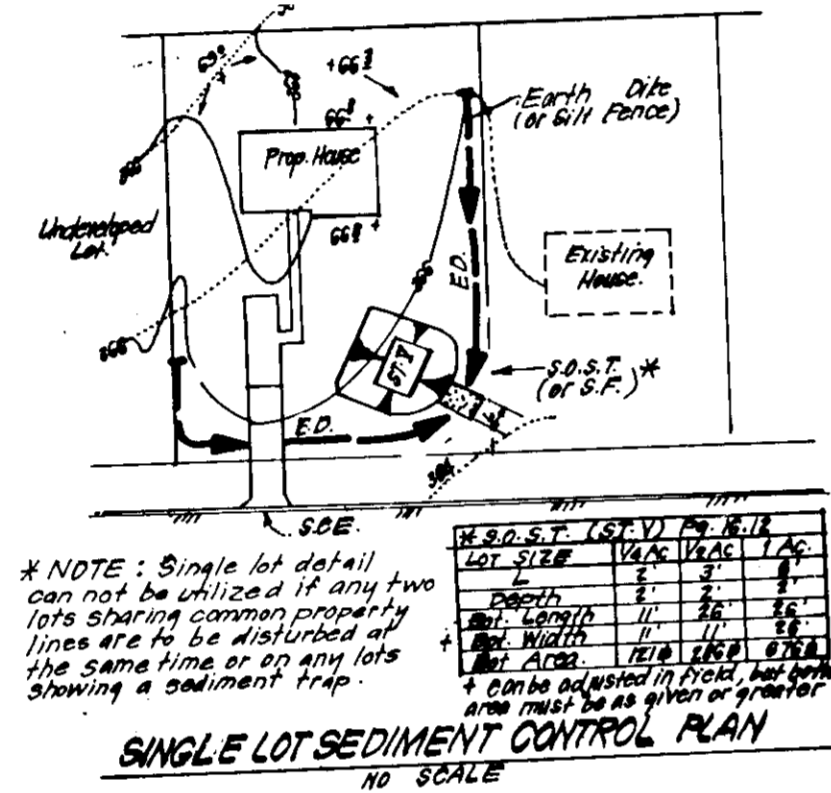
CLARK · FINEFROCK & SACKETT ENGINEERS · PLANNERS · SURVEYORS		11315 LOCKWOOD DRIVE · SILVER SPRING, MARYLAND 20904 · (301) 593-3400
DESIGNED JLS	SEDIMENT & EROSION CONTROL PLAN LOTS 51, 52, 93, 94, 100-100 COLUMBIA VILLAGE OF HICKORY RIDGE SECT. 4 - AREA 1	SCALE 1" = 30'
DRAWN BAL		DRAWING 2 of 3
CHECKED JLS	5TH ELECTION DISTRICT HOWARD COUNTY, MARYLAND	JOB NO. 87-009
DATE January 1987	FOR: Consolidated Home Builders, Inc. 8750 Route 108 Columbia, Maryland 21045	FILE NO. 87-009 SE



CONSTRUCTION SPECIFICATIONS:

1. Stone size - Use 2" stone or recycled concrete equivalent.
2. Length - As required, but not less than 50 feet, except on a single residence lot where a 30 foot maximum length would apply.
3. Thickness - Not less than six (6) inches.
4. Width - Ten (10) feet minimum, but not less than the full width at points where depress or grades occur.
5. Filter Cloth - Will be placed over the entire area prior to placing of stone. Filter will not be required on a single family residence lot.
6. Surface Water - All surface water flowing or diverted toward construction entrance shall be piped across the entrance. If a pipe is impractical, a mountable curb with 3/4" slope will be constructed.
7. Maintenance - The entrance shall be maintained in a condition which will prevent tracking or flowing of sediment into public rights-of-way. This may require periodic top dressing with additional stone or concrete. The contractor shall be responsible for clearing of any materials used to trap sediment. All sediment applied, stored, washed or tracked onto public rights-of-way must be removed immediately.
8. Warning - Warning signs shall be placed to remove sediment prior to entrance onto public rights-of-way. When warning is required, it shall be done as an area stabilized with stone and which drains into an approved sediment trapping device.
9. Periodic inspection and needed maintenance shall be provided after each rain.

STABILIZED CONSTRUCTION ENTRANCE (SCE)
NO SCALE

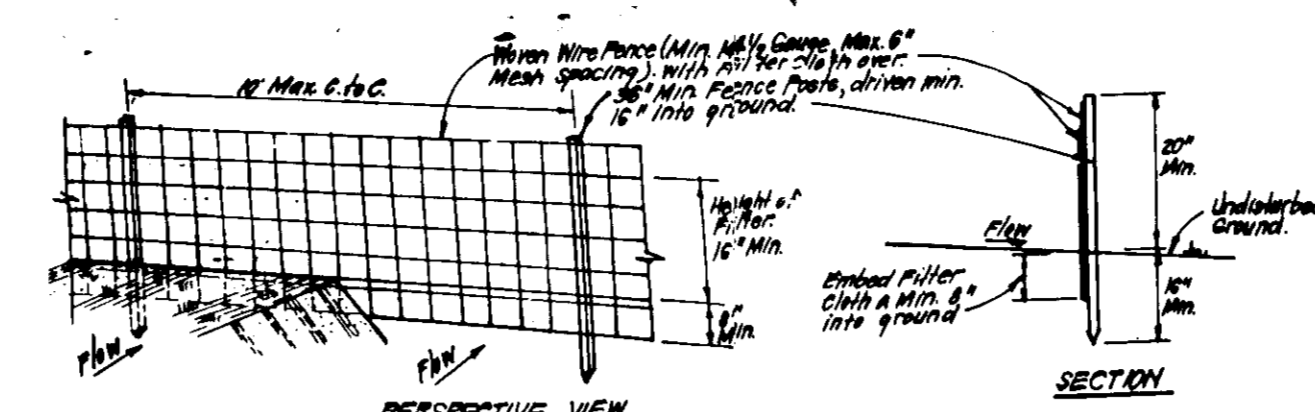


CONSTRUCTION SPECIFICATIONS:

1. Area under embankment shall be cleared, grubbed and stripped of any vegetation and root mat. The top soil shall be replaced.
2. The fill material for the embankment shall be free of rocks and other debris, vegetation as well as any sized stones, rocks, organic material or other objectionable material. The embankment shall be compacted by tamping with vibrators while it is being constructed.
3. All cut and fill slopes shall be 2:1 or flatter.
4. The slope used in the outlet shall be small rip rap 4"-6" along with 1" thickness of aggregate placed on the up-slope side in the small rip rap of check dam after dirt in the pipe.
5. Sediment shall be removed and trap restored to the 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.

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

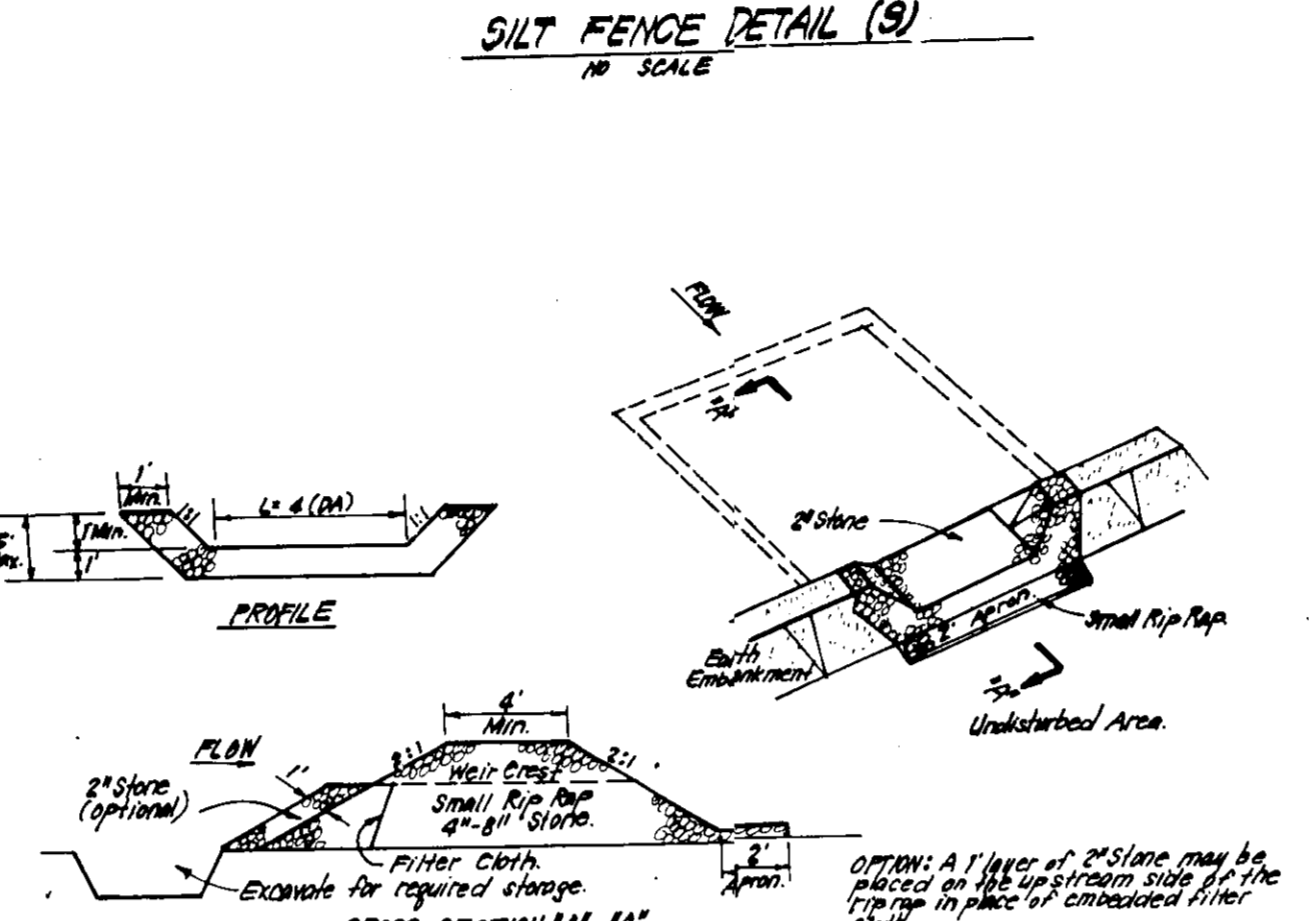
NO.	DESCRIPTION	NO. OF DAYS
A.	Obtain Grading Permit and Install Sediment and Erosion Control Devices and Stabilize.	7
B.	Excavate for Foundations and Rough Grade if Temporarily Stabilize.	30
C.	Construct Structures, Sidewalks and Driveways.	180
D.	Final Grade and stabilize in accordance with Stds. & Specs.	30
E.	Upon approval of the sediment control inspector, remove sediment and erosion controls and stabilize.	14



CONSTRUCTION SPECIFICATIONS:

1. Posts: Steel either 1" or 1 1/2" Type or 2" Hardwood.
2. FENCE: Nylon Wire, 14/4 Gauge, 6" Mesh, Mesh Quantity: 1000 sq. ft. (1000' x 100').
3. Substrate: TYPED APPROX. EQUIV. PRE-FABRICATED UNIT: Geotextile, Environment, or Approx. Equiv.

SILT FENCE DETAIL (S)
NO SCALE



CONSTRUCTION SPECIFICATIONS:

1. Area under embankment shall be cleared, grubbed and stripped of any vegetation and root mat. The top soil shall be replaced.
2. The fill material for the embankment shall be free of rocks and other debris, vegetation as well as any sized stones, rocks, organic material or other objectionable material. The embankment shall be compacted by tamping with vibrators while it is being constructed.
3. All cut and fill slopes shall be 2:1 or flatter.
4. The slope used in the outlet shall be small rip rap 4"-6" along with 1" thickness of aggregate placed on the up-slope side in the small rip rap of check dam after dirt in the pipe.
5. Sediment shall be removed and trap restored to the 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.

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

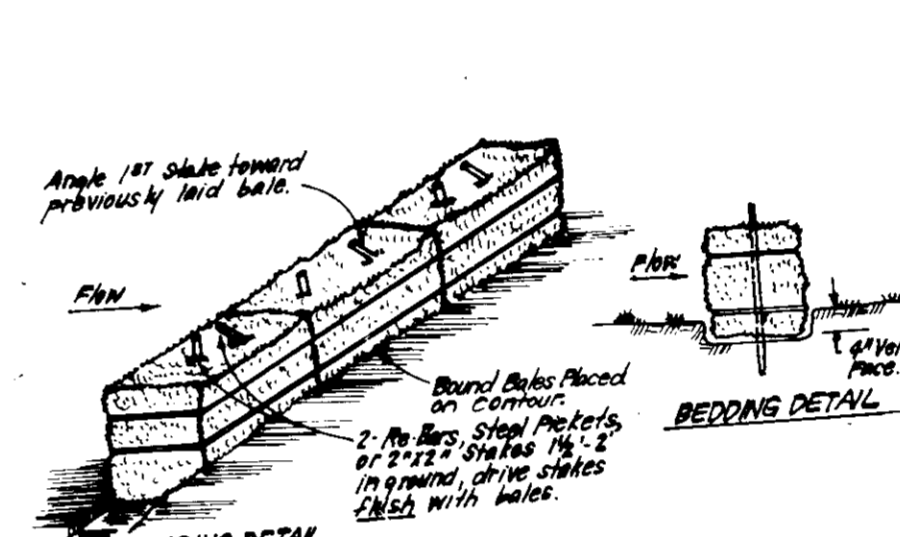
CONSTRUCTION SEQUENCE:

NO.	DESCRIPTION	NO. OF DAYS
A.	Obtain Grading Permit and Install Sediment and Erosion Control Devices and Stabilize.	7
B.	Excavate for Foundations and Rough Grade if Temporarily Stabilize.	30
C.	Construct Structures, Sidewalks and Driveways.	180
D.	Final Grade and stabilize in accordance with Stds. & Specs.	30
E.	Upon approval of the sediment control inspector, remove sediment and erosion controls and stabilize.	14

SEDIMENT CONTROL NOTES

- 1) A minimum of 24 hours notice must be given to the Howard County Office of Inspection and Permitting prior to the start of any construction. (992-2437)
- 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 1983 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL.
- 3) Following initial soil disturbance or redistribution, permanent or temporary stabilization shall be completed within: a) 7 calendar days for all permanent sediment control structures, dikes, perimeter slopes and all slopes greater than 3:1; b) 14 days as to all other disturbed or eroded areas on the project site.
- 4) All sediment traps/basins shown must be fenced and warning signs posted around their perimeter in accordance with Sec. 1, Chapter 12, of the HOWARD COUNTY DESIGN MANUAL, Storm Drainage.
- 5) All disturbed areas must be stabilized within the time period specified above in accordance with the 1983 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL for permanent seeding (Sec. 30) and (Sec. 31) soil (Sec. 36), temporary seeding (Sec. 30) and mulching (Sec. 51). Temporary stabilization with mulch alone can only be done when recommended seeding rates 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.
- 7) Site Analysis:

Total Area of Site	6000 Acres
Area Disturbed	1000 Acres
Area to be roofed or paved	2000 Acres
Area to be vegetatively stabilized	2000 Acres
Total Cut	Cu. yds. N/A
Total Fill	Cu. yds. N/A
Off-site waste/borrow area location	N/A
- 8) Any sediment control practice which is disturbed by grading activity for placement.
- 9) Additional sediment control must be provided, if deemed necessary by the Howard County law enforcement inspector.
- 10) On all sites with disturbed areas in excess of 2 acres, approval of the inspection agency shall be requested upon completion of installation of permanent 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) If houses are to be constructed on an "as-built" basis, at random, single lot Sediment Control as shown below shall be implemented.
- 12) All pipes to be blocked at the end of each day (see detail below). N/A
- 13) The total amount of straw bale dikes/silt fence equals 2000 L.F.



CONSTRUCTION SPECIFICATIONS:

1. Bales shall be placed at the top of a slope or on the contour and in a row with ends tightly abutting the adjacent bales with the binding edge horizontal.
2. Each bale shall be embedded in the soil a minimum of 2 inches or rebar driven thru the bale.
3. Bales shall be securely anchored in place by either 2 stakes or rebar driven thru the bale at an angle to force the bales together. Stakes shall be driven flush with the top surface of the bales.
4. Inspection shall be frequent and repairment shall be made promptly as needed.
5. Bales shall be removed when they have served their usefulness as well as block or impede storm flow or drainage.

STRAW BALE DIKE DETAIL (SBD)
NO SCALE

CONSTRUCTION SEQUENCE:

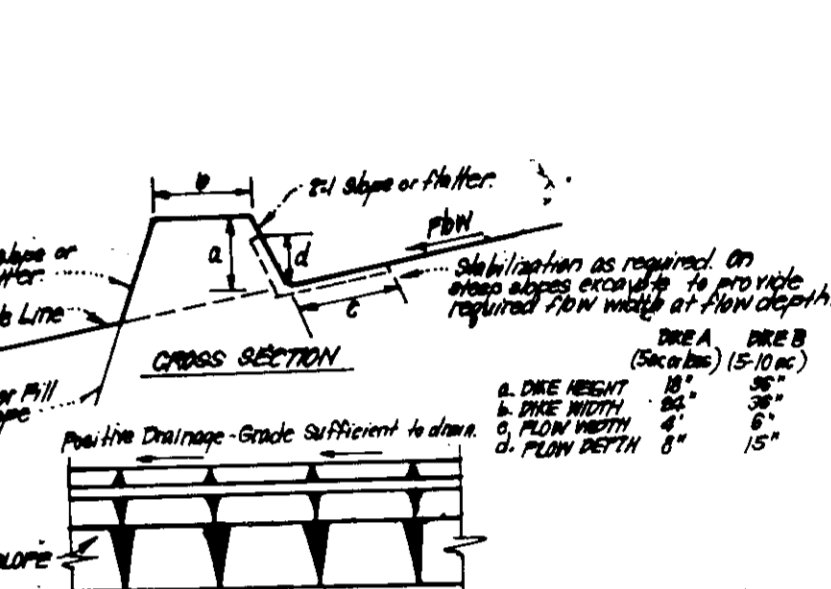
NO.	DESCRIPTION	NO. OF DAYS
A.	Obtain Grading Permit and Install Sediment and Erosion Control Devices and Stabilize.	7
B.	Excavate for Foundations and Rough Grade if Temporarily Stabilize.	30
C.	Construct Structures, Sidewalks and Driveways.	180
D.	Final Grade and stabilize in accordance with Stds. & Specs.	30
E.	Upon approval of the sediment control inspector, remove sediment and erosion controls and stabilize.	14

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.
- Soil Amendments:** In lieu of soil test recommendations, use one of the following schedules:
- 1) Preferred - Apply 2 tons per acre dolomitic limestone (92 lbs/1000 square ft) and 600 lbs per acre 10-10-10 fertilizer (14 lbs/1000 sq ft) before seeding. Narrow or disc 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. Narrow or disc 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 lbs per acre (.55 lbs/1000 sq ft) of weeping lovegrass. During the period of October 15 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 soil. Option (3) Seed with 60 lbs/acre Kentucky 31 Tall Fescue and mulch with 2 tons/acre well anchored straw.
- Mulching:** Apply 1 1/2 to 2 tons per acre (10 to 90 lbs/1000 sq ft) of unrotted small grain straw immediately after seeding. Anchor mulch immediately after application using mulch anchoring tool or 2 1/2 gal per acre (5 gal/1000 sq ft) of emulsified asphalt on flat areas. On slopes 8 feet or higher, use 3/8 gallon per acre (8 gal/1000 sq ft) for anchoring.
- Maintenance:** - Inspect all seeded 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.
- 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 November 15, seed with 25 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 15 thru February 28, protect site by applying 2 tons per acre of well anchored straw mulch and seed as soon as possible in the spring, or use soil.
- Mulching:** Apply 1 1/2 to 2 tons per acre (10 to 90 lbs/1000 sq ft) of unrotted small grain straw immediately after seeding. Anchor mulch immediately after application using mulch anchoring tool or 2 1/2 gal per acre (5 gal/1000 sq ft) of emulsified asphalt on flat areas. On slopes 8 feet or higher, use 3/8 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 rate and methods not covered.



CONSTRUCTION SPECIFICATIONS:

1. All dikes shall be constructed by earth-moving equipment.
2. All dikes shall have positive drainage to an outlet.
3. Top width may be wider and side slopes may be flatter if desired to facilitate draining for construction purposes.
4. Straw bales should be acquired as needed to utilize a stabilized earth outlet.
5. Earth dikes shall have an outlet that functions with a minimum of erosion. Repairment shall be arranged to a sediment trapping device such as a sediment trap or sediment basin where either the dike channel or the drainage area above the dike are not adequately stabilized.
6. Sediment traps shall be: (A) in accordance with standard specifications for seed and straw mulch or straw mulch if not in seeding season, (B) flow channel as per chart below.

TYPE OF TREATMENT	FLOW CHANNEL STABILIZATION	
	DIKE A	DIKE B
1. 0.5 - 5.0%	Seed or Straw Mulch	Seed or Straw Mulch
2. 5.1 - 8.0%	Seed or Straw Mulch	Seed or Straw Mulch
3. 8.1 - 12.0%	Seed or Straw Mulch	Seed or Straw Mulch
4. 12.1 - 15.0%	Seed or Straw Mulch	Seed or Straw Mulch
5. 15.1 - 20.0%	Seed or Straw Mulch	Seed or Straw Mulch

A dike to be 2' high or recycled concrete equivalent, in a layer at least 3" thick and be pressed into soil with construction equipment.

B. Rip rap to be 4" in a layer at least 3" thick, pressed into soil.

C. Approved equivalent can be substituted for any of the above materials.

7. Periodic inspection and required maintenance must be provided after each rain.

EARTH DIKE DETAIL (E.D.)
NO SCALE

APPROVED
DIVISION OF LAND DEVELOPMENT &
ZONING ADMINISTRATION
HOWARD COUNTY, MARYLAND
DATE 10-6-87

Reviewed for: Howard S.C.D.
Name: James M. Nelson
Signature: James M. Nelson 10-28-87
Date: 10-28-87
U.S. Soil Conservation Service

THIS DEVELOPMENT PLAN IS APPROVED
FOR SOIL EROSION AND SEDIMENT
CONTROL BY THE HOWARD SOIL
CONSERVATION DISTRICT.

Approved: _____ Date: _____

DEVELOPER'S/BUILDER'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 Dept. of Natural Resources Approved Training Program for the Control of Sediment and Erosion before beginning the project. I also authorize periodic on-site inspection by the Howard Soil Conservation District or their authorized agents, as are deemed necessary."

Signature: James M. Nelson 02/87
Date: _____

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: Jeffrey J. Schaub 9/3/87
Date: 9/3/87

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS,
HOWARD COUNTY HEALTH DEPARTMENT
DATE 10-28-87

APPROVED: HOWARD COUNTY OFFICE OF PLANNING & ZONING
DATE 10-5-87

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE,
STORM DRAINAGE SYSTEMS AND PUBLIC ROADS
HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS
DATE 10-28-87

CLARK • FINEFROCK & SACKETT, INC.
ENGINEERS • PLANNERS • SURVEYORS
7135 MINNISTREL WAY • COLUMBIA, MD 21045 • (301) 381-7200 • BALTO • (301) 621-8100 • WASH

DESIGNED	JLS	SCALE	1"=30'
DRAWN	BAL	DRAWING	3 of 8
CHECKED	JLS	JOB NO	87-003
DATE	August, 1987	FILE NO.	87-003

SEDIMENT & EROSION CONTROL PLAN
LOTS 51, 52, 93, 94, 198-100
COLUMBIA
VILLAGE OF HICKORY RIDGE
SECT. 4, AREA 1
5TH ELECTION DISTRICT
HOWARD COUNTY, MARYLAND
FOR: Consolidated Home Builders Inc.
8950 Route 108
Columbia Maryland 21045