

**LEGEND**

- 1. Contour Interval
- 2. Existing Contour
- 3. Proposed Contour
- 4. Spot Elevation
- 5. Direction of Drainage
- 6. 2' x 4' Basement
- 7. Trees to be saved
- 8. 1' x 1' x 1' x 1'

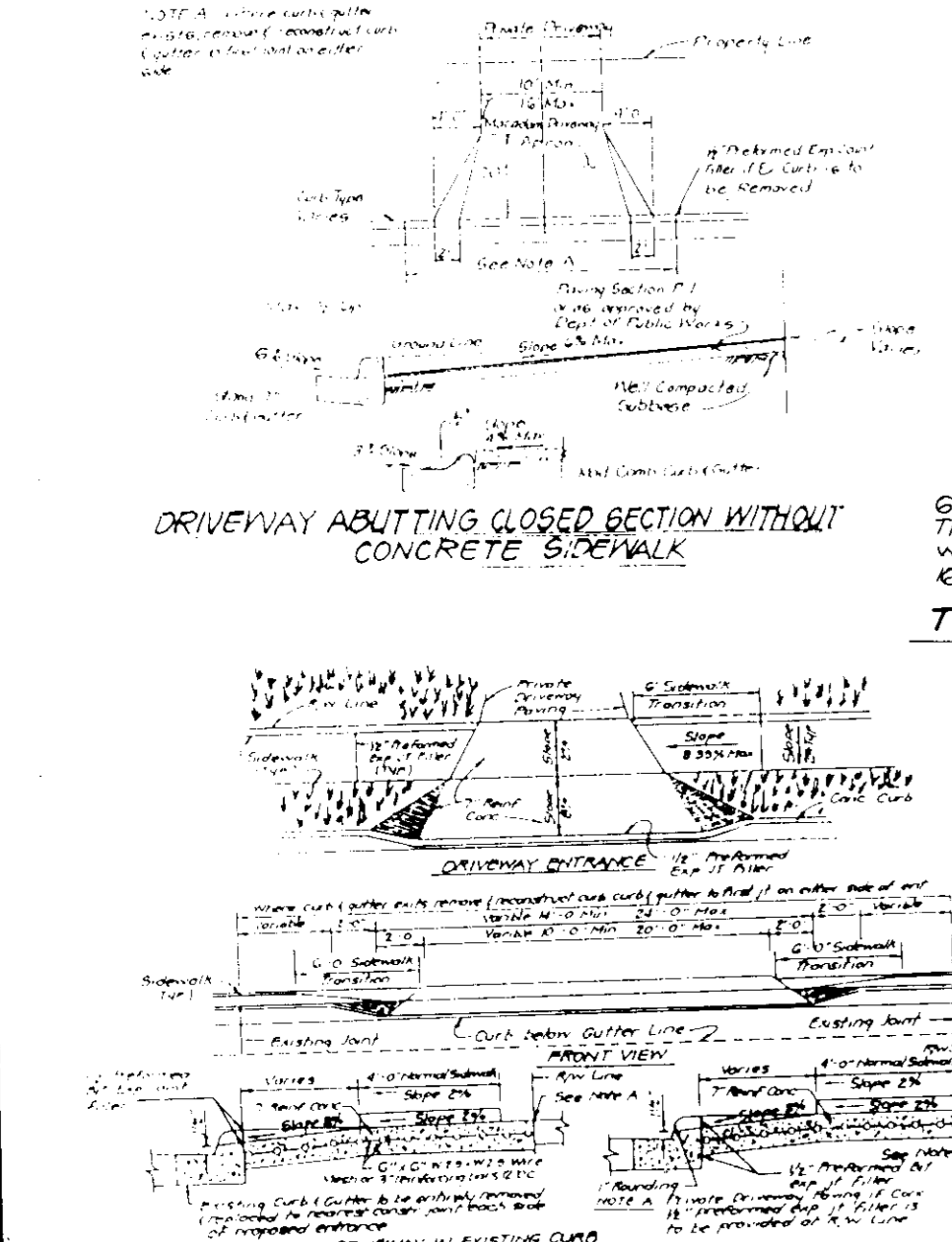
**VICINITY MAP**

Scale 1"=1200'

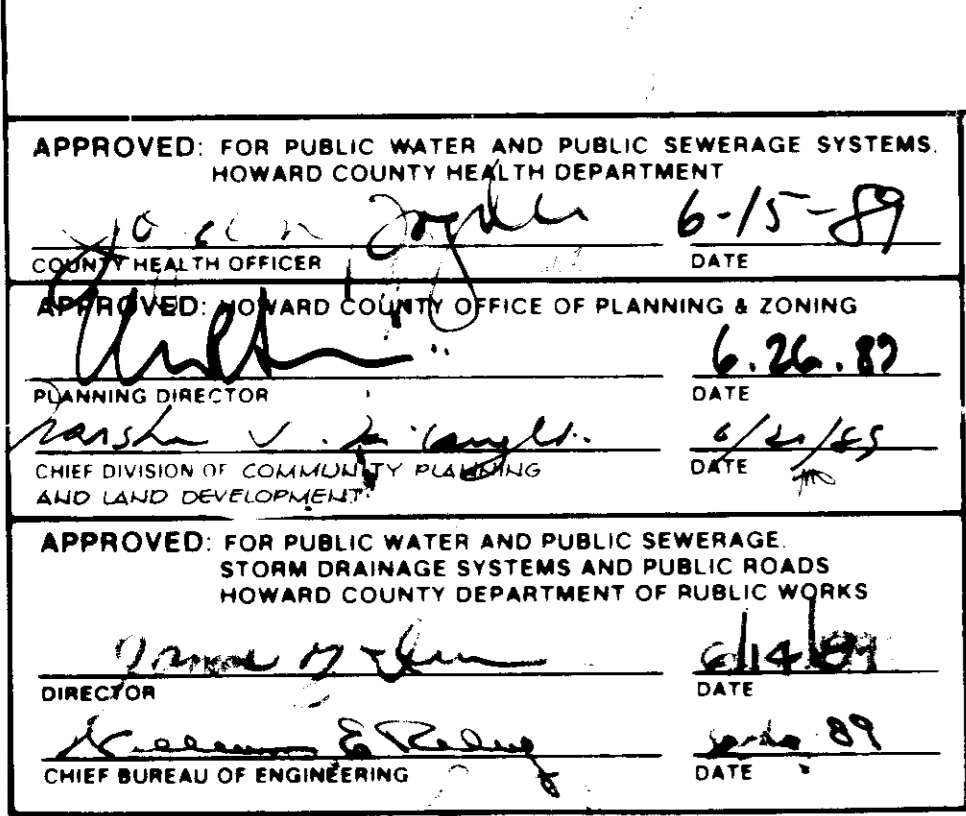
MAPLEWOOD SECTION THREE 'B' TO 'D' 19

**GENERAL NOTES**

1. The land included in this plan is shown as being owned by...
2. All boundaries shown hereon are based on the Maryland State...
3. All easements shown hereon are based on the Maryland State...
4. All easements shown hereon are based on the Maryland State...
5. Any easement to County owned rights of way shall be subject to...
6. The developer is to provide for the installation of...
7. The number of lots is 16 lots.
8. The total area is 6.000 AC.
9. The total area is 6.000 AC.
10. The total area is 6.000 AC.
11. The total area is 6.000 AC.
12. The total area is 6.000 AC.
13. The total area is 6.000 AC.
14. The total area is 6.000 AC.
15. The total area is 6.000 AC.
16. The total area is 6.000 AC.



**TYPICAL HOUSES**  
Scale: 1"=30'



Lot No	Total Lot Area	AREA OF FLOODPLAIN	PIPESTEM	PROPOSED 2% SLOPE	Remaining Lot Area (Existing)
37	23,754 #	0	4,350	0	19,404 #
38	16,812 #	0	2,804	0	14,008 #
42	15,577 #	0	1,542	0	14,035 #
43	19,788 #	0	1,779	0	18,009 #
46	15,308 #	0	1,133	397	13,778 #
47	20,314 #	4,456	0	1,782	14,076 #
48	22,804 #	0	0	7,411	15,393 #
49	23,204 #	0	1,172	1,715	20,317 #
50	20,110 #	0	1,820	0	18,290 #

LOT	STREET ADDRESS
35	10180 FROST WAY
36	10104 SPRING THAW COURT
37	10108
38	10112
39	10116
40	10121
41	10117
42	10113
43	10109
44	10105
45	10132 FROST WAY
46	10136
47	10140
48	10139
49	10135
50	10131
52	10123

Subdivision Name	Block No	Zone	Tax Map No	Elec Dist	Commuter
MAPLE FOREST	8	R-20	17	2	6021

**CLARK • FINEROCK & SACKETT, INC.**  
ENGINEERS • PLANNERS • SURVEYORS

**SITE DEVELOPMENT PLAN**  
LOTS: 36 THRU 50 & 52  
MAPLE FOREST  
SECTION 1  
PARCELS 208, 405 & PO. PARCEL 11, 17 & 19  
2ND ELECTION DISTRICT  
HOWARD COUNTY, MARYLAND

DESIGNED: JME  
DRAWN: PER EAL  
CHECKED: JME  
DATE: 3-16-89

SCALE: 1"=30'  
DRAWING: 1 of 3  
JOB NO: 88-082  
FILE NO: 88-082X

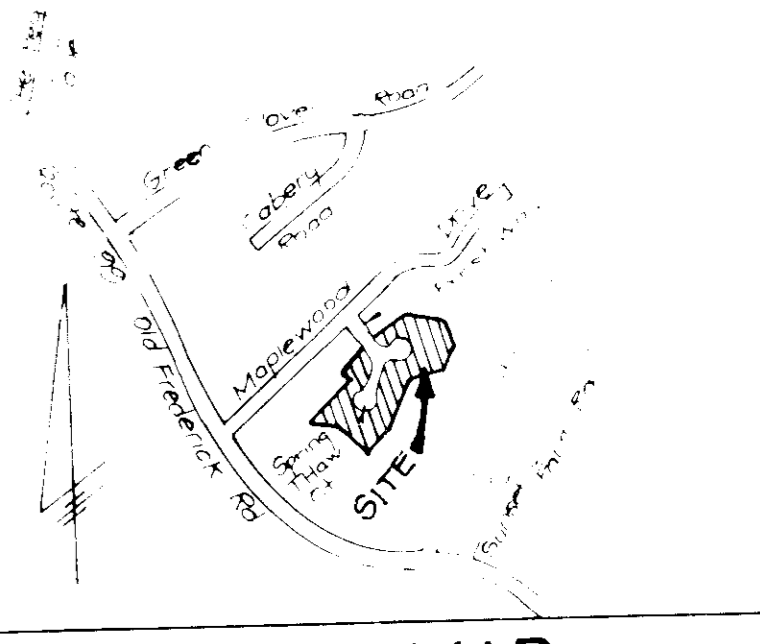
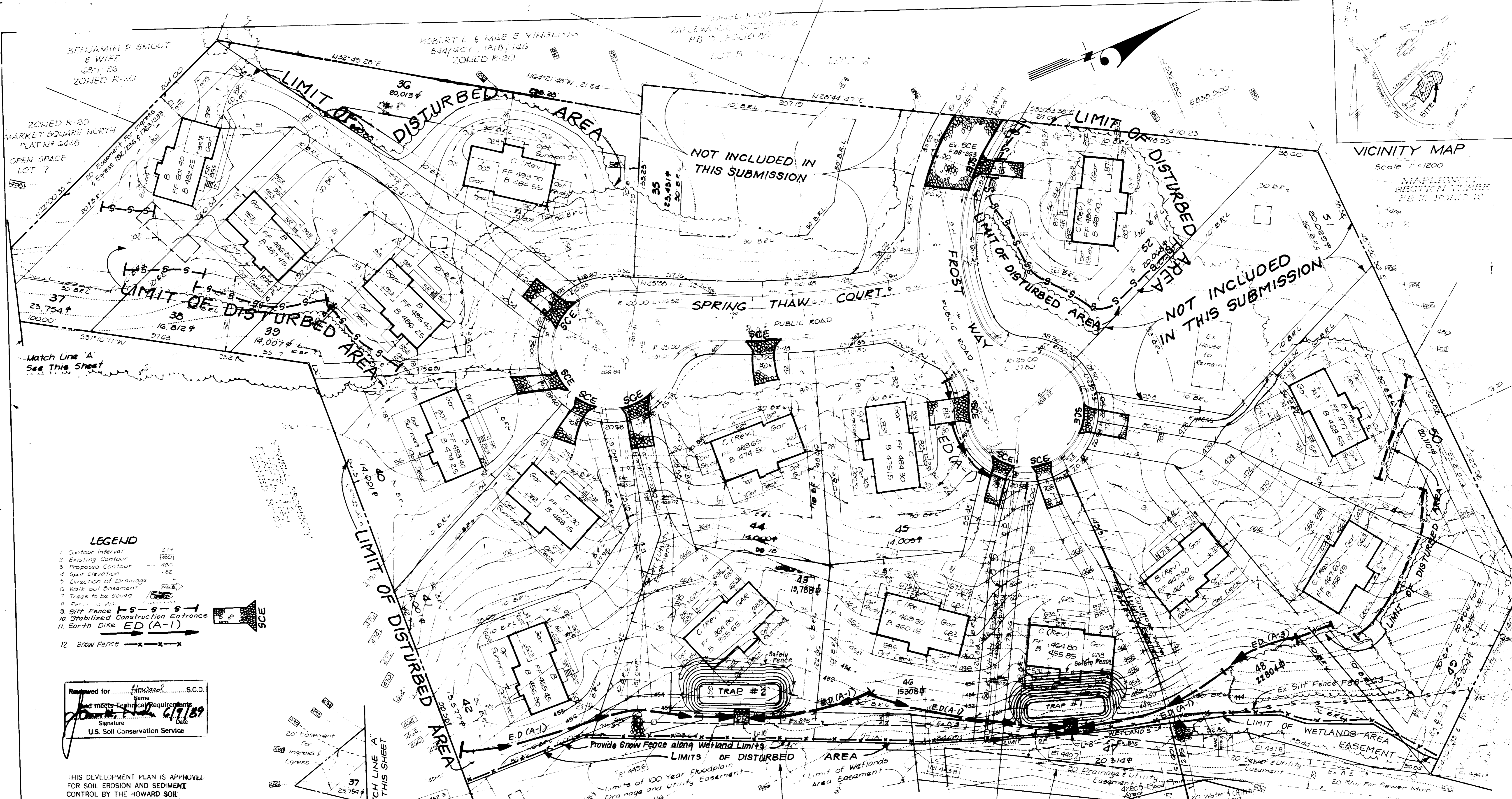
SDP-89-179

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS  
HOWARD COUNTY HEALTH DEPARTMENT

APPROVED: HOWARD COUNTY OFFICE OF PLANNING & ZONING

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE, STORM DRAINAGE SYSTEMS AND PUBLIC ROADS  
HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS

4-13-89



- LEGEND**
- 1 Contour Interval
  - 2 Existing Contour
  - 3 Proposed Contour
  - 4 Spot Elevation
  - 5 Direction of Drainage
  - 6 Walk out Basement
  - 7 Traps to be saved
  - 8 Earth Dike
  - 9 Silt Fence
  - 10 Stabilized Construction Entrance
  - 11 Earth Dike ED (A-1)
  - 12 Snow Fence

Reviewed for: *Howard* S.C.D.  
 Name: *Howard*  
 and meets Technical Requirements  
 Date: *6/9/89*  
 Signature: *[Signature]*  
 U.S. Soil Conservation Service

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

Approved: *[Signature]* Date: *6/9/89*

APPROVED FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS  
 HOWARD COUNTY HEALTH DEPARTMENT  
 COUNTY HEALTH OFFICER: *[Signature]* DATE: *6/11-89*  
 APPROVED HOWARD COUNTY OFFICE OF PLANNING & ZONING  
 PLANNING DIRECTOR: *[Signature]* DATE: *6-26-89*  
 CHIEF DIVISION OF COMMUNITY PLANNING AND LAND DEVELOPMENT  
 APPROVED FOR PUBLIC WATER AND PUBLIC SEWERAGE STORM DRAINAGE SYSTEMS AND PUBLIC ROADS  
 HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS  
 DIRECTOR: *[Signature]* DATE: *6-13-89*  
 CHIEF BUREAU OF ENGINEERING

4-13-89

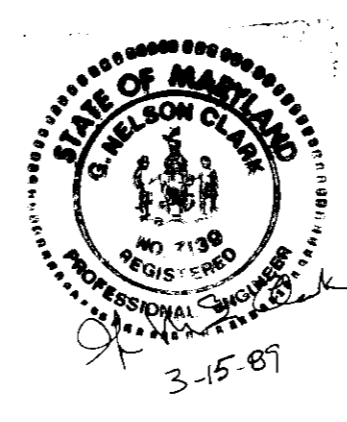
**DEVELOPER'S/BUILDERS CERTIFICATE**

"I/We certify that all development and construction will be done according to this plan of site design and for erosion and sediment control and that all steps possible to ensure compliance in the construction project will be taken. I/We also certify that the Department of Natural Resources Approval of the Stormwater Management 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 of Developer/Builder: *[Signature]* Date: *6-16-89*

TRAP #2 80BT (ST.I)  
 D.A. = 2.4 Acres  
 Storage Provided = 4320 cf  
 Storage Required = 4320 cf  
 Depth = 4'  
 Top of Stone Elev = 448.0  
 Bottom Elev = 443.0  
 Clean Out Elev = 445.0  
 Bottom Dimensions = 56'x14'  
 1:1 Side Slopes  
 L = 10'

Note: Stabilize slopes of 4:1 or steeper within 7 days of grading and each time of re-disturbance, using permanent stabilization techniques.



TRAP #1 80BT (ST.I)  
 D.A. = 1.9 Acres  
 Storage Provided = 3420 cf  
 Storage Required = 3420 cf  
 Depth = 4'  
 Top of Stone Elev = 443.0  
 Bottom Elev = 438.0  
 Clean Out Elev = 440.0  
 Bottom Dimensions 53'x11'  
 1:1 Side Slopes  
 L = 8'

**PLANNERS 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: *[Signature]* Date: *3-15-89*  
 G. Nelson Clark

Subdiv. Name	MAPLE FOREST	Section	1 & 2	Block	38	Lot	50 & 52
Plot No.	8409	Block No.	B	Zone	R-20	Elev. Cont.	2
Water Code	H03	Sever. Code	5758200				6021

**CLARK • FINEROCK & SACKETT, INC.**  
 ENGINEERS • PLANNERS • SURVEYORS

**SEDIMENT & EROSION CONTROL PLAN**

DESIGNED: *[Signature]* SCALE: 1" = 20'

DRAWN: *[Signature]* DRAWING: 2 OF 3

CHECKED: *[Signature]* JOB NO.: 88-006

DATE: 3-14-89

SECTION 1  
 PARCELS 208, 405 & PO. PARCEL 11, 17 & 19  
 240 ELECTION DISTRICT  
 HOWARD COUNTY, MARYLAND

For: *[Signature]*  
 881 Homes Limited Partnership  
 7155 Minstral Way Ste 301  
 Columbia, Maryland 21045

FILE NO.: 88-006  
 DATE: 3-14-89

SDP-89-174

**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 acre dolomitic limestone (92 lbs/1000 sq 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 urea-former 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 (.05 lbs/1000 sq ft) of sweeping 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 tons/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.

**Inspection:** 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.

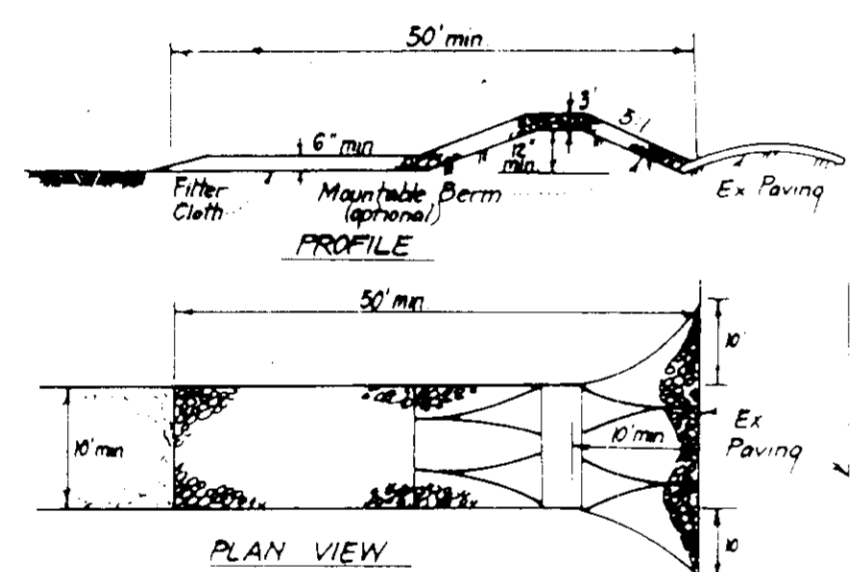
**Seedbed Preparation:** Loosen upper three inches of soil by raking, disking or other acceptable means before seeding, if not previously loosened.

**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 November 15, seed with 25 bushel per acre of annual ryegrass (3.2 lbs/1000 sq ft). For the period May 1 thru August 14, seed with 3 lbs per acre of sweeping lovegrass (.07 lbs/1000 sq ft). For the period November 16 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 sod.

**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 gal per acre (5 gal/1000 sq ft) of emulsified asphalt on flat areas. On slopes 8 ft 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 rate and methods not covered.



**CONSTRUCTION SPECIFICATIONS**

1. Stone size - Use 2" stone or equivalent in recycled concrete equivalent.
2. Length - As required, but not less than 50 feet, except on single residence lot where a 30 foot minimum 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 ingress or egress occurs.
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 entrances shall be used across the entrance. If paving is impractical, a mounded berm with 5:1 slopes will be permitted.
7. Maintenance - The entrance shall be maintained in a condition which will prevent trapping or flowing of sediment into public rights-of-way. This may require periodic top dressing with additional stone as construction advances and repair and/or cleanup of any measures used to trap sediment. All sediment spilled, dropped, washed or tracked onto public rights-of-way must be removed immediately.
8. Washing - Wheels shall be cleaned to remove sediment prior to entrance onto public rights-of-way. When washing is required, it shall be done on an area stabilized with stone and which drains into an approved sediment trapping device.
9. Periodic inspection and repair/maintenance shall be provided as required.

STABILIZED CONSTRUCTION ENTRANCE SEE NO SCALE

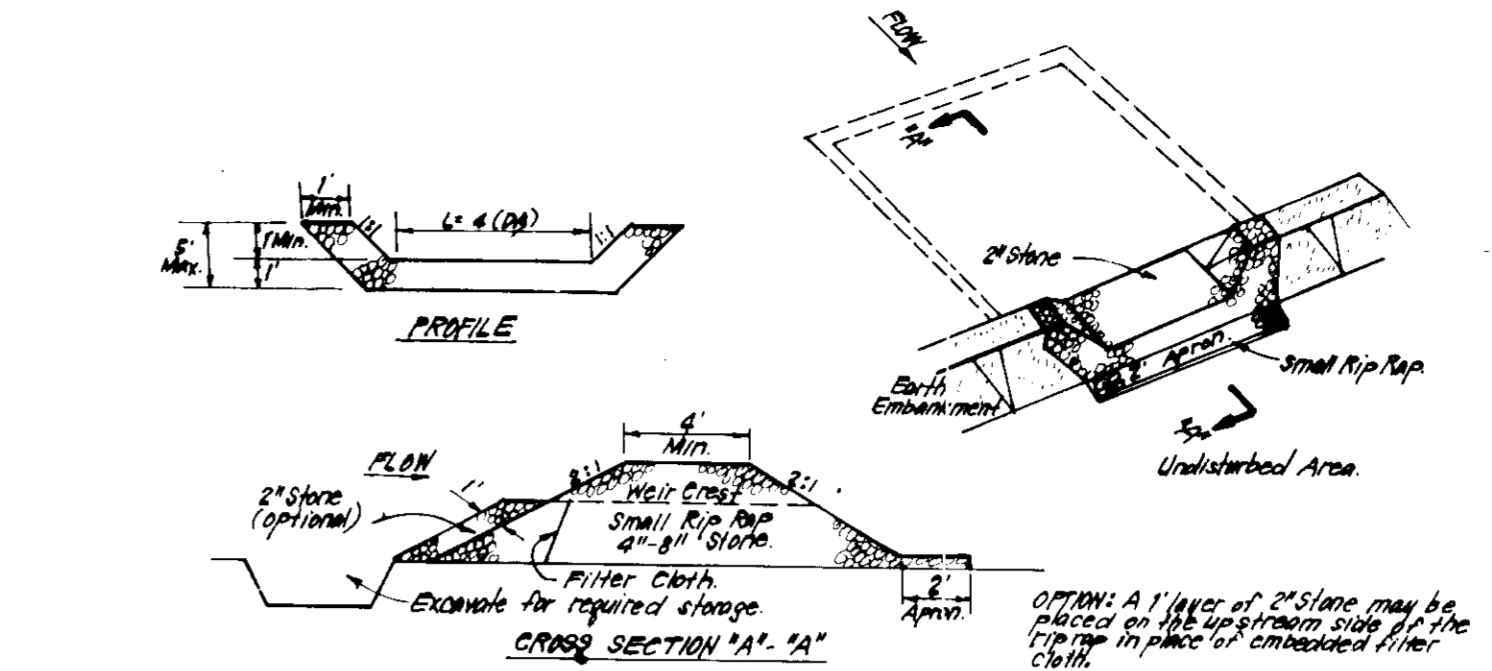
**SEDIMENT CONTROL NOTES**

1. A minimum of 24 hours notice shall be given to the Board of Health, Department of Inspection and Permitting prior to the start of any construction (1992-1993).
2. All vegetation and structural practices are to be installed according to the provisions of this plan and must be constructed in accordance with the 1983 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL.
3. Following initial soil disturbance or redisturbance, permanent or temporary stabilization shall be completed within 72 calendar days for all perimeter sediment control structures, dikes, perimeter slopes and all slopes greater than 11:1. It is days as on all other disturbed or graded areas on the project site.
4. All sediment traps/basins shown must be fenced and warning posted around their perimeter in accordance with Vol. 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. 31) sod (Sec. 32), temporary seeding (Sec. 30) and mulching (Sec. 33). 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 Area Data:  
 Total Area of Site: 6.61 Acres  
 Area Disturbed: 2.31 Acres  
 Area to be reseeded or paved: 1.46 Acres  
 Area to be vegetatively stabilized: 0.85 Acres  
 Total Dist: 33.283 Acres  
 Total Fill: 28,480 cu. yds.  
 Offsite waste/borrow area: None N/A
8. Any sediment control practice which is disturbed by grading activity for placement of utilities must be repaired on the same day of disturbance.
9. Additional sediment control must be provided, if deemed necessary by the Howard County Sediment Control 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 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. If houses are to be constructed on a "basin" basis, at random, single lot sediment control is small below areas to 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 into dikes/silt fence traps 635 T.F.

**CONSTRUCTION SEQUENCE:**

- A. Obtain Grading Permit and Install Sediment and Erosion Control Devices and Stabilize. *Install silt fence along wetlands.*
- B. Excavate for foundations and Rough Grade & temporarily stabilize.
- C. Construct Structures, Sidewalks and Driveways.
- D. Final Grade and stabilize in accordance with Stds. & Specs.
- E. Upon approval of the sediment control inspector, remove sediment and erosion controls and stabilize.

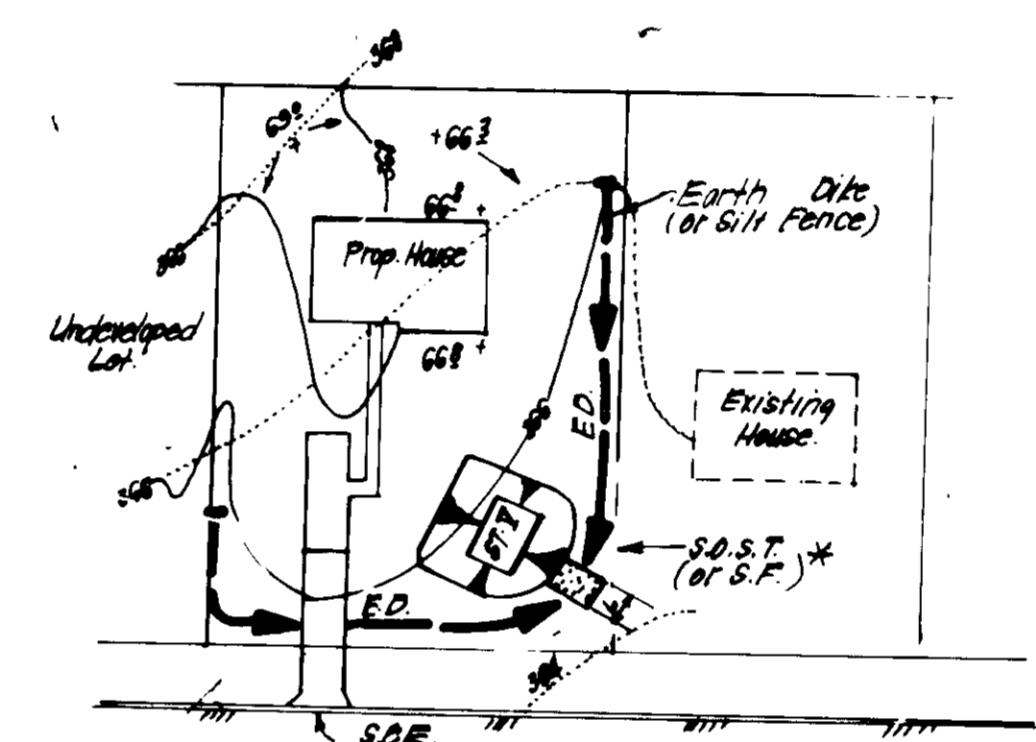
\* Delay construction on Lots 43 & 47 until respective traps have been removed.



**CONSTRUCTION SPECIFICATIONS:**

1. Area under embankment shall be cleared, grubbed and stripped of any vegetation and root mat. The area shall be cleared.
2. The fill material for the embankment shall be free of roots and other woody vegetation as well as weed seed, stones, rocks, organic material or other objectionable material. The embankment shall be compacted.
3. All cut and fill slopes shall be 3:1 or flatter.
4. The stone used in the outlet shall be small rip rap 4" - 8" along with 1" thickness of 2" aggregate placed on the up-grade side on the small rip rap. A 2' diameter silt fence cloth in the rip rap.
5. Sediment shall be removed and trap repaired in the event of overflows when the outlet has accumulated to 1/2 the design depth of the trap.
6. The structure shall be maintained in a manner that erosion and water pollution is minimized.
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.

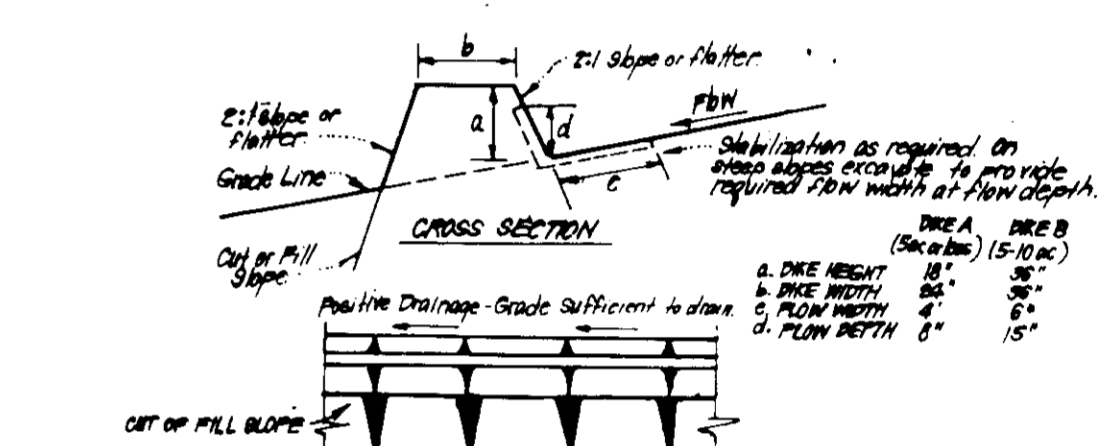
**STONE OUTLET SEDIMENT TRAP (S.O.S.T.) ST.V.**  
NO SCALE



\* 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.

TYPE OF TRENCHMENT	CHANNEL GRADE	DISE A	DISE B
1	1.5 - 3.0%	Seed & Straw Mulch	Seed or Straw Mulch
2	3.1 - 5.0%	Seed & Straw Mulch	Seed with or Excelsior, Sod, 2" Stone
3	5.1 - 8.0%	Seed with or Sod, Stone	Seed with or Excelsior, Sod, 2" Stone
4	8.1 - 15.0%	Seed with or Sod, Stone	Seed with or Excelsior, Sod, 2" Stone

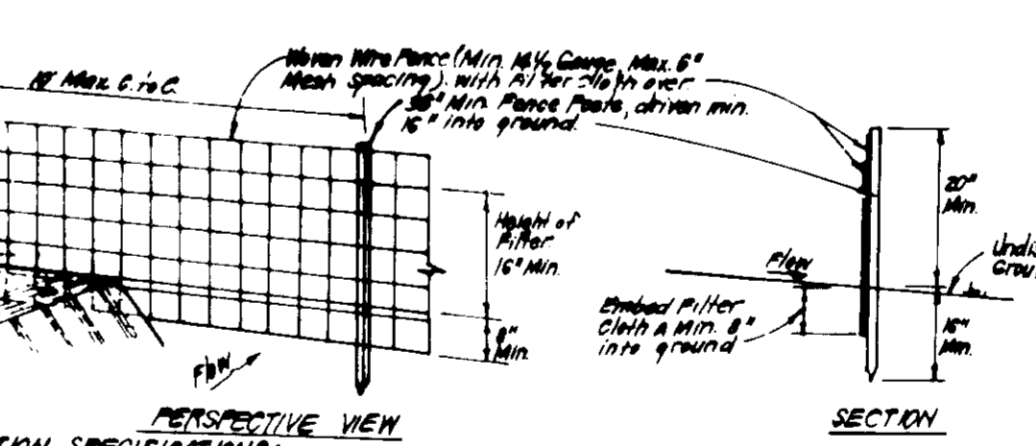
**SINGLE LOT SEDIMENT CONTROL PLAN**  
NO SCALE



**CONSTRUCTION SPECIFICATIONS:**

1. All dikes shall be constructed by earth moving equipment.
2. All dikes shall have positive drainage to an outlet channel by construction of a pipe.
3. Top width may be wider and side slopes may be flatter if desired to facilitate clearing by construction equipment.
4. Final location should be adjusted as needed to utilize a stabilized side ditch.
5. Earth dikes shall have an outlet that functions with a minimum of erosion. Runoff shall be conveyed to a sediment trapping device such as a sediment trap or sediment basin where either the dike channel or the drainage area, please the dike area not adequately stabilized.
6. Sediment 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.

**EARTH DIKE DETAIL (E.D.)**  
NO SCALE



**CONSTRUCTION SPECIFICATIONS:**

1. Silt fence fabric to be fastened securely to fence posts with wire ties or staples.
2. Filter cloth to be installed securely to prevent water from passing through. It shall be secured every 6' in top and end sections.
3. Within 2' sections of filter cloth, adjacent sections shall be overlapped by 1' and stapled.
4. Maintenance shall be performed as needed and material removed when it begins to develop in silt fence.

**SILT FENCE DETAIL (S)**  
NO SCALE

4-13-89

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS, HOWARD COUNTY HEALTH DEPARTMENT  
 County Health Officer: [Signature] DATE: 6-15-89

APPROVED: HOWARD COUNTY OFFICE OF PLANNING & ZONING  
 Planning Director: [Signature] DATE: 6-26-89

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE, STORM DRAINAGE SYSTEMS AND PUBLIC ROADS, HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS  
 Director: [Signature] DATE: 6-13-89

Reviewed for HOWARD...S.C.D.  
 Name: [Signature]  
 Signature: [Signature] DATE: 6-9-89  
 U.S. Soil Conservation Service

THIS DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT  
 Approved: [Signature] DATE: 6/13/89

**DEVELOPER'S CERTIFICATE**

"I/We certify that all development and construction will be done according to this plan of development and plans for erosion and sediment control and that all responsible persons involved in the construction project will have a Certificate of Attendance at a Dept. of Natural Resource Approval Training Program at the State of Maryland Soil Erosion before beginning the project and that a periodic on-site inspection by the Howard County Department of Public Works or their authorized agents, as so designated necessary."

Signature of Developer/Builder: [Signature] DATE: 3-16-89



**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.

G. Nelson Clark DATE: 3-15-89

**CLARK • FINEFROCK & SACKETT, INC.**  
 ENGINEERS • PLANNERS • SURVEYORS  
 7135 MINSTREL WAY • COLUMBIA, MD 21045 • (301) 381-7500 • BALTO • (301) 621-4444 • WASH

DESIGNED	SCALE
KIWM	1" = 30'
DRAWN	DRAWING
PER BAL BAR	3 of 3
CHECKED	JOB NO.
KIWM	88-086
DATE	FILE NO.
3-14-89	88-086-01

**SEDIMENT & EROSION CONTROL PLAN**  
 LOTS: 36 thru 50 & 52  
**MAPLE FOREST**  
 SECTION 1  
 PARCELS 208, 405 & PD PARCEL 11, 17 & 19  
 2ND ELECTION DISTRICT  
 HOWARD COUNTY, MARYLAND  
 For: B&I Homes Limited Partnership  
 7135 Minstrel Way, Ste 301  
 Columbia, Md 21045  
**SDP-89-174**