

LOT No.	STREET ADDRESS
32	7101 Black Rock Court
33	7105 "
34	7102 "
35	7113 "
36	7112 "
37	7108 "
38	7104 "
39	7102 "
40	7115 Willow Brook Way
41	7119 "
42	7123 "
43	7127 "
44	7131 "
45	7135 "
46	7130 "
47	7122 "

Brantly Development Corp. hereby authorizes Diversified Housing to utilize the existing sediment control measures shown on plan F-85-103 for sediment control for this project. If Brantly Development Corporation removes the existing sediment and erosion control measures prior to completion of the Site Development Plan, a revised Sediment and Erosion Control Plan will be required.

Hugh F. Cole
Date 3/19/86

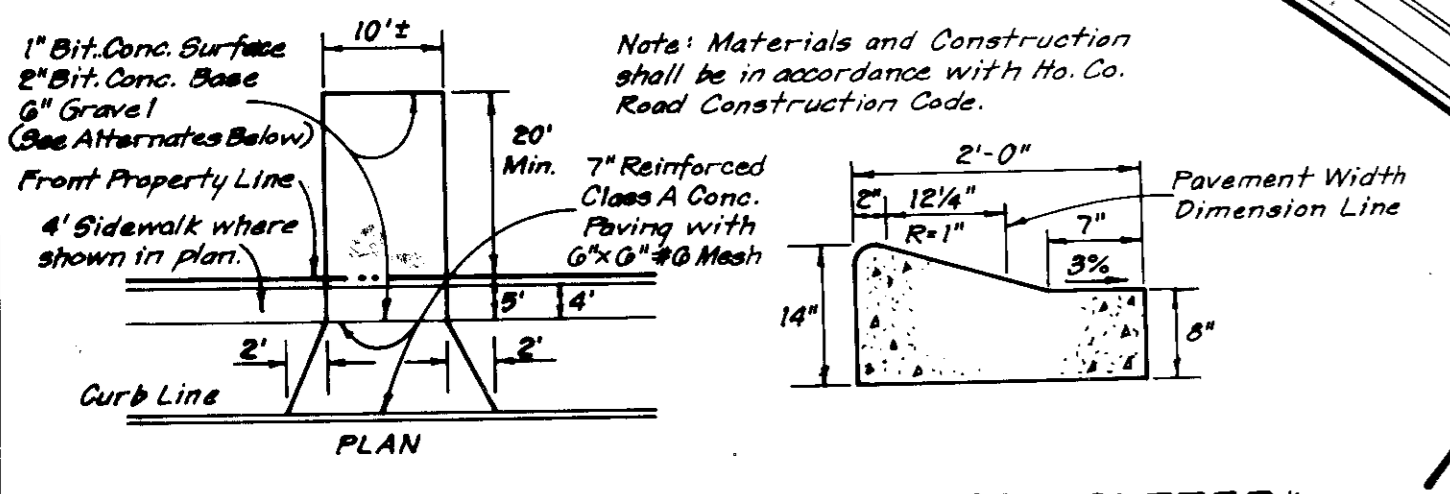
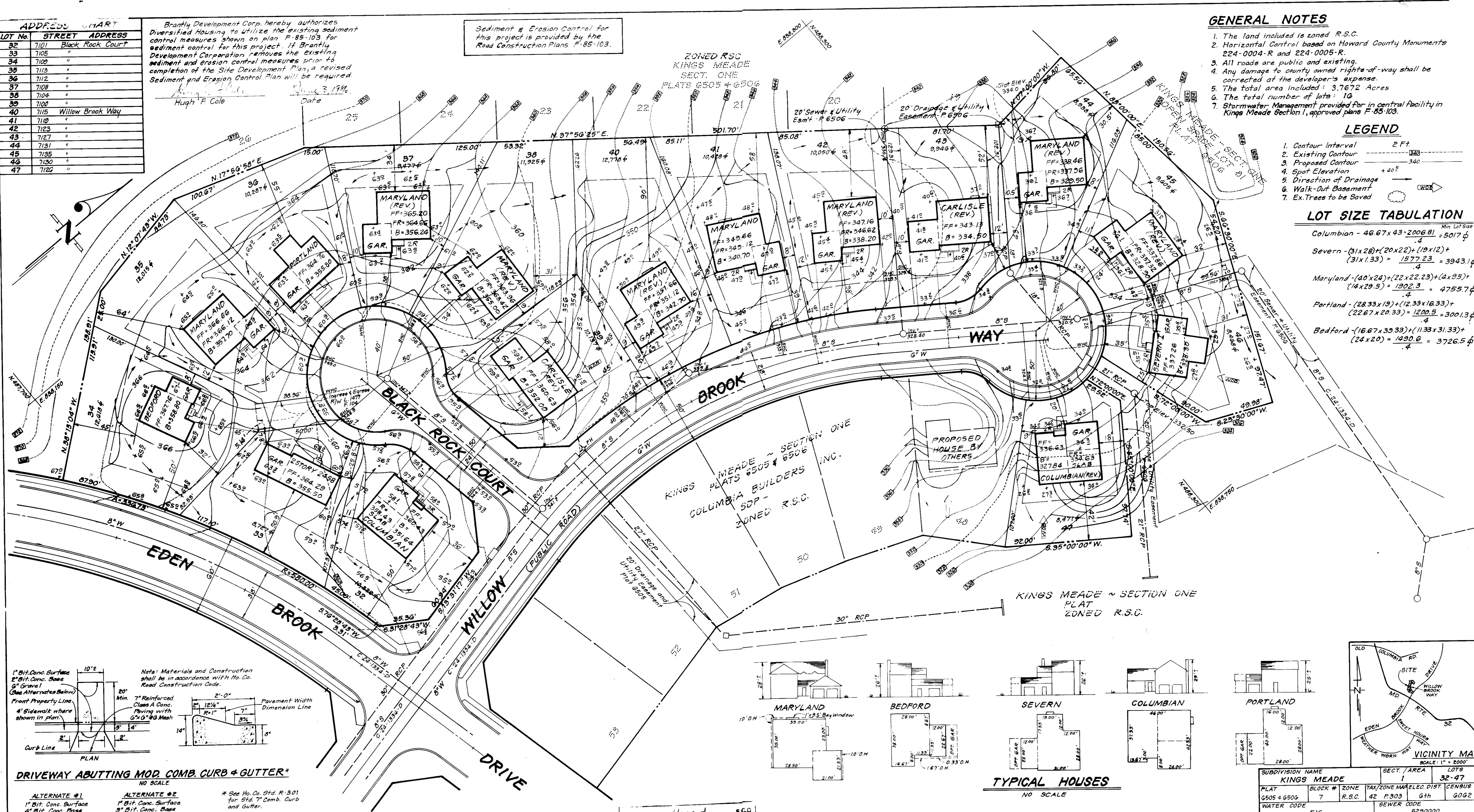
Sediment & Erosion Control for this project is provided by the Road Construction Plans F-85-103.

- GENERAL NOTES**
- The land included is zoned R.S.C.
 - Horizontal Control based on Howard County Monuments 224-0004-R and 224-0005-R.
 - All roads are public and existing.
 - Any damage to county owned rights-of-way shall be corrected at the developer's expense.
 - The total area included: 3.762 Acres
 - The total number of lots: 16
 - Stormwater Management provided for in central facility in Kings Meade Section I, approved plans F-85-103.

- LEGEND**
- Contour Interval 2 Ft
 - Existing Contour 340
 - Proposed Contour 340
 - Spot Elevation + 0.5'
 - Direction of Drainage
 - Walk-Out Basement
 - Ex. Trees to be Saved

LOT SIZE TABULATION

Lot	Dimensions	Area
Columbian	46.67 x 43.2006.81	5017.6
Severn	(31 x 28) + (20 x 22) + (19 x 12) + (31 x 1.33)	1577.23 = 3943.1
Maryland	(40 x 24) + (22 x 22.23) + (4 x 9.5) + (14 x 29.5)	1902.3 = 4755.7
Portland	(28.33 x 19) + (12.33 x 16.33) + (22.67 x 20.33)	1200.5 = 3001.3
Bedford	(16.67 x 33.33) + (11.33 x 31.33) + (24 x 20)	1490.6 = 3726.5

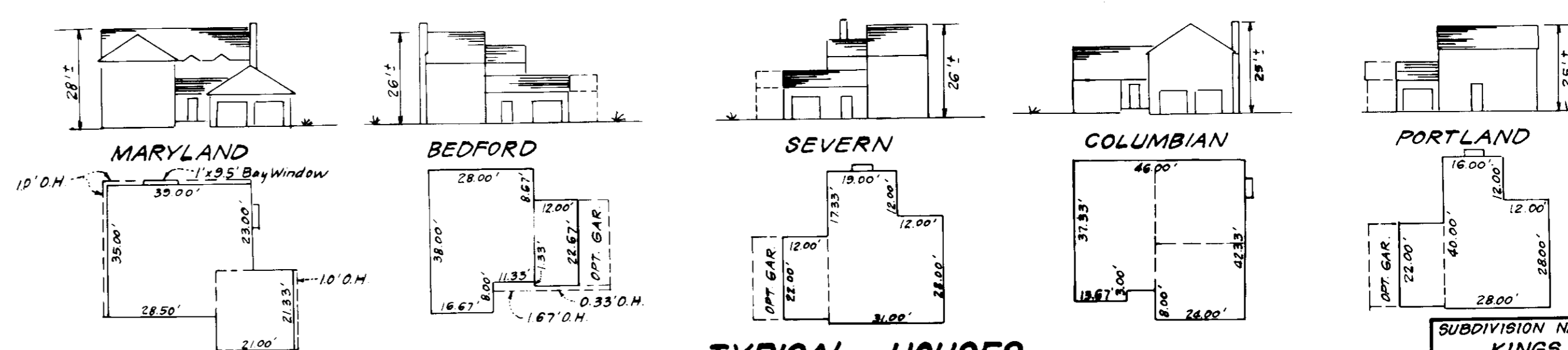


DRIVEWAY ABUTTING MOD. COMB. CURB & GUTTER*
NO SCALE

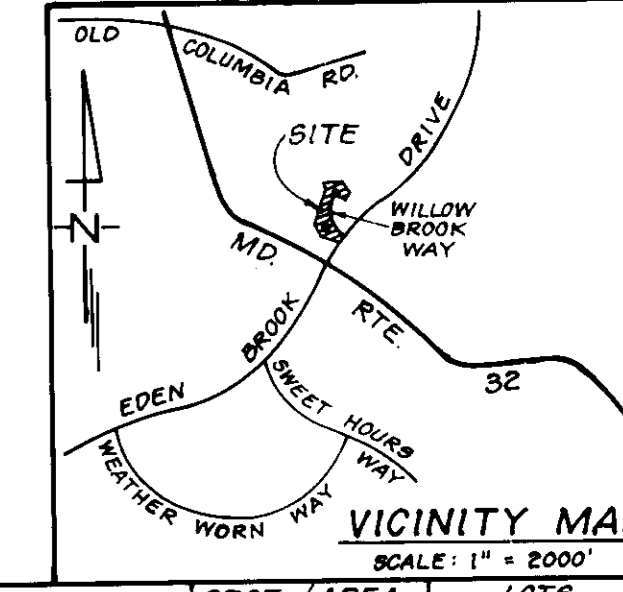
ALTERNATE #1
1" Bit. Conc. Surface
4" Bit. Conc. Base

ALTERNATE #2
1" Bit. Conc. Surface
3" Bit. Conc. Base
3" Gravel

* See Ho. Co. Std. R-301 for Std. 7" Comb. Curb and Gutter.



TYPICAL HOUSES
NO SCALE



VICINITY MAP
SCALE: 1" = 2000'

SUBDIVISION NAME	KINGS MEADE
SECT. / AREA	1 / 32-47
PLAT	6505 & 6506
BLOCK #	7
ZONE	R.S.C.
TAX / ZONE MAP ELEC. DIST.	42 P.303 6th
CENSUS TR.	G082
WATER CODE	E1G
SEWER CODE	5290000

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

James Boyner 6-16-86
COUNTY HEALTH OFFICER DATE

APPROVED: HOWARD COUNTY OFFICE OF PLANNING & ZONING.

William H. ... 6-17-86
PLANNING DIRECTOR DATE

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

Joseph F. ... 6-10-86
DIRECTOR DATE

... 6-10-86
CHIEF BUREAU OF ENGINEERING 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.

G. Nelson Clark 6-3-86
Date

DEVELOPER'S CERTIFICATE

I certify that all development and construction will be done according to the plan and specifications for erosion and sediment control and that all construction will be in accordance with the construction project will have the approval of the Howard Soil Conservation District. I also certify that I have obtained the necessary permits from the Howard Soil Conservation District and the Howard County Department of Public Works and that I have provided for the necessary sediment and erosion control measures as shown on this plan.

Drew Sikorski 6/3/86
Signature of Developer/Builder Date

Reviewed for Howard County S.C.D. Name: *J. Helms* 6-9-86 Date

and meets Technical Requirements for SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT.

Stephen L. ... 6/9/86
Approved Date

CLARK · FINEFROCK & SACKETT
ENGINEERS · PLANNERS · SURVEYORS

11315 LOCKWOOD DRIVE SILVER SPRING, MARYLAND 20904 (301) 593-3400

SITE DEVELOPMENT PLAN
LOTS 32 THRU 47

KINGS MEADE SECTION ONE
6th ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

FOR: CONSOLIDATED HOMES
8950 Route 108
Columbia, Maryland 21044

DATE: 4-22-86

DESIGNED	BAF	SCALE	1" = 30'
DRAWN	VLM	DRAWING	1 of 2
CHECKED	LAI	JOB NO.	86-007
DATE	4-22-86	FILE NO.	86-007

SDP 86-236

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, discing 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 sq ft) and 600 lbs per acre 10-10-10 fertilizer (14 lbs/1000 sq ft) before seeding. Harrow 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. Harrow 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 weeping 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 rotted 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.

Re-seeding: - 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, discing 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 2 1/2 bushels per acre of annual rye (3.2 lbs/1000 sq ft). For the period May 1 thru August 15, seed with 3 lbs per acre of weeping 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 rotted 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.

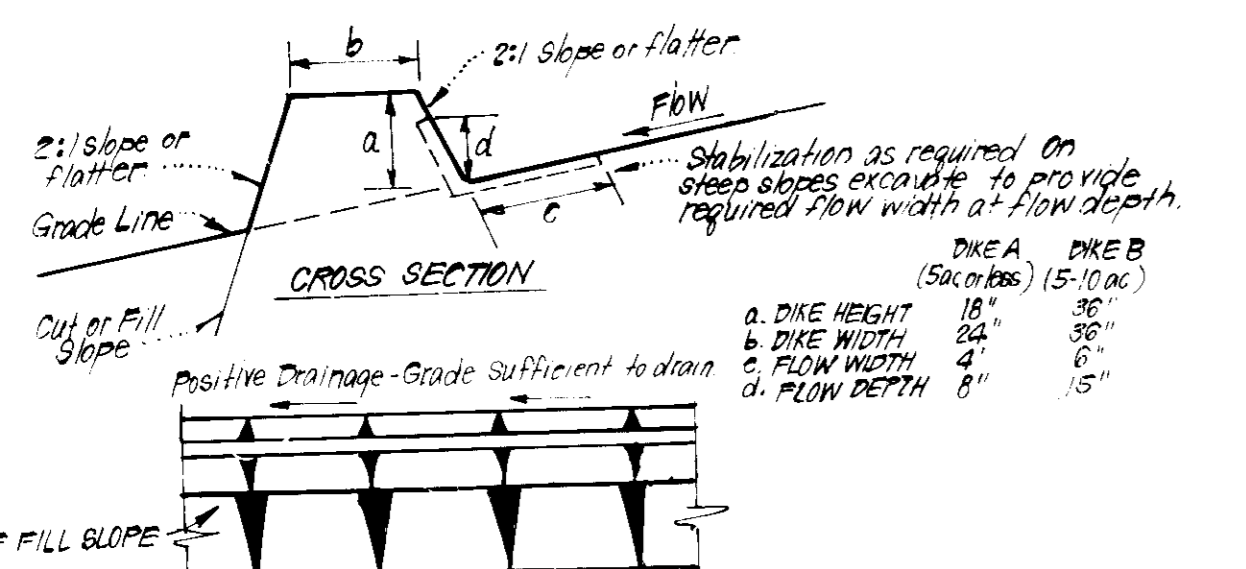
SEDIMENT CONTROL NOTES

- 1) A minimum of 24 hours notice must be given to the Howard County Office of Inspection and Permits 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 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 a 7 calendar days for all perimeter sediment control structures, dikes, perimeter slopes and all slopes greater than 3:1, b) 14 days as to all other disturbed or graded areas on the project site.
- 4) All sediment traps/basins shown must be fenced and warning signs 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 seedings (Sec. 51) sod (Sec. 51), temporary seeding (Sec. 50) and mulching (Sec. 52.) 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	377 Acres
Area Disturbed	356 Acres
Area to be roofed or paved	.084 Acres
Area to be vegetatively stabilized	2.72 Acres
Total Cut	4872 Cu. yds
Total Fill	1811 Cu. yds
Offsite waste/borrow area location	N/A
- 8) Any sediment control practice which is disturbed by grading 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 DPW 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 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).
- 13) The total amount of straw bale dikes/silt fence equals L.F.

CONSTRUCTION SEQUENCE:

CONSTRUCTION SEQUENCE:	No. of Days
A. Obtain Grading Permit and Install Sediment and Erosion Control Devices and Stabilize.	2
B. Excavate for foundations and Rough Grade & Temporarily Stabilize.	30
C. Construct Structures, Sidewalks and Driveways.	250
D. Final Grade and stabilize in accordance with Stds. & Specs.	15
E. Upon approval of the sediment control inspector remove sediment and erosion controls and stabilize.	2



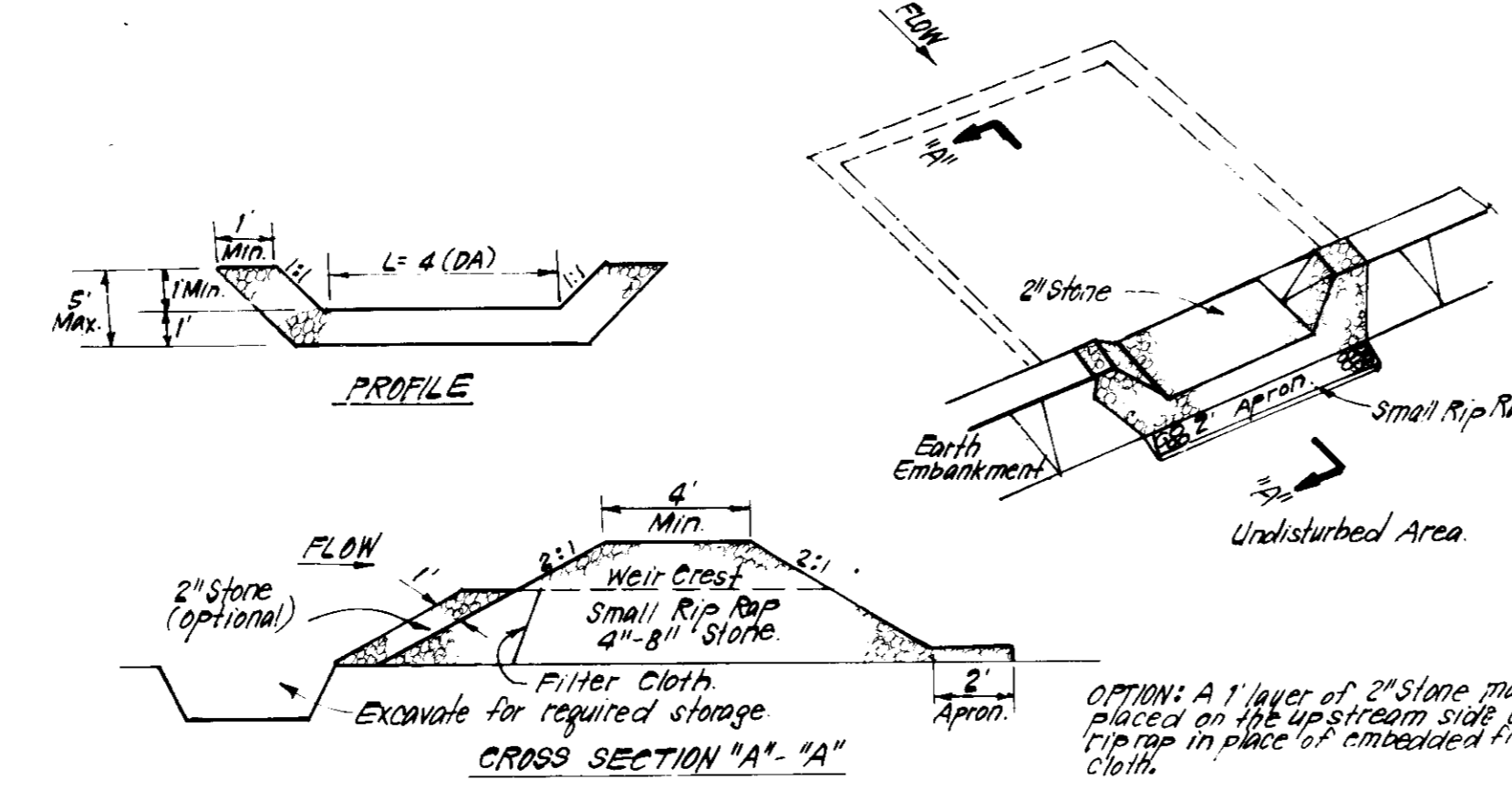
- CONSTRUCTION SPECIFICATIONS:**
1. All dikes shall be compacted by earth-moving equipment.
 2. All dikes shall have positive drainage to an outlet.
 3. Top width may be wider than side slopes may be flatter if desired, to facilitate crossing by construction traffic.
 4. Field location should be adjusted as needed to utilize a stabilized safe outlet.
 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 above the dike are not adequately stabilized.
 6. Stabilization 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.

FLOW CHANNEL STABILIZATION

TYPE OF TREATMENT	CHANNEL GRADE	DIKE A	DIKE B
1	0.5 - 3.0%	Seed & Straw Mulch	Seed or Straw Mulch
2	3.1 - 5.0%	Seed & Straw Mulch	Seed w/straw or Excelsior Sod, 2" Stone
3	5.1 - 8.0%	Seed w/straw or Sod, 2" Stone	Lined Rip Rap 4"-8" Stone
4	8.1 - 20.0%	Lined Rip Rap 4"-8" Stone	Engineering Design

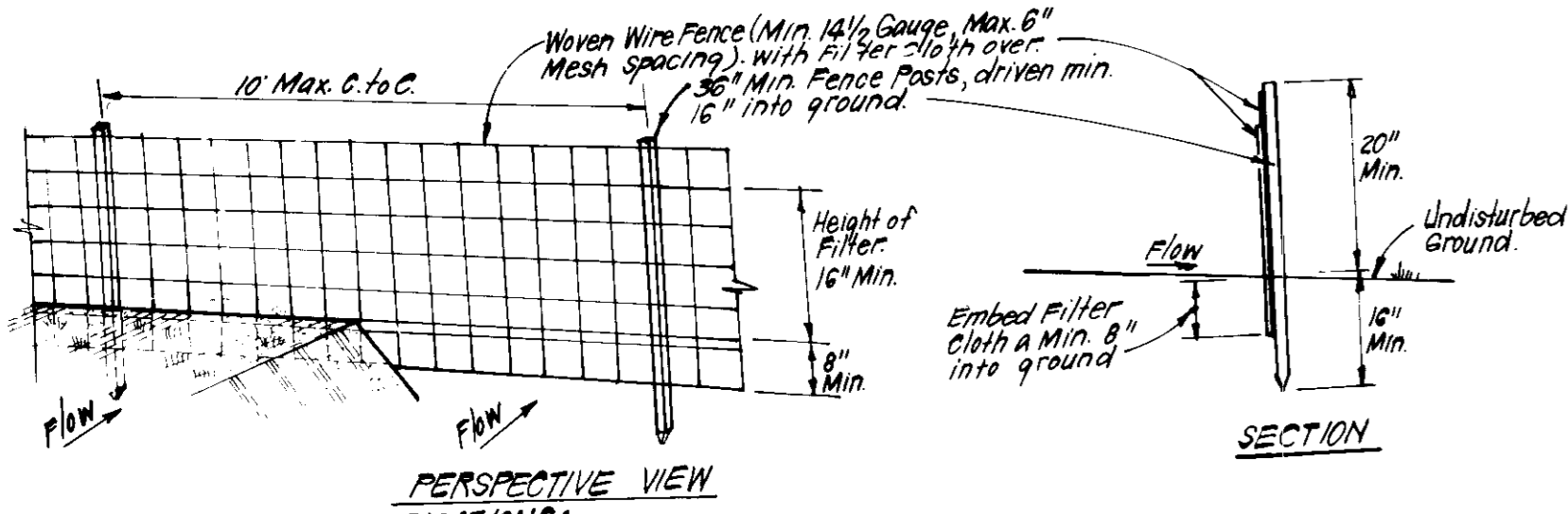
A. Stone to be 2" Stone, or recycled concrete equivalent, in a layer at least 3" thick and be pressed into soil with construction equipment.
 B. Rip Rap to be 4"-8" in a layer at least 8" thick, pressed into soil.
 C. Approved equivalents can be substituted for any of the above materials.
 7. Periodic inspection and Required Maintenance must be provided after each rain.

EARTH DIKE DETAIL (E.D.)
NO SCALE



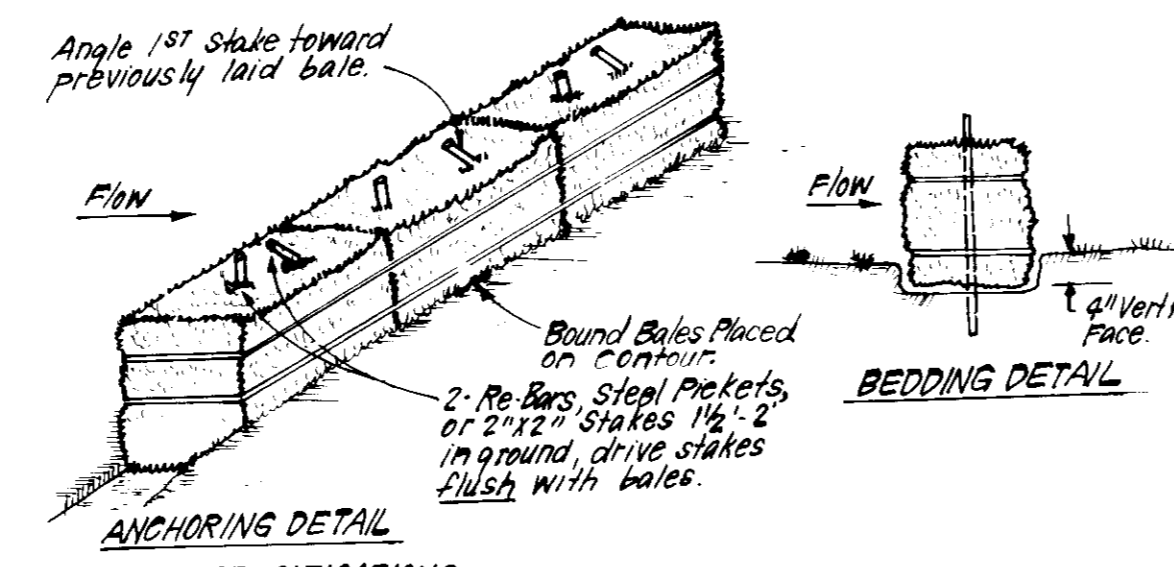
- CONSTRUCTION SPECIFICATIONS:**
1. Area under embankment shall be cleared, grubbed and stripped of any vegetation and root mat. The pool area shall be cleared.
 2. The fill material for the embankment shall be free of roots and other woody vegetation as well as oversized stones, rocks, organic material or other objectionable material. The embankment shall be compacted by traversing with 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 4"-8" along with 1" thickness of 2" aggregate placed on the up-grade side on the small rip rap or embedded filter cloth in the rip rap.
 5. Sediment shall be removed and trap restored 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.

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



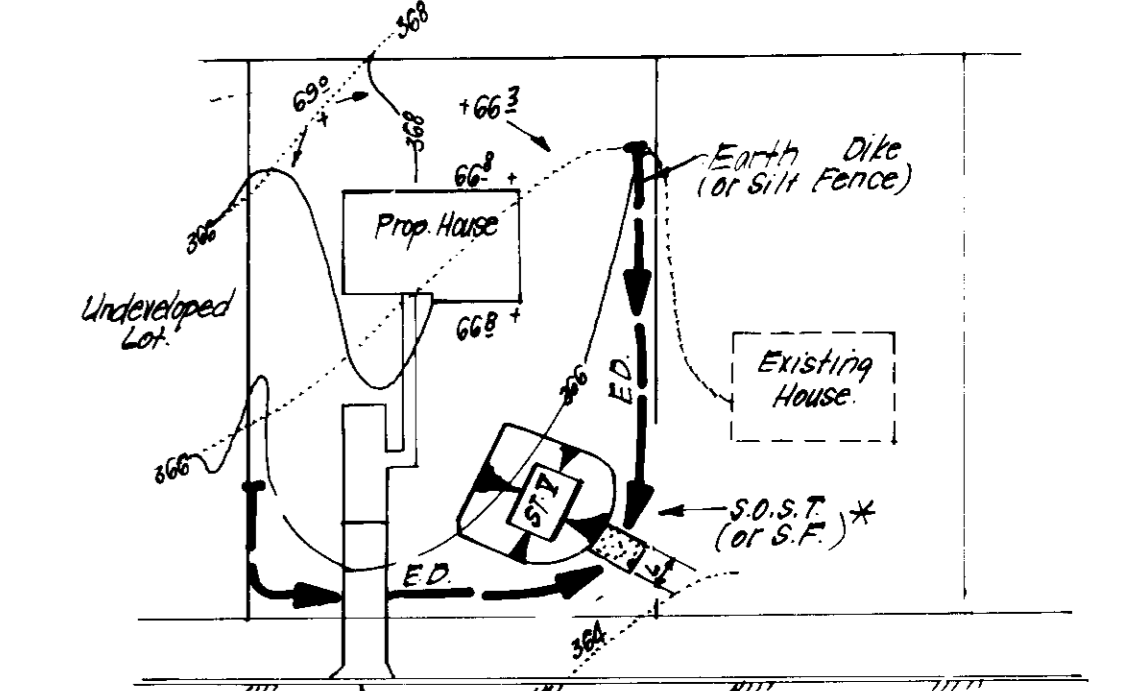
- CONSTRUCTION SPECIFICATIONS:**
1. Woven wire fence to be fastened securely to fence posts with wire ties or staples.
 2. Filter Cloth to be fastened securely to woven wire fence with ties spaced every 24" at top and mid section.
 3. When 2 sections of filter cloth adjoin each other they shall be overlapped by 6" and folded.
 4. Maintenance shall be performed as needed and material removed when "drip" develops in silt fence.
- POSTS: Steel, either Tor-U Type or 2" Hardwood
 FENCE: Woven Wire, 1 1/2 Gauge, 6" Max. Mesh Opening
 FILTER CLOTH: FilterX, Mirafix 100X, Stabilink, T140N or Approv. equiv.
 PREFABRICATED UNIT: Geofab, Envirofence, or Approv. equal

SILT FENCE DETAIL (S)
NO SCALE



- 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.
 2. Each bale shall be embedded in the soil a min. of 4" and placed so the bindings are horizontal.
 3. Bales shall be securely anchored in place by either 2 stakes or rebar driven thru the bale. The 1st stake in each bale shall be driven toward the previously laid bale at an angle to force the bales together. Stakes shall be driven flush with the bale.
 4. Inspection shall be frequent and repair replacement shall be made promptly as needed.
 5. Bales shall be removed when they have served their usefulness so as not to block or impede storm flow or drainage.

STRAW BALE DIKE DETAIL (SBD)
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.

LOT SIZE	VA/C	VA/AC	T AC
Depth	2	3	8
Bal. Length	11	26	26
Bal. Width	11	26	26
Bal. Area	121	676	676

4' to be adjusted in field, but bottom area must be as given or greater

SINGLE LOT SEDIMENT CONTROL PLAN
NO SCALE

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE SYSTEMS, HOWARD COUNTY HEALTH DEPARTMENT
 [Signature] 6-7-86
 COUNTY HEALTH OFFICER

APPROVED: HOWARD COUNTY OFFICE OF PLANNING & ZONING
 [Signature] 6-7-86
 PLANNING DIRECTOR
 CHIEF DIVISION OF LAND DEVELOPMENT AND ZONING ADMINISTRATION

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE, STORM DRAINAGE SYSTEMS AND PUBLIC ROADS, HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS
 [Signature] 6-10-86
 DIRECTOR
 CHIEF BUREAU OF ENGINEERING

APPROVED: DIVISION OF LAND DEVELOPMENT & ZONING ADMINISTRATION, HOWARD COUNTY MARYLAND
 DATE 5-26-86
 [Signature]

DESIGNED BY: [Signature] 4/24/86
 DATE

Reviewed for: HOWARD COUNTY
 Name: [Signature] 6-1-86
 Date
 Signature: [Signature]
 U.S. Soil Conservation Service

DESIGNED BY: [Signature] 4/24/86
 DATE

APPROVED: [Signature] 6/9/86
 Approved
 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] 7-25-86
 G. Nelson Clark
 Date

CLARK • FINEFROCK & SACKETT
 ENGINEERS • PLANNERS • SURVEYORS
 11315 LOCKWOOD DRIVE • SILVER SPRING, MARYLAND 20904 • (301) 593-3400

DESIGNED: BAF
 DRAWN: VLM, LAI
 CHECKED: BAF
 DATE: 4-22-86

SCALE: 1" = 30'
 DRAWING: 2 of 2
 JOB NO.: 86-007
 FILE NO.: 86-007-5E

SITE DEVELOPMENT PLAN
 SEDIMENT & EROSION CONTROL PLAN
 LOTS 32 THRU 47
KINGS MEADE
 SECTION ONE
 6TH ELECTION DISTRICT
 HOWARD COUNTY, MARYLAND

FOR: CONSOLIDATED HOMES
 8950 Route 108
 Columbia, Maryland 21044

SDP-86-236