

LEGEND

Contour Interval 2 ft
 Existing Contour 470
 Proposed Contour 470
 Spot Elevation +703
 Direction of Drainage

Earth Dike A-1
 Straw Bale Dike / Silt Fence

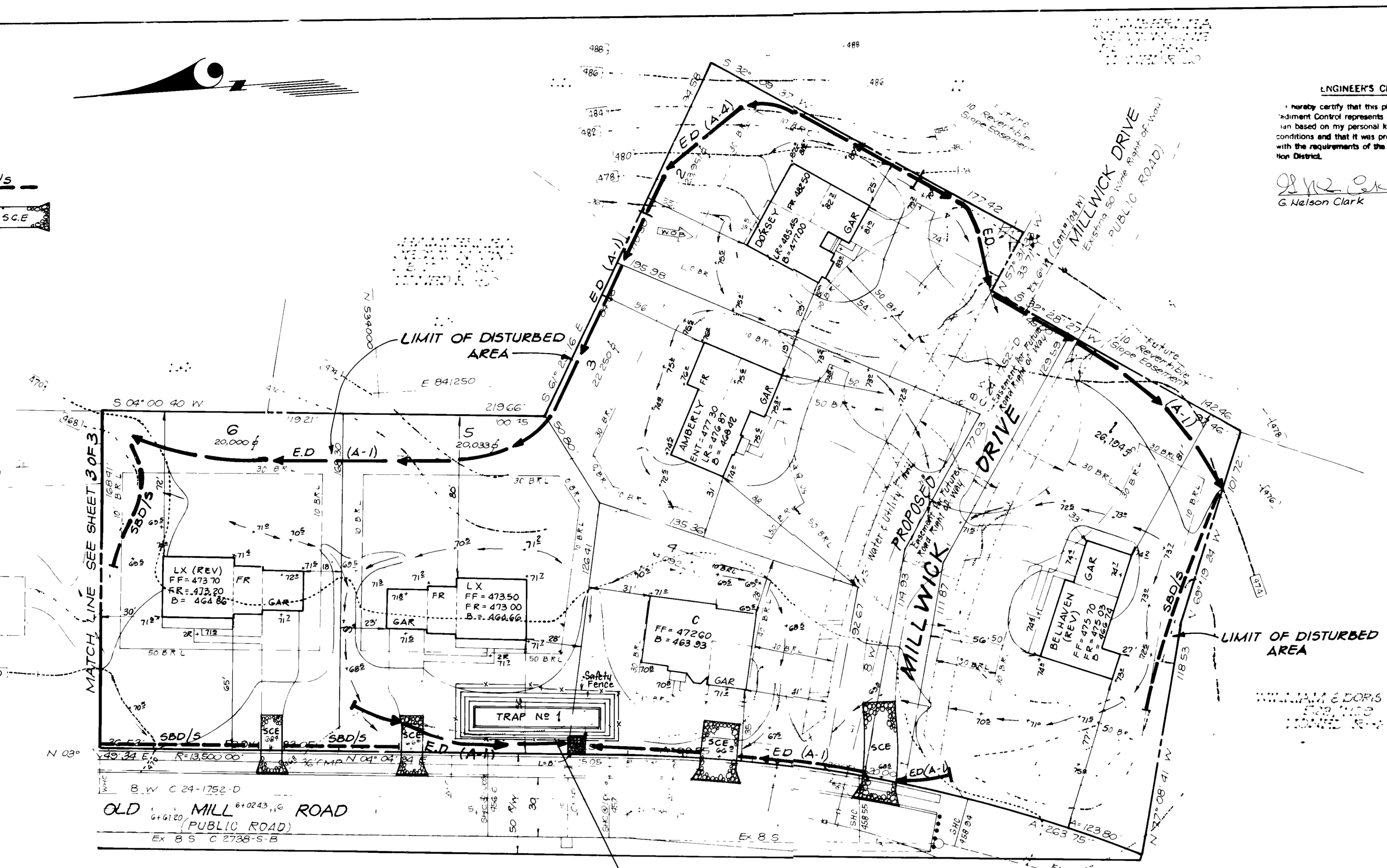
Stabilized Construction Entrance

Reviewed for Howard County
 Name: *[Signature]*
 Signature: *[Signature]*
 Date: 1/10/89
 U.S. Soil Conservation Service

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

Approved: *[Signature]* 1/13/89 DATE

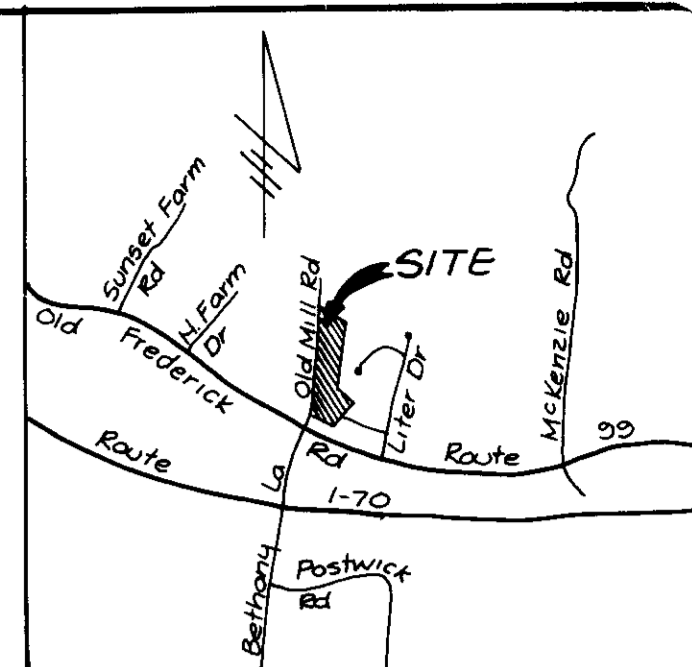
[Blacked out area]



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] 7-27-88
 G. Nelson Clark Date



DEVELOPER'S/BUILDER'S CERTIFICATE

I/We certify that all development and construction will be done according to the 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 in the National Resources Approved Training Program for the Control of Sediment and Erosion before beginning the project. I/We also certify that we are authorized agents as are named hereon.

[Signature] 7-27-88
 Signature of Developer/Builder Date

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. Do not previously seeded.

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

Seeding - For the periods March 1 thru April 30, and August 1 thru October 15, seed with 90 lbs per acre (1 1/4 lbs/1000 sq ft) of Kentucky 31 Tall Fescue. For the period May 1 thru July 31, seed with 60 lbs per acre of Kentucky 31 Tall Fescue per acre and 7 lbs per acre (0.07 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 seed Option (3) Seed with 60 lbs per 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 untreated 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 4 feet or higher, use 348 gallons per acre (8 gal/1000 sq ft) for anchoring.

Inspect all seeded areas and make needed repairs, replacements and reseeding.

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 seeded.

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 1/2 lbs/1000 sq ft). For the period May 1 thru August 14, seed with 3 lbs per acre of weeping lovegrass (0.03 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 seed.

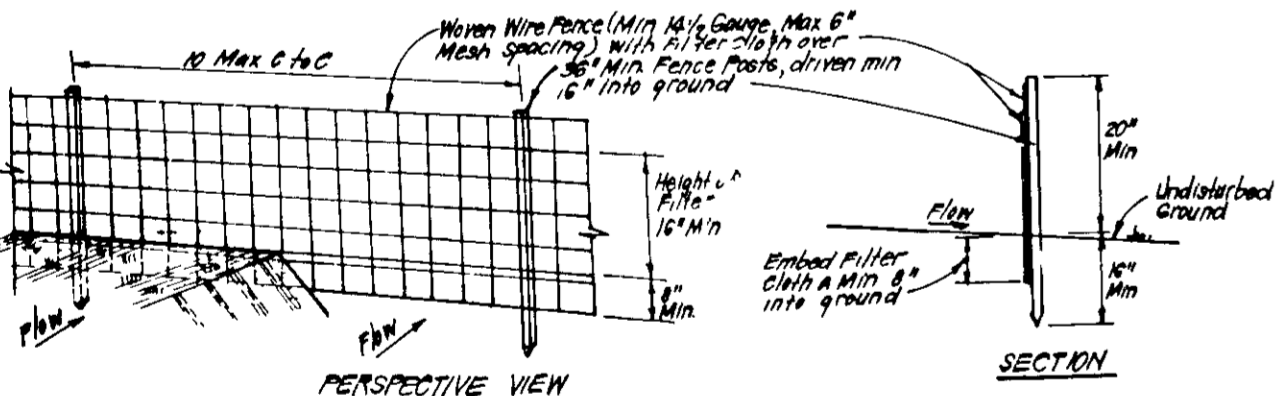
Mulching - Apply 1 1/2 to 2 tons per acre (70 to 90 lbs/1000 sq ft) of untreated small grain straw immediately after seeding. Anchor mulch immediately after application using mulch anchoring tool or 218 gal per acre (5 gal/1000 sq ft) of emulsified asphalt on flat areas. On slopes 8 ft or higher, use 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.

TRAP #1 - S.O.S.T. (ST. V)

DA = 10 Ac
 Storage Required = 3480 c³
 Storage Provided = 3492 c³
 Weir Crest Elevation = 466.5
 Depth = 4'
 Bottom Elevation = 461.5
 Bottom Dimension = 82' x 9'
 Clean-out Elevation = 464.0
 Side Slope 1:1
 Weir Length L=8

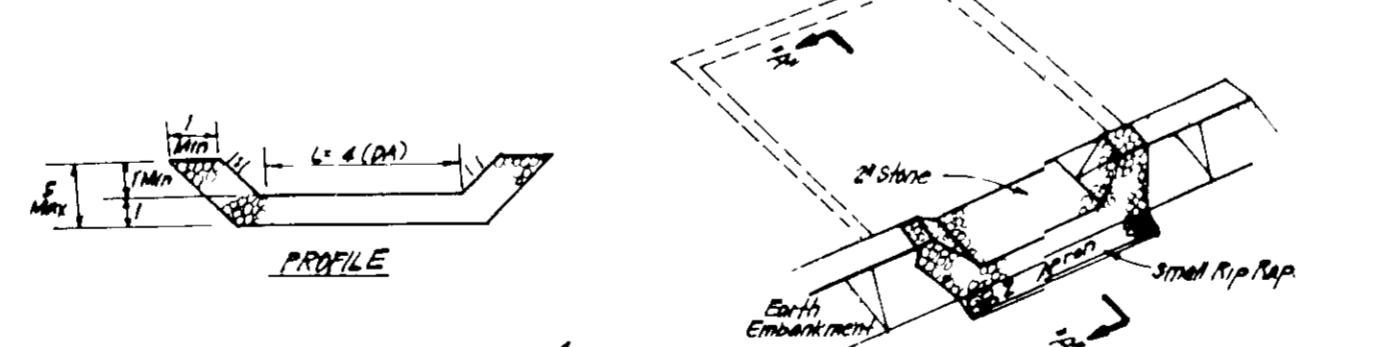
NOTE Leadwalks may be of flagstone or some other suitable material



CONSTRUCTION SPECIFICATIONS:

1. Woven wire fence to be fastened securely to fence posts with wire ties at slopes.
2. Filter cloth to be fastened securely to woven wire fence with ties spaced every 36" at top and mid section.
3. When 2 sections of filter cloth overlap each other they shall be overlapped by 6" and stapled.
4. Maintenance shall be performed as needed and material removed when "bulges" develop in silt fence.

POSTS: Signal either Type or 2" diameter
 FENCE: Woven Wire, 14 1/2 gauge
 FILTER CLOTH: Filter Cloth, 100% polypropylene
 STAPLES: 1/4" x 1/2" galvanized steel
 PREFABRICATED UNITS: Geotextiles
 BRIVERTANCE, or approved equal

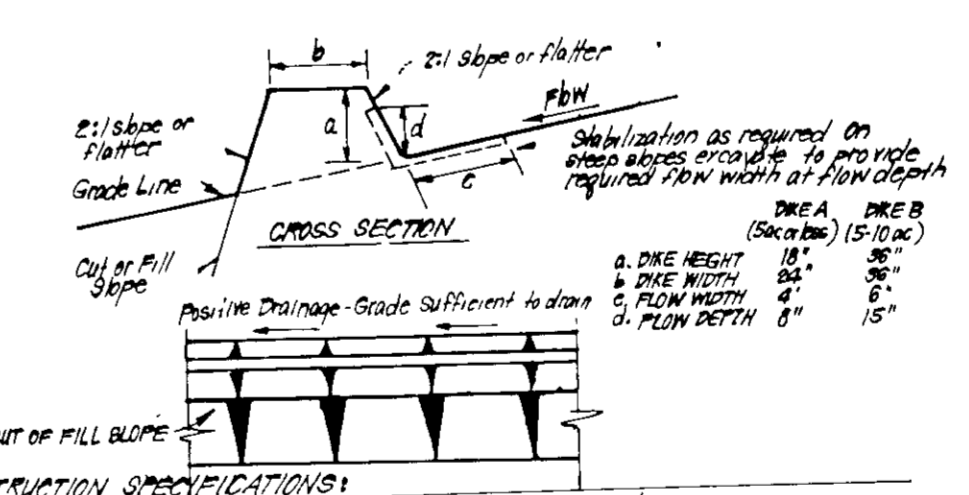


CONSTRUCTION SPECIFICATIONS:

1. Area under embankment shall be cleared, grubbed and stripped of any vegetation and root mat. The soil shall be compacted.
2. All material for the embankment shall be free of rocks and other woody vegetation as well as oversized stones, rocks, organic material or other objectionable material. The embankment shall be compacted by tamping, with equipment while it is being constructed.
3. All cut and fill slopes shall be 1:1.
4. The stone used in the outlet shall be small rip rap 4" x 4" x 4" with 1" thickness of 2" aggregate placed on the up-slope side of the small rip rap of embankment filter cloth on the rip rap.
5. The structure shall be inspected after each rain and repairs made as needed.
6. The structure openings shall be carried out in such a manner that erosion and water pollution is minimized.
7. 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 SPECIFICATIONS:

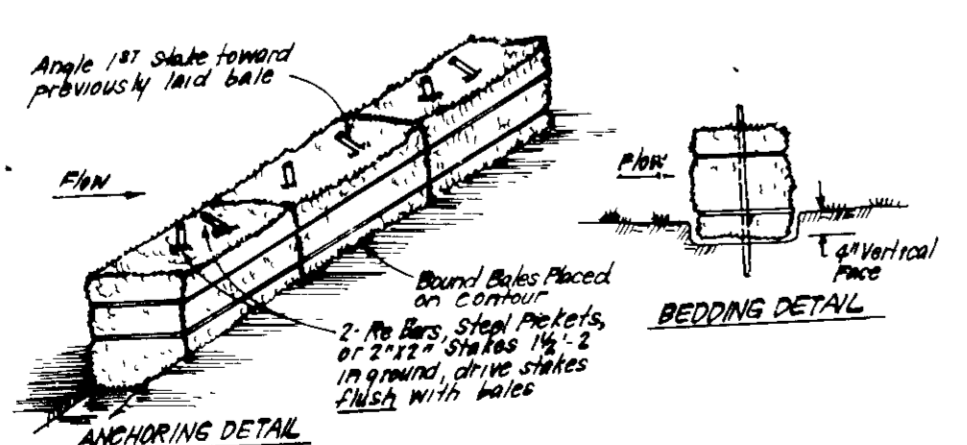
1. All ditches shall be compacted by earth moving equipment.
2. All ditches shall have positive drainage to an outlet.
3. Top width may be wider and side slopes may be flatter if desired, to facilitate crossing by construction traffic.
4. Final location should be adjusted as needed to utilize a stabilized silt 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 ditches are not 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.

TYPE OF TREATMENT	CHANNEL GRADE	DITCH A	DITCH B
1	0.5 - 3.0%	Seed or Straw Mulch	Seed or Straw Mulch
2	3.1 - 6.0%	Seed or Straw Mulch	Seed or Straw Mulch
3	6.1 - 10.0%	Seed or Straw Mulch	Seed or Straw Mulch
4	10.1 - 15.0%	Seed or Straw Mulch	Seed or Straw Mulch

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

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 slightly overlapping the adjacent bales.
2. Each bale shall be embedded in the soil a minimum of 4" and placed so the bridge is horizontal.
3. Bales shall be secured in place by either 2 stakes or 2 bars driven thru the bale.
4. Bales shall be secured in place by either 2 stakes or 2 bars driven thru the bale.
5. The filter cloth 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.
6. Inspection shall be performed after each rain and repairs made as needed.
7. Bales shall be removed when they have served their usefulness as well as not to block or impede storm flow or drainage.

STRAP BALE DIKE DETAIL (SBD)

NO SCALE

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

County Health Officer: *[Signature]* DATE: 7-24-89

APPROVED HOWARD COUNTY OFFICE OF PLANNING & ZONING

Planning Director: *[Signature]* DATE: 7-28-89

CHIEF DIVISION OF COMMUNITY PLANNING AND LAND DEVELOPMENT: *[Signature]* DATE: 7-28-89

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

Director: *[Signature]* DATE: 7-28-89

Chief Bureau of Engineering: *[Signature]* DATE: 7-28-89

APPROVED 8-18-88

CLARK • FINEFROCK & SACKETT, INC
 ENGINEERS • PLANNERS • SURVEYORS

7135 MINSTREL WAY • COLUMBIA MD 21045 • (301) 381-7200 - BALTO • (301) 621-8100 - WA-VA

SEDIMENT & EROSION CONTROL PLAN
 LOTS 4 and 9-11

OLD MILL

2ND ELECTION DISTRICT
 HOWARD COUNTY, MARYLAND

FOR Porter, Sullivan Corp
 Bethesda Metro Center Suite 900
 Bethesda, Maryland 20814

SCALE 1" = 30'

DRAWING 2 OF 3

CHECKED MCB JOB NO: 88-071

DATE 7-22-88 FILE NO: 88-0715E

SDP 89-20

