

VICINITY MAP
Scale 1" = 2000'

LEGEND

- Contour Interval 2 FT
- Existing Contour (dashed line)
- Proposed Contour (solid line)
- Spot Elevation (+10')
- Direction of Drainage (arrow)
- Walk out Basement (arrow)
- Trees to be Saved (cloud symbol)
- Tree Protection Fence (dashed line)
- Existing Spot Elevations 453.1
- 25% or Greater Steep Slopes (hatched area)
- Silt Fence (S-S)
- Earth Dike (D)
- Stabilized Construction Entrance (SCE)

TRAP NO. 1 S.O.S.T. (ST.-I)

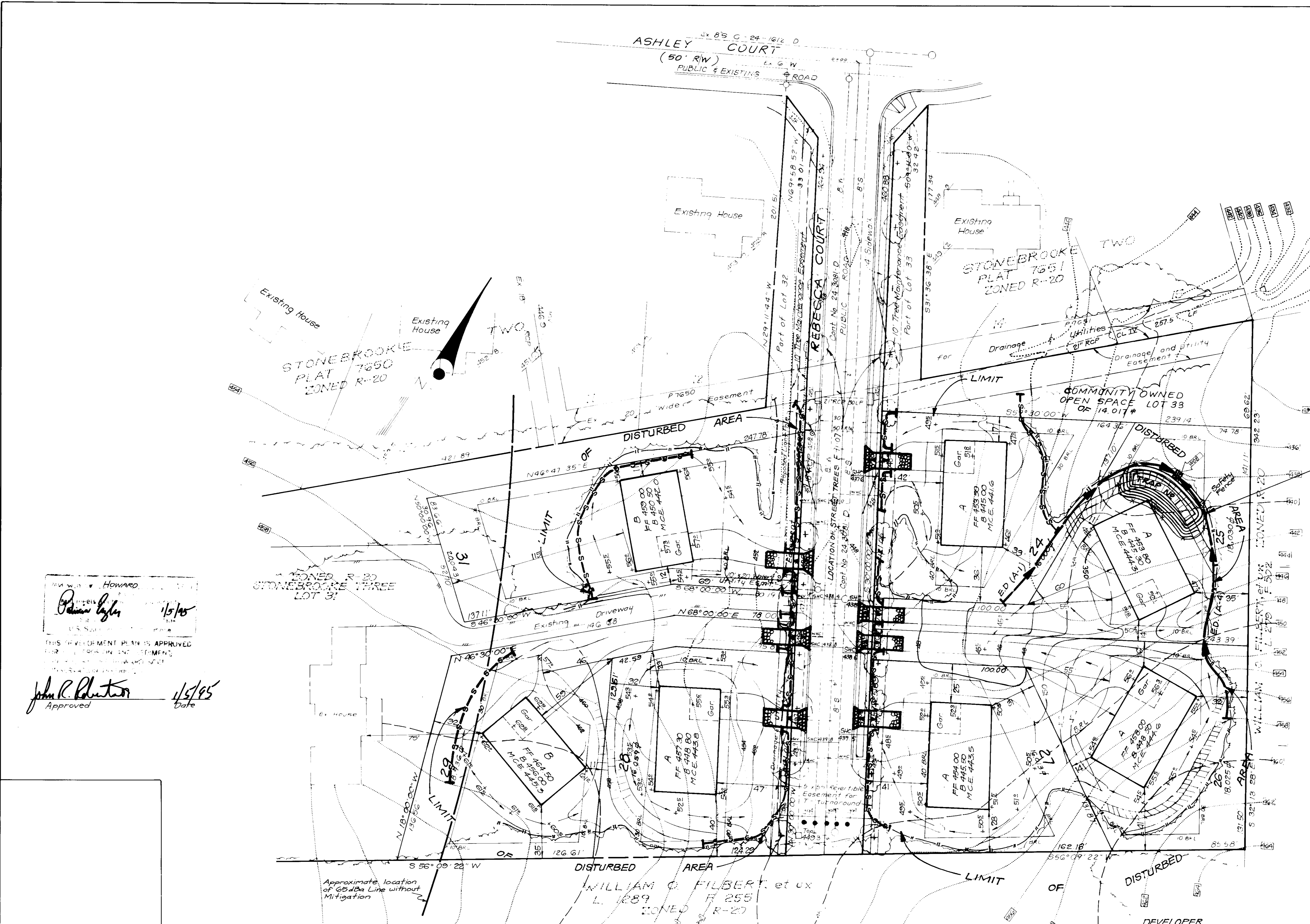
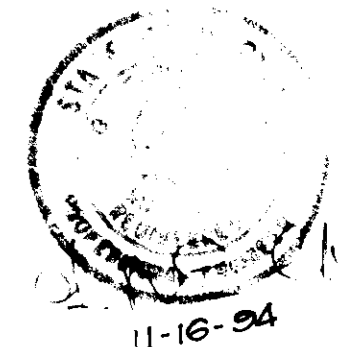
Drainage Area 1.0 Ac. (Prop. Ex.)
 Storage Required 1800 CF
 Storage Provided 1800 CF
 Storage Depth 3'
 Top of Stone Weir 438.0
 Cleanout Elevation 435.5
 Bottom Elevation 434.0
 Bottom Dimensions 47' x 9'
 1:1 Side Slopes
 L=4'

DEVELOPER'S/BUILDERS CERTIFICATE

I hereby certify that the design and construction will be in accordance with the plan of development and plan for erosion control and that all responsible persons involved in the construction of this project are duly licensed and qualified to perform the work herein shown and that the construction will be in accordance with the requirements of the Department of Planning and Public Works, Howard County, Maryland.

[Signature] 11-16-94
Date

[Signature] 11-16-94
G. Nelson Clark Date



APPROVED: HOWARD COUNTY DEPT. OF PLANNING & ZONING
[Signature] 1/5/95
 DATE

APPROVED: *[Signature]* 1/5/95
 Approved Date

APPROVED: HOWARD COUNTY DEPT. OF PLANNING & ZONING
 DIRECTOR *[Signature]* DATE 1/24/95
 DIRECTOR *[Signature]* DATE 1/23/95
 DIVISION OF LAND DEVELOPMENT AND RESEARCH
 APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE, STORM DRAINAGE SYSTEMS AND PUBLIC ROADS
 HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS
 DIRECTOR *[Signature]* DATE 1/24/95
 DIRECTOR *[Signature]* DATE 1/11/95
 COUNTY BUREAU OF ENGINEERING

DEVELOPER
 DORSEY CONTRACTORS, INC.
 16347 Frederick Road
 Woodbine, Md. 21797

CLARK • FINEROCK & SACKETT, INC. ENGINEERS • PLANNERS • SURVEYORS 7135 MINSTREL WAY • COLUMBIA, MD. 21046 • (301) 881-7500 • BALTO. • (301) 411-8100 • WASH.	
DESIGNED KIWM	SCALE 1" = 30'
DRAWN BAL	DRAWING 2 OF 3
CHECKED KIWM	JOB NO. 94-202
DATE 12-30-94	FILE NO. 94-202

FOR: RDK BUILDERS, INC.
 P.O. Box 336
 Timonium, Md. 21094

SEDIMENT AND EROSION CONTROL NOTES

- 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. (313-1855).
- All "catchment" 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 SPECS. FOR SOIL EROSION AND SEDIMENT CONTROL.
- Following initial soil disturbance or redistribution, 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 to all other disturbed or graded areas on the project site.
- All sediment traps/basins shown must be fenced and warning signs posted around their perimeters in accordance with Vol. 1, Chapter 12, of the HOWARD COUNTY DESIGN MANUAL, Storm Drainage.
- All disturbed areas must be stabilized within the time period specified above in accordance with the 1983 MARYLAND STANDARDS AND SPECS. FOR SOIL EROSION AND SEDIMENT CONTROL for permanent seedings (Sec. 5.1) sod (Sec. 5.4), temporary seeding (Sec. 5.0) and mulching (Sec. 5.2). Temporary stabilization with sod alone can only be done when recommended seeding dates do not allow for proper germination and establishment of grasses.
- 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.
- SITE ANALYSIS:**

Total Area of Site:	2.81 AC
Area Disturbed:	1.73 AC
Area to be seeded or paved:	0.64 AC
Area to be vegetatively stabilized:	0.44 AC
Total Cut:	2.410 C.Y.
Total Fill:	2.260 C.Y.

 Offsite Waste/Borrow Area Location:
 Any sediment control practice which is disturbed by grading activity for placement of utilities must be repaired on the same day of disturbance.
 Additional sediment control must be provided, if deemed necessary by the Howard County DPW Sediment Control Inspector.
 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.

- All pipes to be blocked at the end of each day (see detail this sheet).
- The total amount of silt fence = 330 LF

It is the responsibility of the contractor to identify the spoil/borrow site and notify and gain approval from the sediment control inspector of the site and its grading permit number at the time of construction.

CONSTRUCTION SEQUENCE:	NO. OF DAYS
1. Obtain grading permit	7
2. Install tree protection fence.	7
3. Install sediment and erosion control devices and stabilize.	14
4. Excavate for foundations, rough grade and temporarily stabilize.	30
5. Construct structures, sidewalks and driveways.	60
6. Final grade and stabilize in accordance with Sids. and Specs.	14
7. Upon approval of the sediment control inspector, remove sediment and erosion control devices and stabilize.	7

Delay construction of house on Lot 25; See Single Lot Sediment Control Detail on this sheet.

PERMANENT SEEDING NOTES

APPLY TO GRADED OR CLEARED AREAS NOT SUBJECT TO IMMEDIATE FURTHER DISTURBANCE WHERE A PERMANENT LONG-LIVED VEGETATIVE COVER IS DESIRED.

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. Harrow or disc into upper three inches of soil. At the 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 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 unrattled 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.

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

TEMPORARY SEEDING NOTES

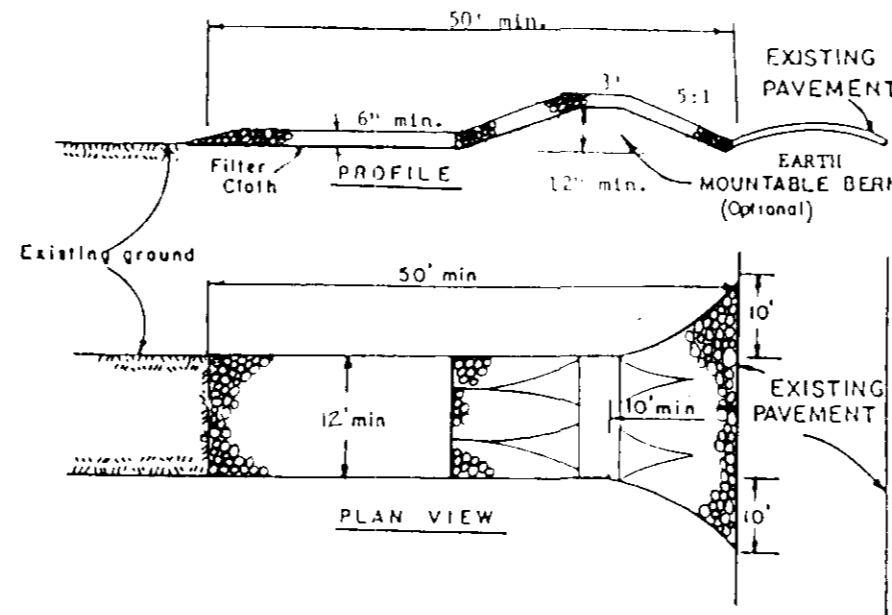
SEEDBED PREPARATION: Loosen upper three inches of soil by raking, disking or other acceptable means before seeding, if not previously loosened.

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 2 1/2 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 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 unrattled 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.

REFER TO THE 1983 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL FOR RATE AND METHODS NOT COVERED.

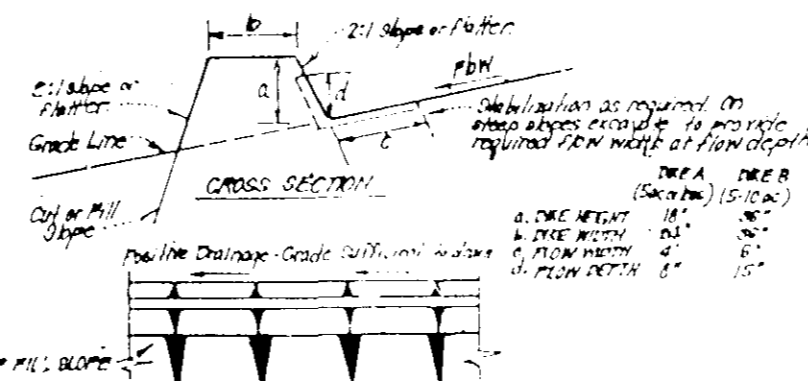


CONSTRUCTION SPECIFICATIONS

- Stone Size - Use 2" stone, or crushed or recycled concrete equivalent.
- Length - As required, but not less than 50 feet (except on a single residence lot where a 30 foot minimum length would apply).
- Thickness - Not less than six (6) inches.
- Width - Ten (10) foot minimum, but not less than the full width at points where ingress or egress occurs.
- 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.
- Surface Water - All surface water flowing or diverted toward construction entrances shall be piped across the entrance. If piping is impractical, a mountable berm with 5:1 slopes will be permitted.
- Maintenance - The entrance shall be maintained in a condition which will prevent tracking or flowing of sediment onto public rights-of-way. This may require periodic top dressing with additional stone as conditions demand and repair and/or cleanup of any measures used to trap sediment. All sediment applied, dropped, washed or tracked onto public rights-of-way must be removed immediately.
- Warning - 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.
- Periodic inspection and needed maintenance shall be provided after each rain.

STABILIZED CONSTRUCTION ENTRANCE (SCE)

No Scale



CONSTRUCTION SPECIFICATIONS

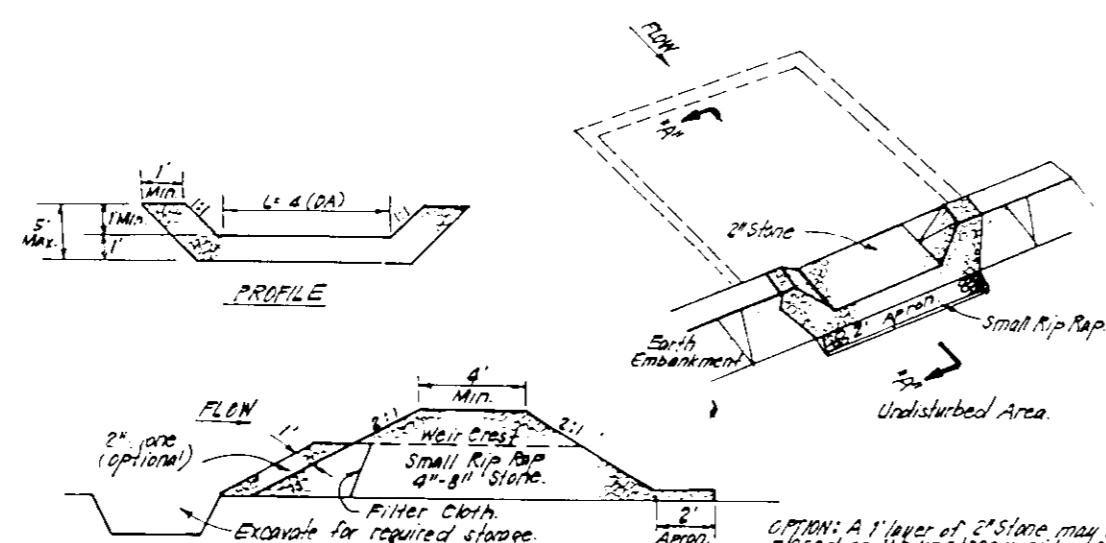
- All sites shall be maintained by non-tracking equipment.
- All sites shall have adequate drainage from the site.
- The width may be wider and side slopes may be steeper if deemed to facilitate tracking by construction equipment.
- Final location should be adjusted as needed to utilize a stabilized subgrade.
- Earth dikes shall have an adequate drainage system. A sediment trap or retention basin shall be provided in a sediment-trapping device such as a sediment trap or retention basin where other site drainage in the drainage area above the dike are not adequately stabilized.
- Stabilization shall be 100% in accordance with standard specifications for seed and straw mulch or straw mulch if used in seeding season, 100% flow channel as per chart below.

BACK CHANNEL STABILIZATION

TYPE OF PREPARATION	CHANNEL GRADE	DISE A	DISE B
1	1.5-3.0%	Seed or Straw Mulch	Seed or Straw Mulch
2	3.1-5.0%	Seed or Straw Mulch	Seed or Straw Mulch
3	5.1-8.0%	Seed or Straw Mulch or Sod	Seed or Straw Mulch or Sod
4	8.1-10.0%	Seed or Straw Mulch or Sod	Seed or Straw Mulch or Sod

EARTH DIKE DETAIL (E.D.)

No Scale

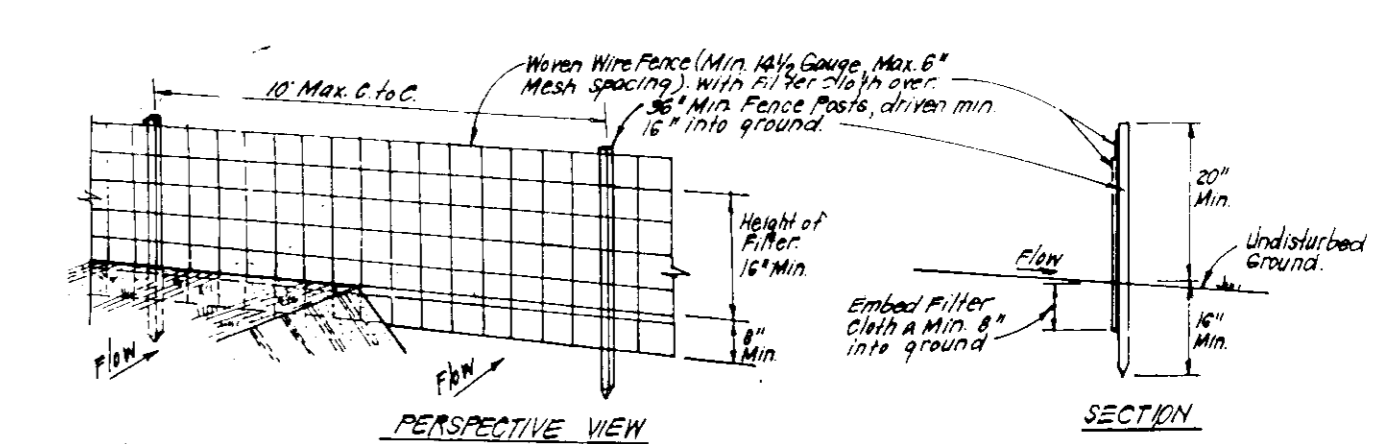


CONSTRUCTION SPECIFICATIONS

- The whole structure shall be cleared, graded and stripped of any vegetation and root mat. The top edge shall be sloped.
- The fill material for the embankment shall be free of rock and other material as well as any other debris, rocks, organic material or other objectionable material. The embankment shall be compacted by tamping with hand tools.
- All cut and fill slopes shall be 1:1.
- The stone used in the outlet shall be small in size and placed with 1" thickness of appropriate placed on the upstream side of the outlet to prevent erosion of the embankment.
- Sediment shall be removed and trap inspected in its original dimensions when the sediment has accumulated to 1/2 the season depth.
- The structure shall be inspected after each rain and repairs made as needed.
- Construction operations shall be carried out in such a manner that erosion and water pollution is minimized.
- 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.) STR.

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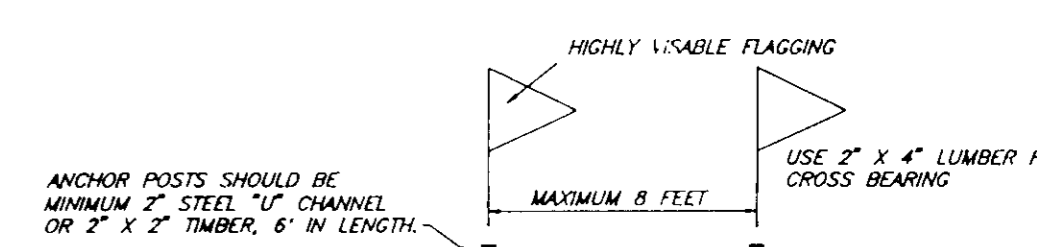


CONSTRUCTION SPECIFICATIONS

- Weaver wire fence to be fastened securely to fence posts with wire ties or staples.
- Filter cloth to be fastened securely to weaver wire fence with ties spaced every 24" at top and mid section.
- When sections of filter cloth are joined, they shall be overlapped by 6" and stapled.
- Maintenance shall be performed as needed and material removed when "blow" develops in silt fence.
- Silt fence to be replaced at 3" to 5" intervals.

SILT FENCE DETAIL (S)

No Scale



BLAZE ORANGE PLASTIC MESH

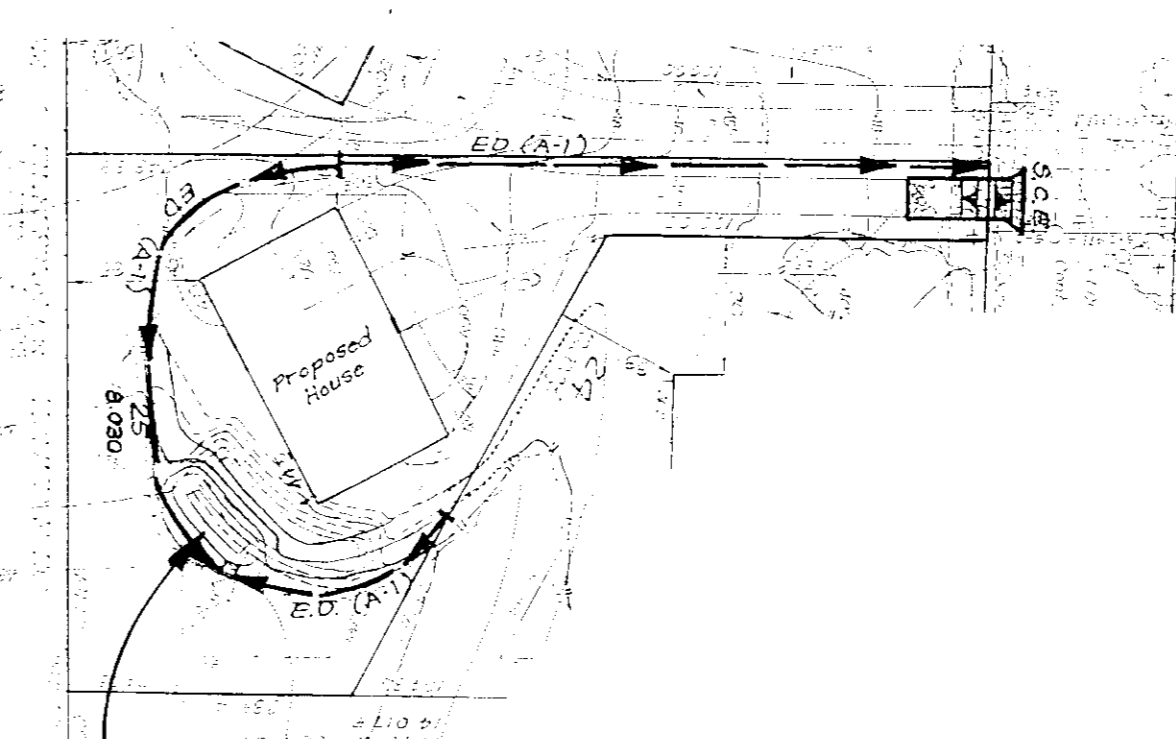
TYPICAL TREE PROTECTION FENCE DETAIL

No Scale

- Perest protection device only.
- Retention area will be set as part of the review process.
- Boundaries of retention area should be staked and flagged prior to installing device.
- Root damage should be avoided.
- Protection signage may also be used.
- Device should be maintained throughout construction.

SINGLE LOT SEDIMENT CONTROL PLAN - LOT 25

No Scale



TRAP

- DA = 0.2 ac.
- Storage req'd. 360 cf.
- Storage prof. 368 cf.
- Depth = 2 ft.
- Top of stone 338.0
- Cleanout elev 337.0
- Bottom elev 336.0
- Bottom width 4' x 9'

APPROVED: HOWARD COUNTY DEPT. OF PLANNING & ZONING
 Director: *[Signature]* DATE: 1/24/95
 Chief Division of Land Development and Research: *[Signature]* DATE: 1/23/95

APPROVED: FOR PUBLIC WATER AND PUBLIC SEWERAGE, STORM DRAINAGE SYSTEMS AND PUBLIC ROADS
 HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS
 Director: *[Signature]* DATE: 1/29/95
 Chief Bureau of Engineering: *[Signature]* DATE: 1/11/95

Reviewed for HOWARD S.C.D.
 Signature: *[Signature]* DATE: 1/19/95
 US Soil Conservation Service

THIS DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT.
 Signature: *[Signature]* DATE: 1/19/95
 Approved

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 sediment and erosion control and that all responsible personnel involved in the construction project will have a Certificate of Attendance at a Department of the Environment 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: *[Signature]* DATE: 1/18/94

ENGINEER'S CERTIFICATE
 I hereby certify that this plan for sediment and erosion 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: 1-23-94
 G. Nelson Clark



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

DESIGNED: KIWM
 DRAWN: BAL
 CHECKED: KIWM
 DATE: 12-30-94

SCALE: 1" = 30'
 DRAWING: 3 OF 3
 JOB NO.: 94-202
 FILE NO.: 94-202

SEDIMENT & EROSION CONTROL PLAN
 LOTS 24-29 AND 31
STONEBROOKE THREE
 2ND ELECTION DISTRICT
 HOWARD COUNTY, MARYLAND
 For: RDK BUILDERS, INC
 P.O. Box 336
 Timonium, MD 21094
 S.D.P. 95-46