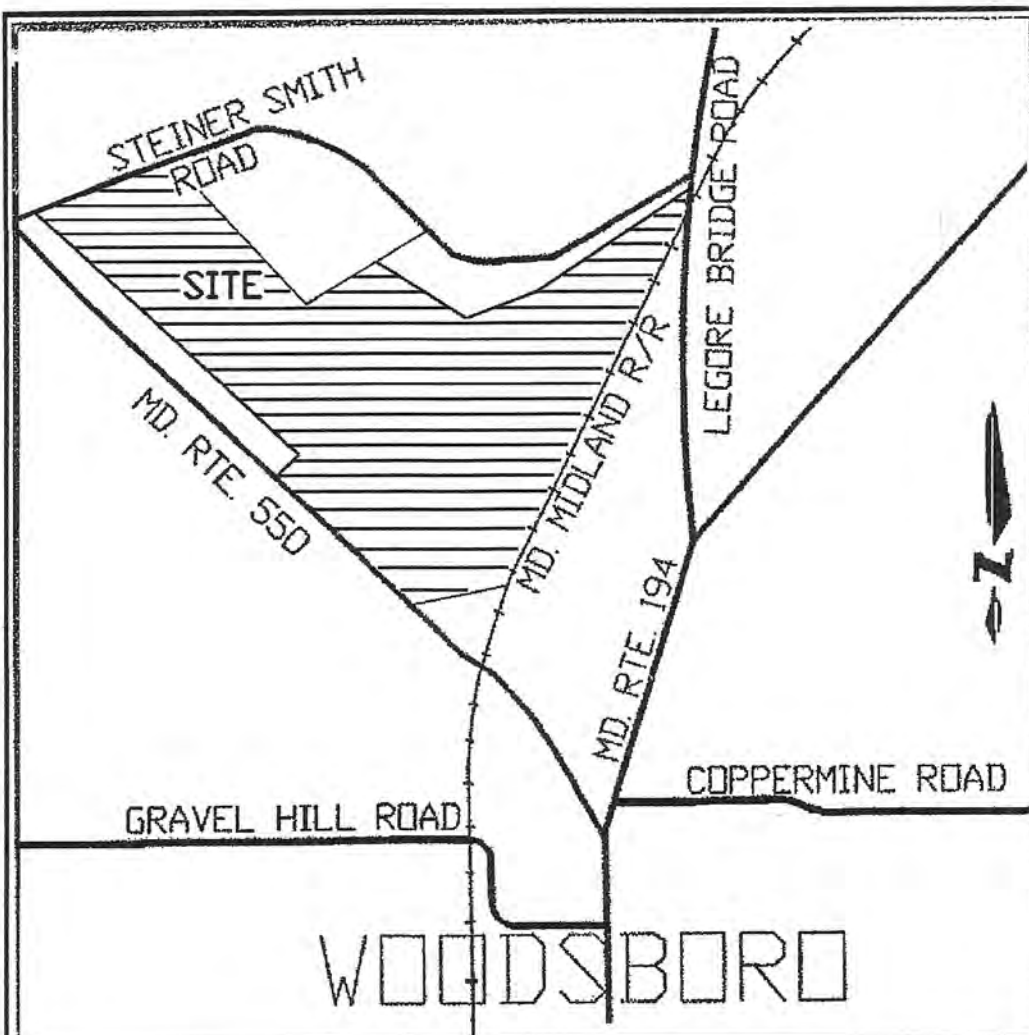




VICINITY MAP

1" = 2000'

Permit Modification

To

SURFACE MINING PLAN

For

BARRICK QUARRY

FREDERICK COUNTY, MARYLAND

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT

Denny Ransburg 5/2/19
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT

Denny Ransburg 10/22/15
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

APPROVED FREDERICK SOIL
CONSERVATION DISTRICT

D. Beach 6/2/03
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

W. Alt 6/2/13
DISTRICT CONSERVATIONIST DATE
NATURAL RESOURCES CONSERVATION SERVICE

SCD AND NRCS APPROVAL FOR SEDIMENT AND EROSION CONTROL IS
CONTINGENT UPON ISSUANCE OF ALL APPLICABLE REGULATORY PERMITS

SCD and NRCS approval for sediment and erosion control is contingent
upon issuance of all applicable regulatory permits.

FREDERICK SOIL CONSERVATION DISTRICT

Approved By *Devon Bailey*

Date: 1/17/96

Reviewed for FREDERICK S.C.D.
and meets Technical Requirements

Approved By *R. Maclean*
District Conservationist

Date: 01-16-96

NATURAL RESOURCES CONSERVATION SERVICE

5 YEAR SCD UPDATE ENGINEERING CERTIFICATION

I hereby certify that the plans have been designed in accordance
with state and local ordinances, COMAR and the Maryland
Standards and Specifications for Soil Erosion and Sediment
Control in effect at the time of design. The plans were first
prepared in 1975 and have been amended several times since.

Collin Sumpter 05/15/19
Name Date

OWNER/DEVELOPER
I CERTIFY THAT THIS PLAN OF SEDIMENT CONTROL WILL BE IMPLEMENTED TO
THE FULLEST EXTENT, AND ALL STRUCTURES WILL BE INSTALLED TO THE
DESIGN AND SPECIFICATIONS AS SPELLED OUT IN THIS PLAN AND THAT ANY
RESPONSIBLE PERSONNEL INVOLVED IN THE CONSTRUCTION PROJECT WILL
HAVE A CERTIFICATION OF ATTENDANCE AT A DEPARTMENT OF ENVIRONMENT
APPROVED TRAINING PROGRAM FOR THE CONTROL OF SEDIMENT AND EROSION
BEFORE BEGINNING THE PROJECT. I ALSO AUTHORIZE PERIODIC ON-SITE
EVALUATION BY THE CATOCTIN/FREDERICK SOIL CONSERVATION DISTRICT
PERSONNEL AND COOPERATING AGENCIES.

Collin Sumpter *Collin Sumpter* 05/15/19
Name Date

VIKA, INC.
8200 GREENSBORO DRIVE
MCLEAN, VA 22102

1-(703)-442-7800

OCTOBER 1989

TEETS POWELL & ASSOCIATES

4845 GOVERNOR'S WAY
SUITE L

FREDERICK, MD 21701

1-(301)-662-5034

TPA PROJECT NUMBER 4161

OCTOBER 1995

MORRIS AND RITCHIE ASSOCIATES, INC.

110 WEST ROAD
SUITE 245

TOWSON, MD 21204

1-(410)-821-1690

MRA PROJECT NUMBER 11285

AUGUST 1999

DISTURBED AREA CERTIFICATION
FOR 5 YEAR SCD UPDATE

Disturbed area: 56.0 acres

Collin Sumpter 05/15/19
Name Date

MINING PERMIT 77-SP-0045
Expiration Date: February 28, 2020

CONTACT INFORMATION
Boomer Martz, Quarry Superintendent
(301) 366-5191
Collin Sumpter, Resource Manager
(410) 792-7234

PERMITS
MINING PERMIT 77-SP-0045
WATER APPROPRIATION FR1901G001(04)
NPDES DISCHARGE 15MM1429
WETLAND N/A

Notes

1. Project Summary - The Barrick Quarry has been operational since the 1880's. It was mined for agricultural lime until the late 1980's when it was converted to an aggregate quarry. The site currently mines and processes limestone for the transportation and construction industries. The excess material generated by the mining process is stockpiled on the Northwest corner of the permit area.
2. 100 Year Floodplain and Wetlands - There are no 100 year flood plains or wetlands within the permit area.
3. Outfall Summary - Discharge Point 001 - located downstream of wash water ponds (2). Discharge is through a rip rap spillway to an unnamed tributary of Israel Creek. There are no issues with current discharge.
4. Dewatering pipe at max pumping capacity - Q10 = 6.68 cfs & V10 = 8.51 fps.

SHEET INDEX

DESCRIPTION	SHEET No.
Cover Sheet	1 of 10
Adjacent Property Owners Map	2 of 10
Site Area and Soils Map	3 of 10
Grading Plan	4 of 10
Overburden Trap Detail Plan	5 of 10
Overburden Trap Detail Plan	6 of 10
Cross-Section Sheet	7 of 10
Detail Sheet	8 of 10
Erosion and Sediment Control Notes and Detail Sheet	9 of 10

STANDARD STABILIZATION NOTE

Following initial soil disturbance or re-distribution, permanent or temporary stabilization must be completed within:
A. Three (3) calendar days as to the surface of all perimeter dikes, swales, ditches, perimeter slopes, and all slopes steeper than 3 horizontal to 1 vertical (3:1); and
B. Seven (7) calendar days as to all other disturbed or graded areas on project site not under active grading.

5 year Plan / SCD COVER SHEET
for
BARRICK QUARRY
77-SP-0045-G
FREDERICK COUNTY, MARYLAND
S. W. Barrick & Sons, Inc.
11609 Legore Bridge Road
Woodsboro, Maryland 21789
Phone: (301) 845-6343
Fax: (301) 845-2396
www.swbarrick.com



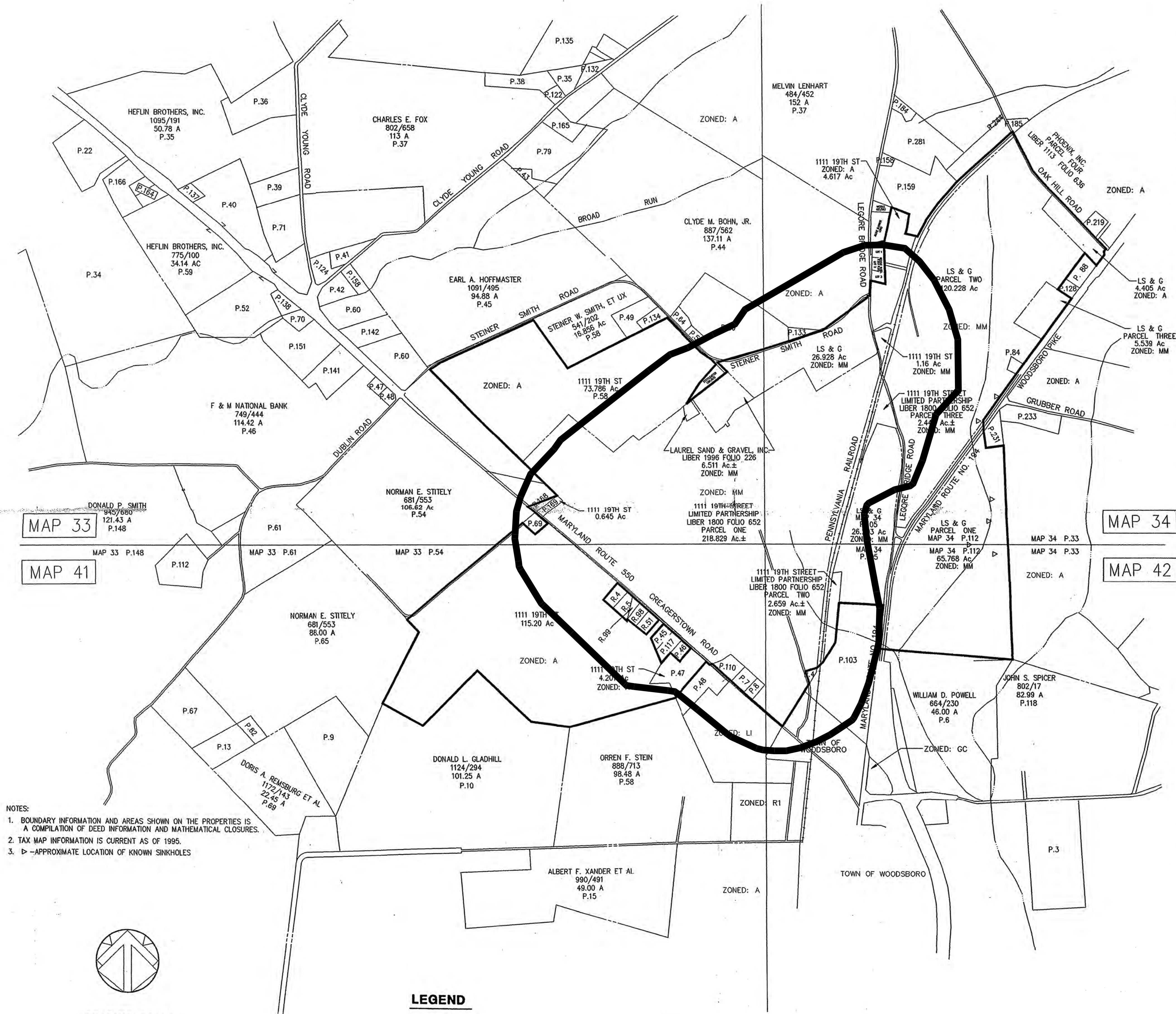
DESIGN BY: FSH
DRAWN BY: WEL
CHECKED BY: TJS
SCALE: AS NOTED
DATE: 03/27/2012
SHEET #: 1 of 10

(Original Plan Set)

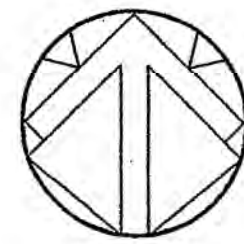
ADJACENT PROPERTY OWNER INDEX

MAP GRID-PARCEL

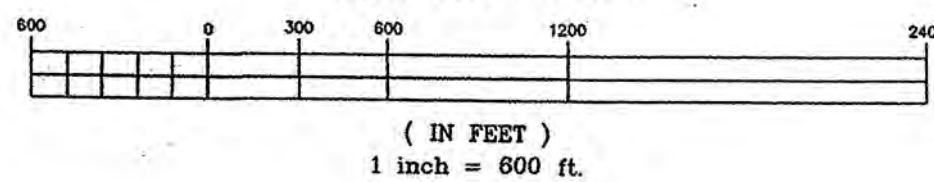
1. Stephen Cooper & Anna Seiss 9723 Steiner Smith Road Woodsboro, MD 21798-9315	0033-0024-0058	23. 1111 19th Street, L.P. P.O. Box 850 Laurel, MD 20708	0041-0006-0119
2. David M. & Diana L. Schudel 9834 Steiner Smith Road Woodsboro, Maryland 21798	0033-0024-0050	24. Barrick LLC P.O. Box 850 Laurel, MD 20708	0041-0006-0007
3. Twin Creek Farm, LLC 14 E 13th St. Frederick, MD 21701-4453	0033-0018-0044	25. Thomas S. & Judy M. Frank 1111 Creagerstown Road Woodsboro, Maryland 21798	0041-0006-0008
4. Kathy L. Baker 11438 Creagerstown Rd. Woodsboro, MD 21793	0033-0023-0054	26. David I. & Joshua M. Roderick 10435 Dublin Rd. Walkerstown, MD 21793	0041-0006-0058
5. Lonnie & Julie McLain 11421 Creagerstown Road Woodsboro, Maryland 21798	0033-0024-0168	27. Margaret P. Trimmer, et. al. 303 S Main Street P.O. Box 191 Woodsboro, MD 21798-0191	0042-0001-0006
6. Laurel Sand and Gravel, Inc. P.O. Box 850 Laurel, MD 20708	0033-0024-0169		MAP-PARCEL
7. Michael Cribb & Patricia Murray 11418 Creagerstown Rd. Woodsboro, MD 21798-8906	0033-0024-0069	28. Susan & David Newcomb 106 James St. Ext. Woodsboro, MD 21798-8505	0950-0867
8. Twin Creek Farm, LLC 14 E 13th Street Frederick, MD 21701-4453	0034-0019-0133	29. Bushey Enterprises, LLC 23036 Foxville Rd Smithsburg, MD 21783	0950-0868-1
9. Melvin G. Wodde 11709 Legore Bridge Road Keymar, Maryland 21757	0034-0013-0228	30. James & Tanny Tyerlyar 108 Creagerstown Rd Woodsboro, MD 21798	0950-0871
10. Potomac Edison Company Downsville Pike Hagerstown, Maryland 21740	0034-0019-0121	31. N.C. Cramer & Sons, Inc. Creagerstown Road Woodsboro, Maryland 21798	0950-868
11. Laurel Sand and Gravel, Inc. P.O. Box 850 Laurel, MD 20708	0034-0019-0112	32. Jeffery A. Crum 106 Creagerstown Rd Woodsboro, MD 21798-8502	0950-872
12. 1325 G Street Associates, L.P. c/o Laurel Sand and Gravel P.O. Box 850 Laurel, MD 20708	0041-0006-0003	33. Jason S. Boyer 104 Woodsboro Creagerstown Road Woodsboro, MD 21798-8502	0950-873
13. Robert A. & Nancy C. Johnson 11322 Creagerstown Road Woodsboro, Maryland 21798	0041-0006-0004	34. Brian Belida & Kelly Gruber 102 Creagerstown Rd Woodsboro, MD 21798	0950-874 0950-876
14. James D. and Supatra M. Lay, II Woodsboro, MD 21798-0352	0041-0006-0005	35. Linda J. Lookingbill 102 James Street Ext. Woodsboro, MD 21798-8505	0950-865
15. Twin Creek Farm, LLC 14 E 13th Street Frederick, MD 21701-4453	0034-0019-0133	36. Nancy H. & Daniel K. Styers 104 James Street Woodsboro, MD 21798-8505	0950-866
16. Thomas G. & Karla A. Wambach 11308 Creagerstown Road Woodsboro, MD 21798-8907	0041-0006-0098	37. Laurel Sand & Gravel, Inc. P.O. Box 719 Laurel, Maryland 20725	33-179
17. Laurel Sand and Gravel, Inc. P.O. Box 850 Laurel, MD 20708	0041-0006-0051	38. John L. & Pamela J. Stottmeyer 12437-A Detour Road Keymar, Maryland 21757	33-279
18. Ruby L. Mehaffie Trustee 10806 Coppermine Rd Woodsboro, MD 21798-8310	0041-0006-0045	39. Earl A. Hoffmaster & Frances V. Hoffmaster 9743 Steiner Smith Road Woodsboro, Maryland 21798	33-49 33-45
19. Richard L. & Mary E. Kline 11250 Creagerstown Road Woodsboro, MD 21798	0041-0006-0117	40. Warren & Mary Smith Trustees Smith Family 1 Rod Cir Middletown, MD 21769-7869	33-60
20. Betty Jane Reed 11244 Woodsboro-Creagerstown Road Woodsboro, MD 21798-8909	0041-0006-0046	41. Alice V. & Wilson E. Stevens 9817 Steiner Smith Road Woodsboro, Maryland 21798	33-134
21. Barrick LLC P.O. Box 850 Laurel, MD 20708	0041-0006-0047	42. Steven M. & Shirley L. Blank 9824 Steiner Smith Road Woodsboro, Maryland 21798	33-64
22. Nan K. Pue Etal 11222 Creagerstown Rd. Woodsboro, MD 21798-8909	0041-0006-0048	43. David & Diana Schudel 9834 Steiner Smith Rd Woodsboro, MD 21798	33-56



- NOTES:
1. BOUNDARY INFORMATION AND AREAS SHOWN ON THE PROPERTIES IS A COMPILATION OF DEED INFORMATION AND MATHEMATICAL CLOSURES.
 2. TAX MAP INFORMATION IS CURRENT AS OF 1995.
 3. D - APPROXIMATE LOCATION OF KNOWN SINKHOLES



GRAPHIC SCALE



LEGEND

1000' BLASTING LIMITS

ADJACENT PROPERTY OWNER MAP

for
BARRICK QUARRY
77-SP-0045-G
FREDERICK COUNTY, MARYLAND

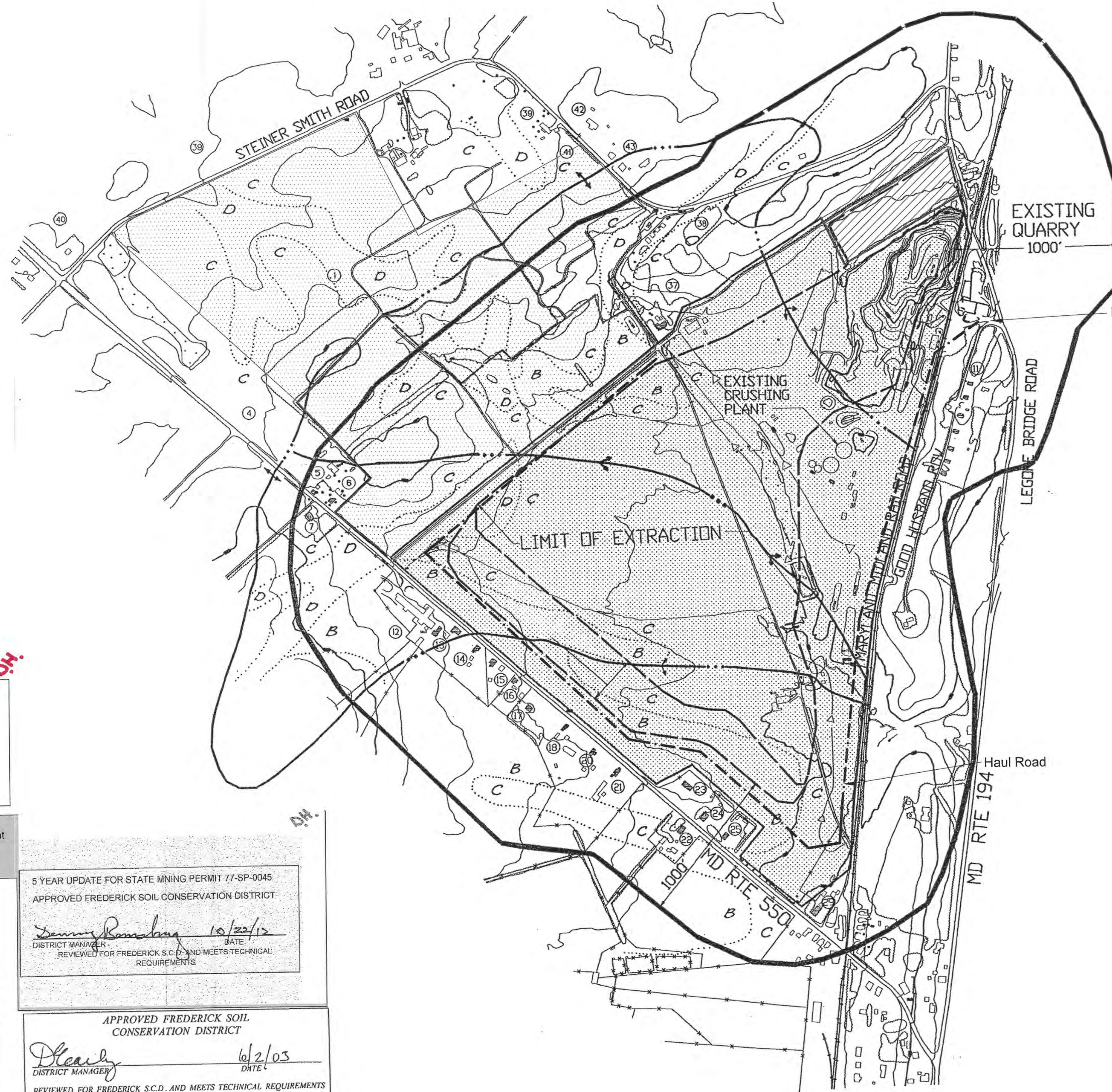
S. W. Barrick & Sons, Inc.
11609 Legore Bridge Road
Woodsboro, Maryland 21798
Phone: (301) 845-6343
Fax: (301) 845-2396
www.swbarrick.com



REVISIONS

1.	Update 01/02/2019 - CJS
2.	
3.	
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DESIGN BY: FSH
DRAWN BY: WEL
CHECKED BY: TJS
SCALE: AS NOTED
DATE: 03/27/2012
SHEET # 2 of 10



LEGEND

- APPROXIMATE LIMITS OF EXISTING PERMIT
- 1000' BLASTING LIMITS
- LIMITS OF EXTRACTION
- OCCUPIED DWELLING WITH ASSOCIATED PROPERTY OWNER LISTING (SEE SHEET 2 OF 1 FOR FURTHER OWNER INFORMATION)
- AREA OF PERMIT MODIFICATION
- EXISTING DRAINAGE DIVIDE
- APPROXIMATE LIMITS OF 100 YEAR FLOODPLAIN AS OBTAINED FROM F.E.M.A. MAP COMMUNITY PANEL NO. 240027-0110-A FREDERICK COUNTY, MARYLAND.
- TR-55 SOILS TYPES
- PROPERTY LINE

NOTES:

- 1) TOPOGRAPHIC INFORMATION WAS OBTAINED FROM POTOMAC AERIAL SURVEYS INC.
- 2) INFORMATION SHOWN HEREON TAKEN FROM ORIGINALLY PERMITTED PLANS BY VIKI INC. DATED OCTOBER 2, 1989.
- 3) CONTOUR INTERVAL IS 20 FEET.

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT
Denny Borchert 5/17/19
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

SCD and NRCS approval for sediment and erosion control is contingent upon issuance of all applicable regulatory permits.

FREDERICK SOIL CONSERVATION DISTRICT
Approved By *Dawn Early*
Date: 1/17/96

Reviewed for FREDERICK S.C.D. and meets Technical Requirements
Approved By *R. M. Hinkle*
District Conservationist
Date: 01-16-96
NATURAL RESOURCES CONSERVATION SERVICE

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT
Denny Borchert 10/22/12
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

APPROVED FREDERICK SOIL CONSERVATION DISTRICT
D. Early 6/2/03
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS
M. M. 6/3/13
DISTRICT CONSERVATIONIST DATE
NATURAL RESOURCES CONSERVATION SERVICE
SCD AND NRCS APPROVAL FOR SEDIMENT AND EROSION CONTROL IS CONTINGENT UPON ISSUANCE OF ALL APPLICABLE REGULATORY PERMITS

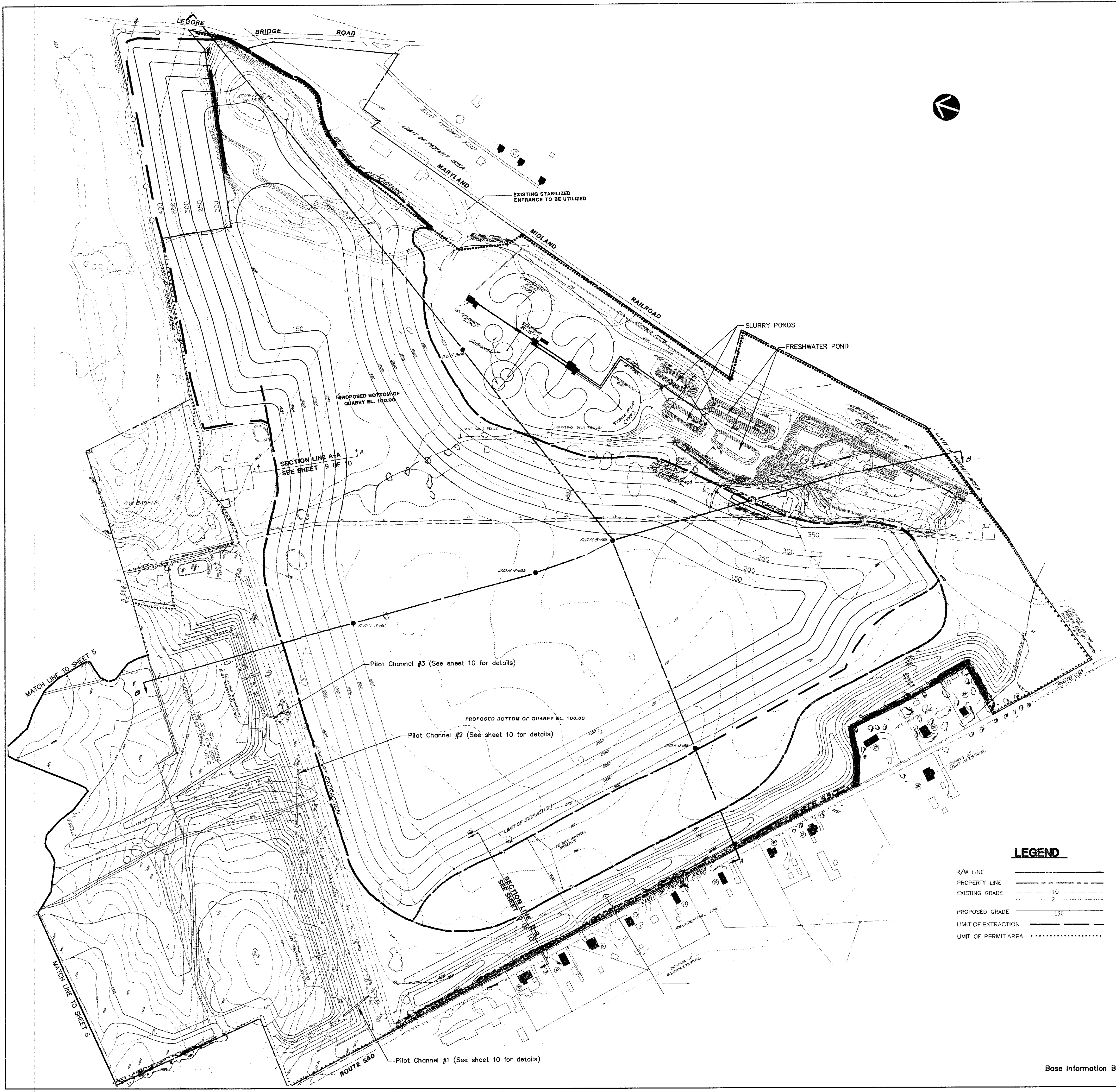


SITE AREA & SOILS MAP
for
BARRICK QUARRY
77-SP-0045-G
FREDERICK COUNTY, MARYLAND

S. W. Barrick & Sons, Inc.
11609 Legore Bridge Road
Woodsboro, Maryland 21789
Phone: (301) 845-6343
Fax: (301) 845-2396
www.swbarrick.com

REVISIONS		
1.	S.C.D. 5/16/12	WEL
2.	S.C.D. 10/5/12	WEL
3.	S.C.D. 02/26/19	CJS
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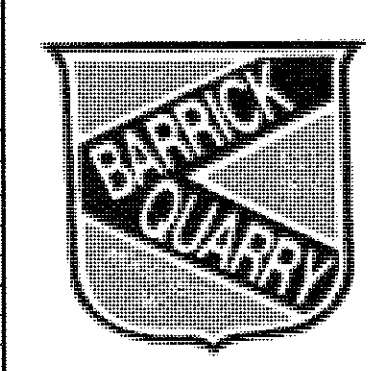
DESIGN BY: FSH
DRAWN BY: WEL
CHECKED BY: TJS
SCALE: AS NOTED
DATE: 03/27/2012
SHEET # 3 of 10



LEGEND

- R/W LINE —————
- PROPERTY LINE —————
- EXISTING GRADE ———— 10 ————
- EXISTING GRADE ———— 2 ————
- PROPOSED GRADE ———— 150 ————
- LIMIT OF EXTRACTON —————
- LIMIT OF PERMIT AREA

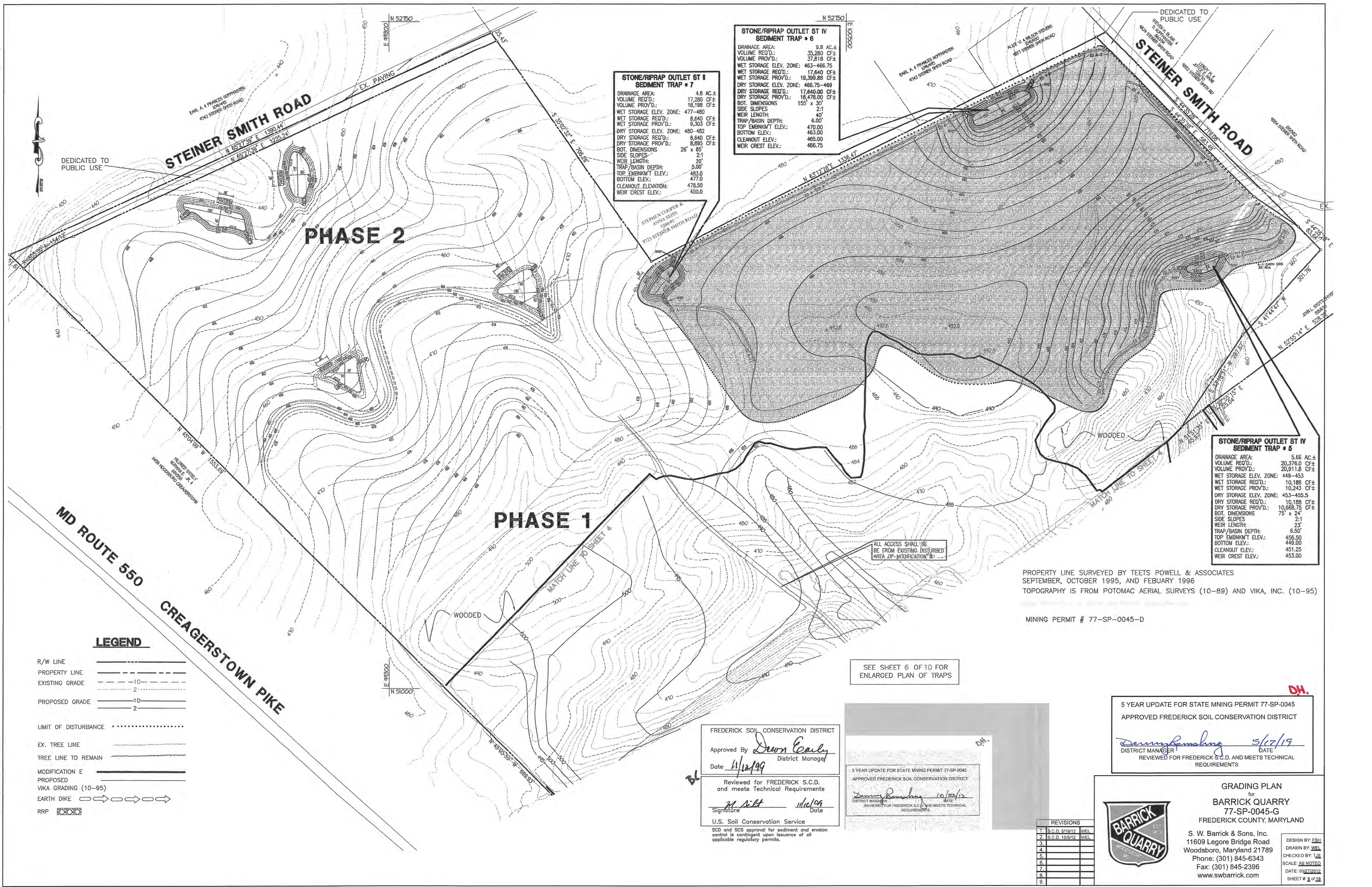
REVISIONS	
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GRADING PLAN
for
BARRICK QUARRY
77-SP-0045-G
FREDERICK COUNTY, MARYLAND

S. W. Barrick & Sons, Inc.
11609 Legore Bridge Road
Woodsboro, Maryland 21789
Phone: (301) 845-6343
Fax: (301) 845-2396
www.swbarrick.com

DESIGN BY: FSM
DRAWN BY: WEL
CHECKED BY: TJS
SCALE: AS NOTED
DATE: 03/27/2012
SHEET # 4 of 10



**STONE/RIPRAP OUTLET ST II
SEDIMENT TRAP # 7**

DRAINAGE AREA: 4.8 AC±
VOLUME REQ'D.: 17,280 CF±
VOLUME PROV'D.: 18,198 CF±
WET STORAGE ELEV. ZONE: 477-480
WET STORAGE REQ'D.: 8,640 CF±
WET STORAGE PROV'D.: 9,303 CF±
DRY STORAGE ELEV. ZONE: 480-482
DRY STORAGE REQ'D.: 8,640 CF±
DRY STORAGE PROV'D.: 8,895 CF±
BOT. DIMENSIONS: 26' x 65'
SIDE SLOPES: 2:1
WEIR LENGTH: 20'
TRAP/BASIN DEPTH: 5.00'
TOP EMBANKMT ELEV.: 483.0
BOTTOM ELEV.: 477.0
CLEANOUT ELEVATION: 478.50
WEIR CREST ELEV.: 480.0

**STONE/RIPRAP OUTLET ST IV
SEDIMENT TRAP # 6**

DRAINAGE AREA: 9.8 AC±
VOLUME REQ'D.: 35,280 CF±
VOLUME PROV'D.: 37,818 CF±
WET STORAGE ELEV. ZONE: 463-466.75
WET STORAGE REQ'D.: 17,640 CF±
WET STORAGE PROV'D.: 19,399.88 CF±
DRY STORAGE ELEV. ZONE: 466.75-469
DRY STORAGE REQ'D.: 17,640.00 CF±
DRY STORAGE PROV'D.: 18,478.00 CF±
BOT. DIMENSIONS: 155' x 30'
SIDE SLOPES: 2:1
WEIR LENGTH: 40'
TRAP/BASIN DEPTH: 6.00'
TOP EMBANKMT ELEV.: 470.00
BOTTOM ELEV.: 463.00
CLEANOUT ELEV.: 465.00
WEIR CREST ELEV.: 466.75

**STONE/RIPRAP OUTLET ST IV
SEDIMENT TRAP # 5**

DRAINAGE AREA: 5.66 AC±
VOLUME REQ'D.: 20,376.0 CF±
VOLUME PROV'D.: 20,911.8 CF±
WET STORAGE ELEV. ZONE: 449-453
WET STORAGE REQ'D.: 10,188 CF±
WET STORAGE PROV'D.: 10,243 CF±
DRY STORAGE ELEV. ZONE: 453-455.5
DRY STORAGE REQ'D.: 10,188 CF±
DRY STORAGE PROV'D.: 10,668.75 CF±
BOT. DIMENSIONS: 75' x 24'
SIDE SLOPES: 2:1
WEIR LENGTH: 23'
TRAP/BASIN DEPTH: 6.50'
TOP EMBANKMT ELEV.: 456.50
BOTTOM ELEV.: 449.00
CLEANOUT ELEV.: 451.25
WEIR CREST ELEV.: 453.00

LEGEND

- R/W LINE
- PROPERTY LINE
- EXISTING GRADE
- PROPOSED GRADE
- LIMIT OF DISTURBANCE
- EX. TREE LINE
- TREE LINE TO REMAIN
- MODIFICATION E
- PROPOSED VIKI GRADING (10-95)
- EARTH DIKE
- RRP

PROPERTY LINE SURVEYED BY TEETS POWELL & ASSOCIATES
SEPTEMBER, OCTOBER 1995, AND FEBRUARY 1996
TOPOGRAPHY IS FROM POTOMAC AERIAL SURVEYS (10-89) AND VIKI, INC. (10-95)

MINING PERMIT # 77-SP-0045-D

SEE SHEET 6 OF 10 FOR
ENLARGED PLAN OF TRAPS

FREDERICK SOIL CONSERVATION DISTRICT

Approved By *Dawn Early*
District Manager

Date *11/12/09*

Reviewed for FREDERICK S.C.D.
and meets Technical Requirements

M. Selt *11/16/09*
Signature Date

U.S. Soil Conservation Service

SCD and SCS approval for sediment and erosion control is contingent upon issuance of all applicable regulatory permits.

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT

Denny Rasmussen *10/22/12*
DISTRICT MANAGER DATE

REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT

Denny Rasmussen *5/17/19*
DISTRICT MANAGER DATE

REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

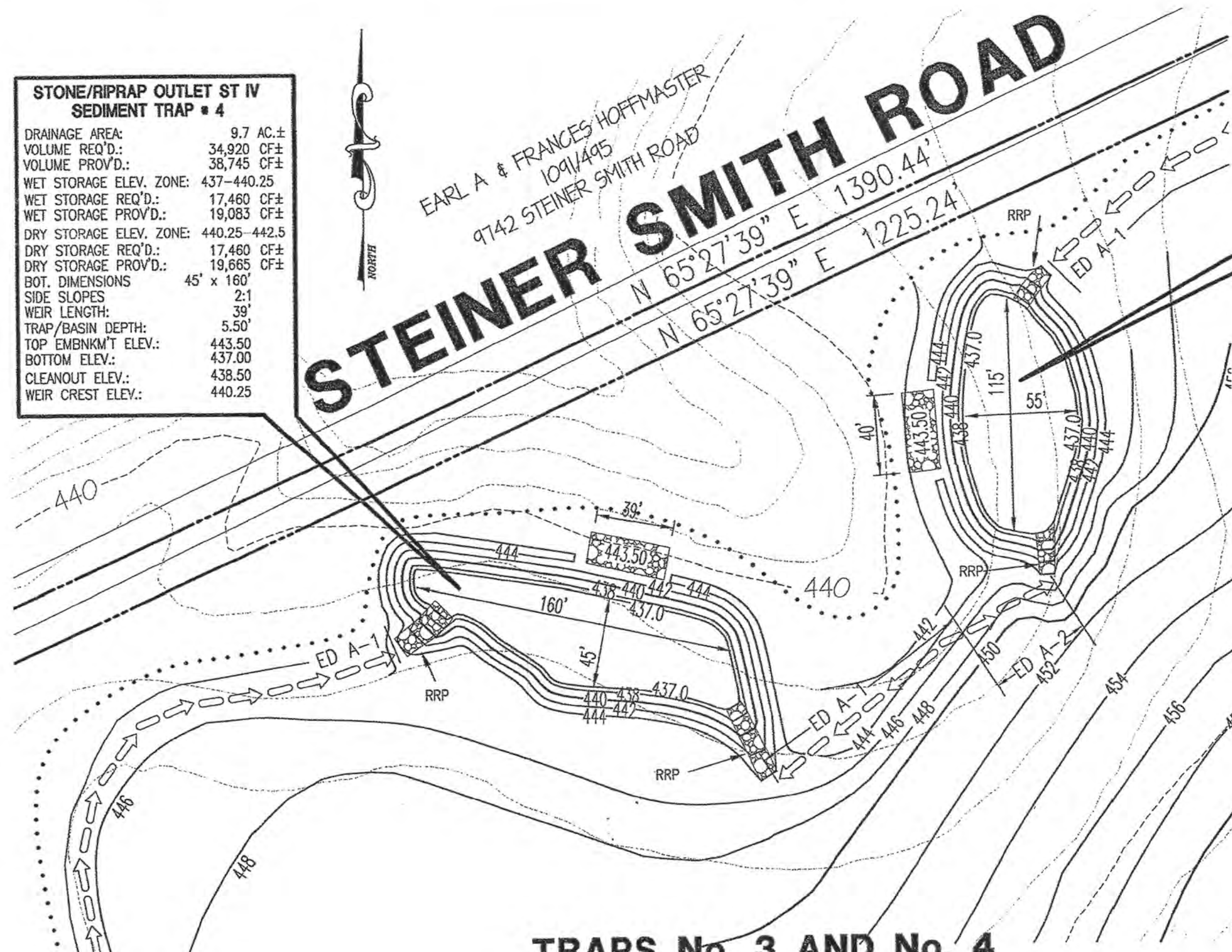


GRADING PLAN
for
BARRICK QUARRY
77-SP-0045-G
FREDERICK COUNTY, MARYLAND

S. W. Barrick & Sons, Inc.
11609 Legore Bridge Road
Woodsboro, Maryland 21789
Phone: (301) 845-6343
Fax: (301) 845-2396
www.swbarrick.com

DESIGN BY: FSH
DRAWN BY: JEL
CHECKED BY: TJS
SCALE: AS NOTED
DATE: 03/27/2012
SHEET # 5 of 18

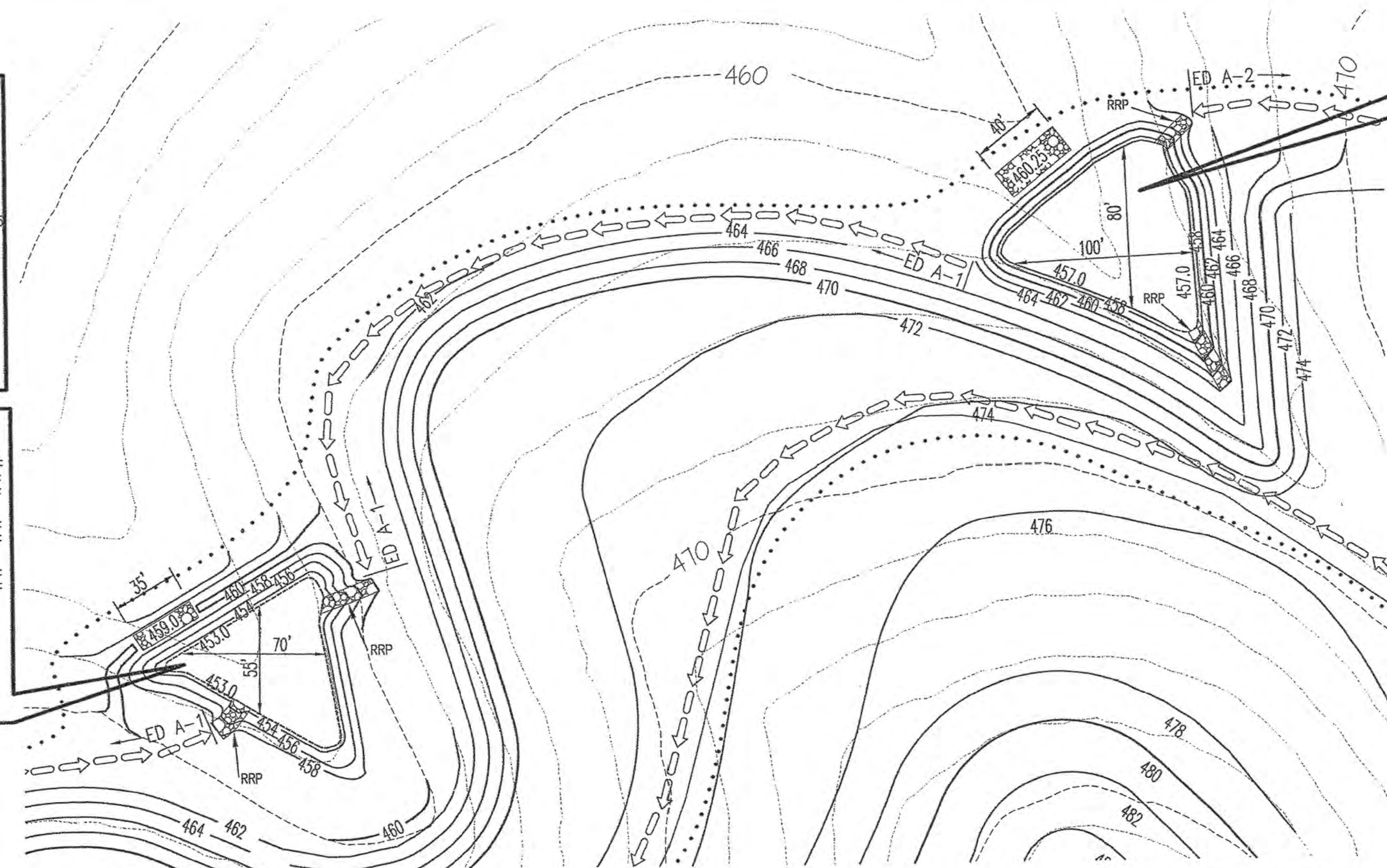
REVISIONS	
1	S.C.D. 5/18/12 WEL
2	S.C.D. 10/5/12 WEL
3	
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TRAPS No. 3 AND No. 4
SCALE : 1" = 50'

STONE/RIPRAP OUTLET ST IV SEDIMENT TRAP # 4	
DRAINAGE AREA:	9.97 AC.±
VOLUME REQ'D.:	35,892 CF±
VOLUME PROV'D.:	38,745 CF±
WET STORAGE ELEV. ZONE:	437-440.25
WET STORAGE REQ'D.:	17,480 CF±
WET STORAGE PROV'D.:	19,083 CF±
DRY STORAGE ELEV. ZONE:	440.25-442.5
DRY STORAGE REQ'D.:	17,480 CF±
DRY STORAGE PROV'D.:	19,665 CF±
BOT. DIMENSIONS	45' x 160'
SIDE SLOPES	2:1
WEIR LENGTH:	39'
TRAP/BASIN DEPTH:	5.50'
TOP EMBANKMT ELEV.:	443.50
BOTTOM ELEV.:	437.00
CLEANOUT ELEV.:	438.50
WEIR CREST ELEV.:	440.25

STONE/RIPRAP OUTLET ST IV SEDIMENT TRAP # 2	
DRAINAGE AREA:	8.7 AC.±
VOLUME REQ'D.:	31,320 CF±
VOLUME PROV'D.:	33,907 CF±
WET STORAGE ELEV. ZONE:	453-456
WET STORAGE REQ'D.:	15,680 CF±
WET STORAGE PROV'D.:	16,159 CF±
DRY STORAGE ELEV. ZONE:	456-458.25
DRY STORAGE REQ'D.:	15,680 CF±
DRY STORAGE PROV'D.:	17,749 CF±
BOT. DIMENSIONS	70' x 50'
SIDE SLOPES	2:1
WEIR LENGTH:	35'
TRAP/BASIN DEPTH:	5.25'
TOP EMBANKMT ELEV.:	458.25
BOTTOM ELEV.:	453.00
CLEANOUT ELEV.:	454.50
WEIR CREST ELEV.:	456.00



TRAPS No. 1 AND No. 2
SCALE : 1" = 50'

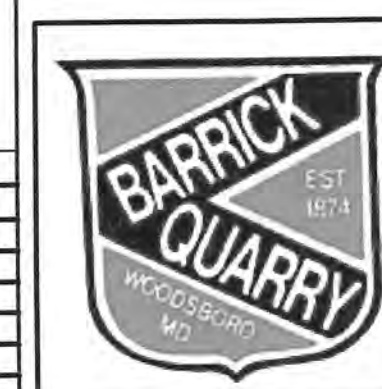
STONE/RIPRAP OUTLET ST IV SEDIMENT TRAP # 1	
DRAINAGE AREA:	9.97 AC.±
VOLUME REQ'D.:	35,892 CF±
VOLUME PROV'D.:	36,341 CF±
WET STORAGE ELEV. ZONE:	457-460.25
WET STORAGE REQ'D.:	17,946 CF±
WET STORAGE PROV'D.:	18,073 CF±
DRY STORAGE ELEV. ZONE:	460.25-462.5
DRY STORAGE REQ'D.:	17,946 CF±
DRY STORAGE PROV'D.:	18,268 CF±
BOT. DIMENSIONS	80' x 100'
SIDE SLOPES	2:1
WEIR LENGTH:	40'
TRAP/BASIN DEPTH:	5.50'
TOP EMBANKMT ELEV.:	463.50
BOTTOM ELEV.:	457.00
CLEANOUT ELEV.:	458.75
WEIR CREST ELEV.:	460.25

PROPERTY LINE SURVEYED BY TEETS POWELL & ASSOCIATES
SEPTEMBER, OCTOBER 1995, AND FEBRUARY 1996
TOPOGRAPHY IS FROM POTOMAC AERIAL SURVEYS (10-89)
AND VIKI, INC. (10-95)
MINING PERMIT # 77-SP-0045-D

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT
Denny Borching 5/17/19
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL
REQUIREMENTS

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT
Denny Borching 10/22/12
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL
REQUIREMENTS

FREDERICK SOIL CONSERVATION DISTRICT
Approved By *Dawn Early*
Date 11/12/99 District Manager
Reviewed for FREDERICK S.C.D.
and meets Technical Requirements
H. A. H. 11/12/99
Signature Date
U.S. Soil Conservation Service
SCD and SCS approval for sediment and erosion
control is contingent upon issuance of all
applicable regulatory permits.

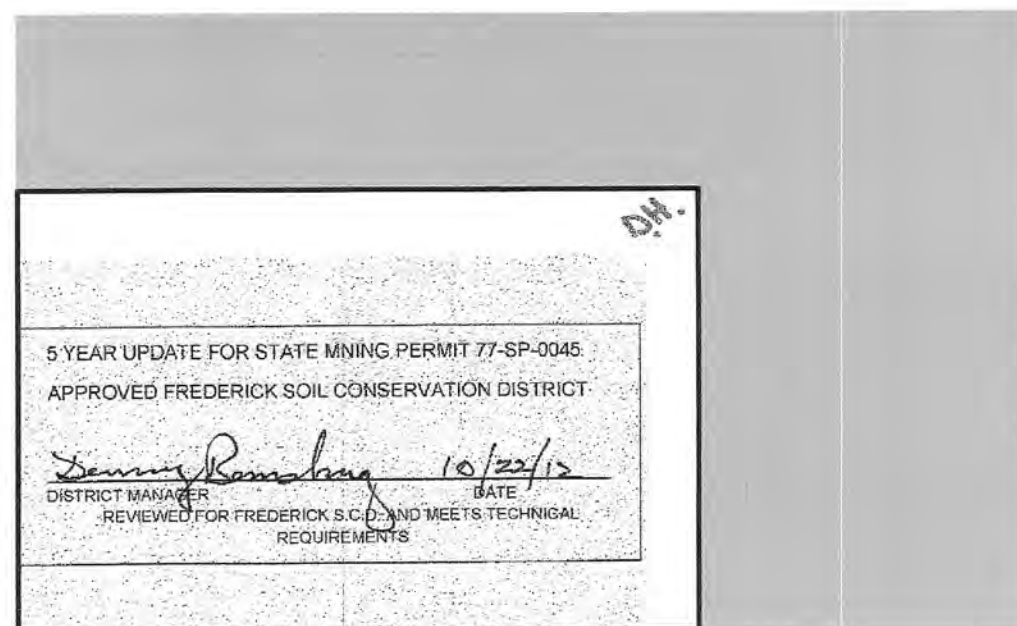
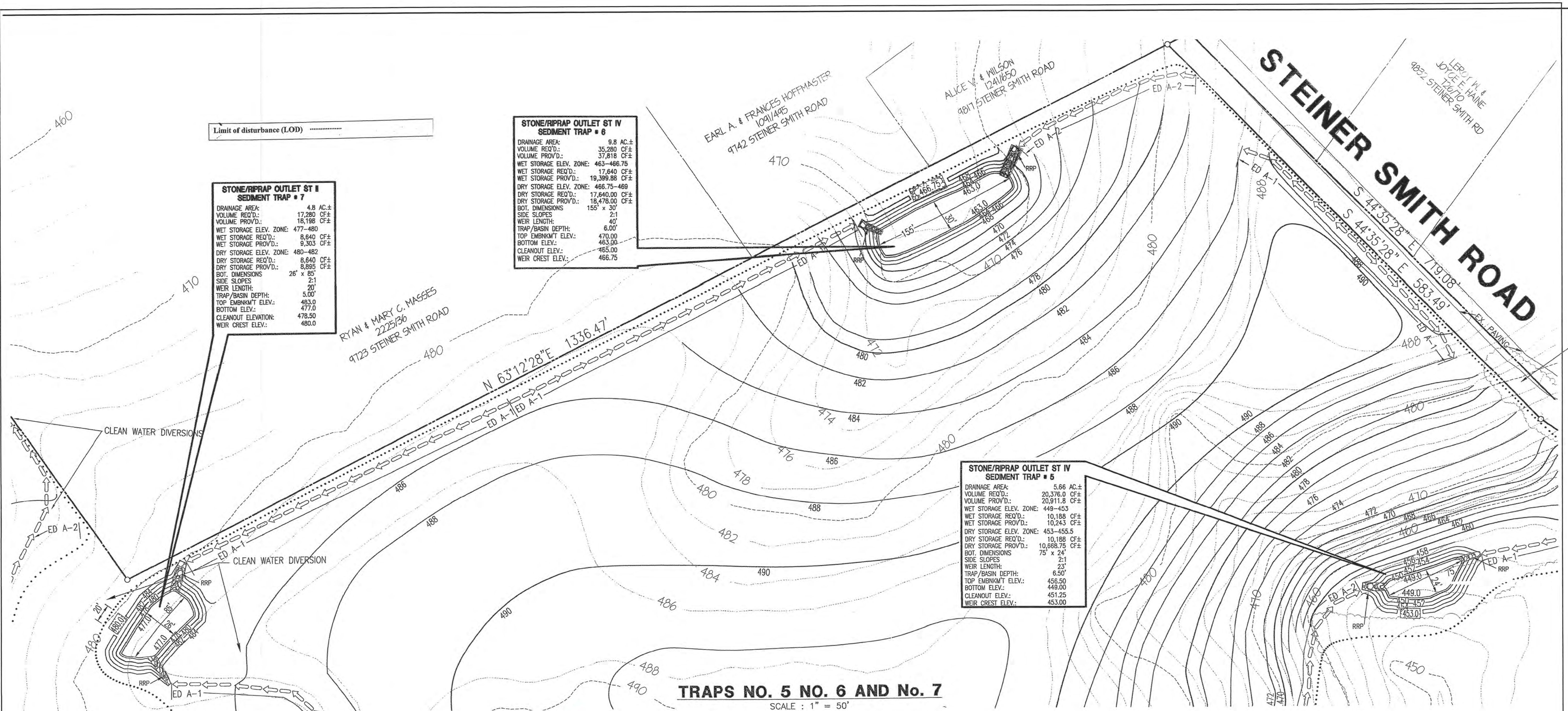


OVERBURDEN TRAP DETAIL PLAN
for
BARRICK QUARRY
77-SP-0045-G
FREDERICK COUNTY, MARYLAND

S. W. Barrick & Sons, Inc.
11609 Legore Bridge Road
Woodsboro, Maryland 21789
Phone: (301) 845-6343
Fax: (301) 845-2396
www.swbarrick.com

REVISIONS	
1.	S.C.D. 5/18/12 WEL
2.	S.C.D. 10/5/12 WEL
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DESIGN BY: *FSH*
DRAWN BY: *WEL*
CHECKED BY: *TJS*
SCALE: AS NOTED
DATE: 03/27/2012
SHEET # 5 of 10



5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT

Denny Ransburg
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

FREDERICK SOIL CONSERVATION DISTRICT

Approved By *Dawn Early*
District Manager
Date *11/12/99*

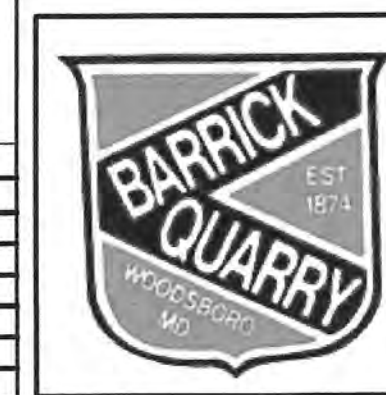
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H. Sitt *11/12/99*
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U.S. Soil Conservation Service

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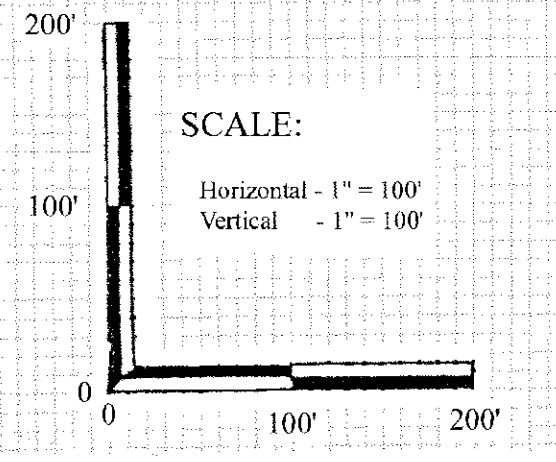
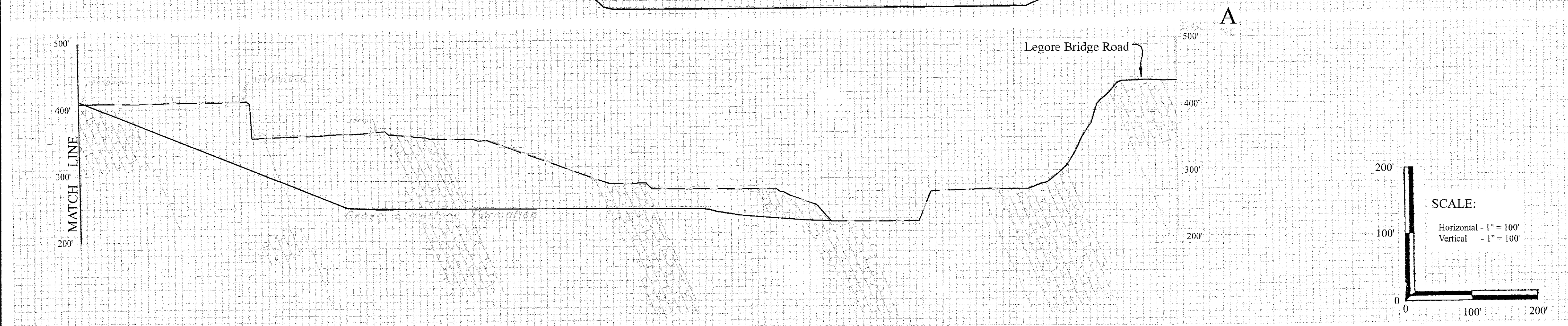
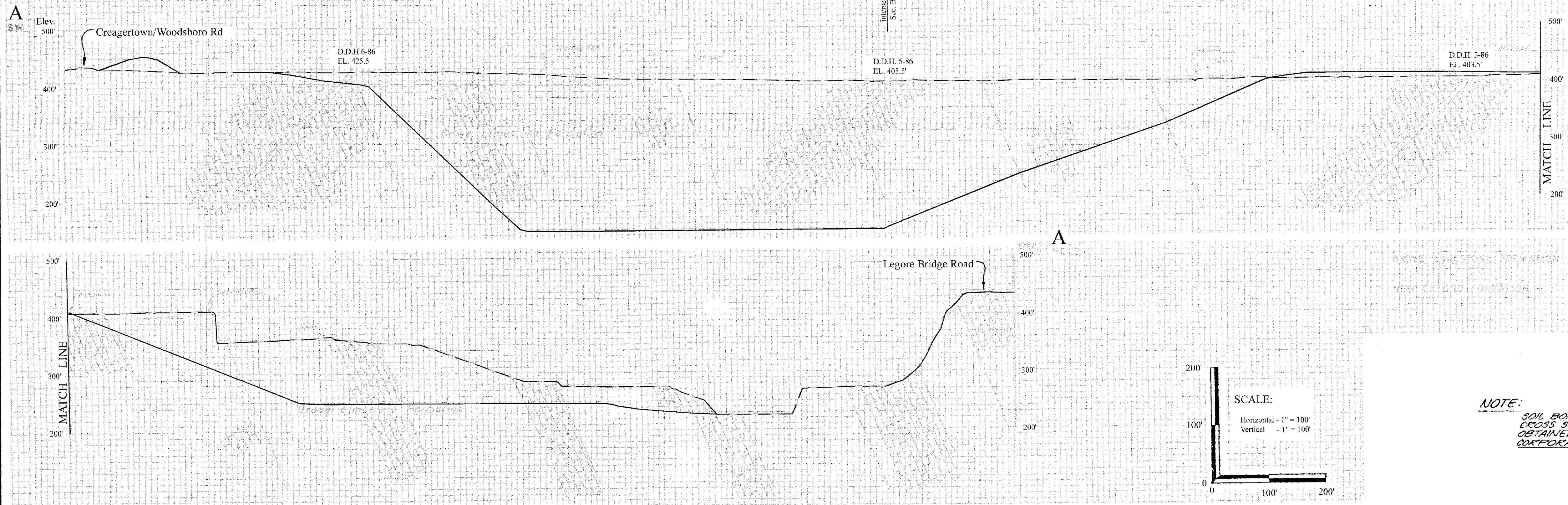
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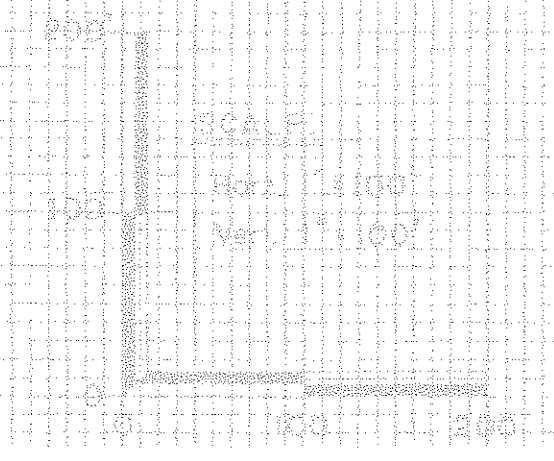
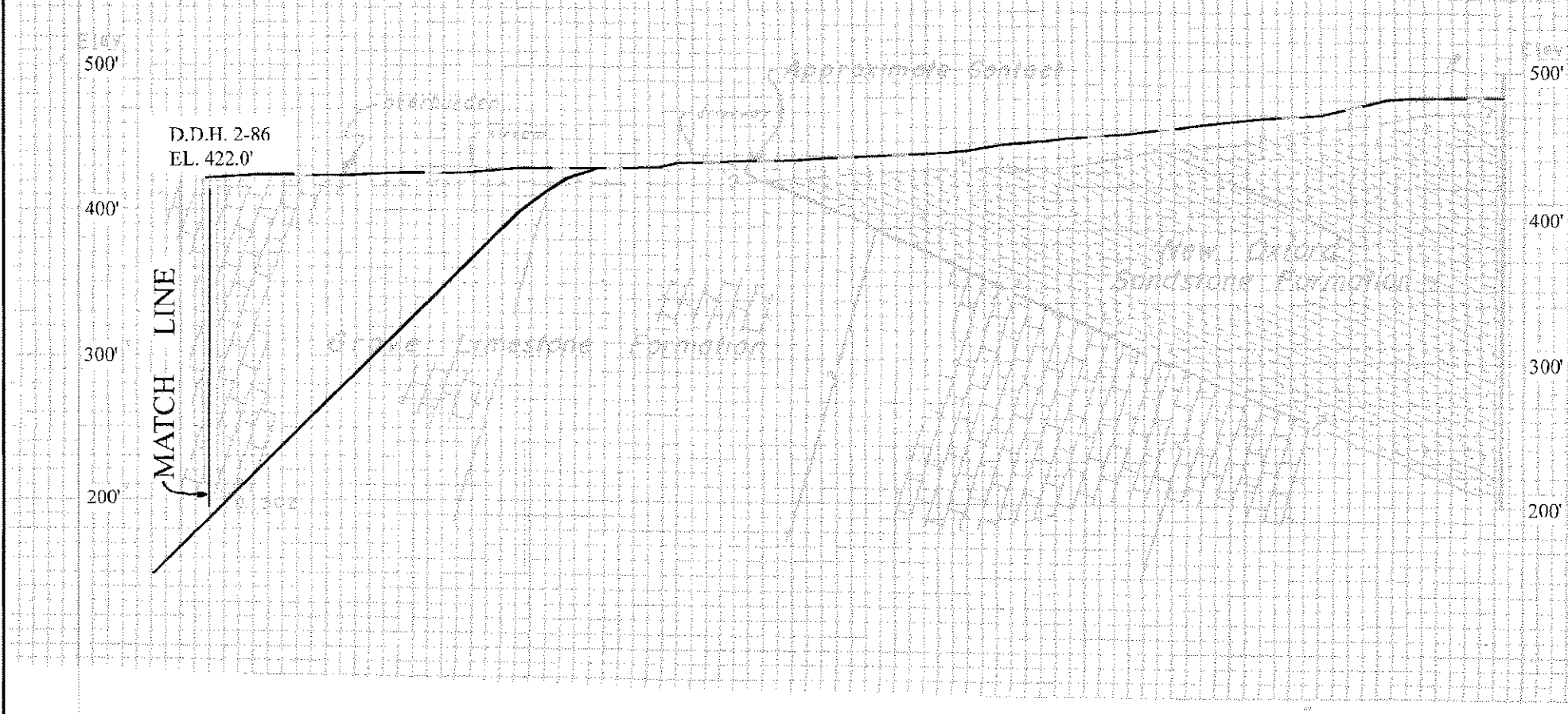
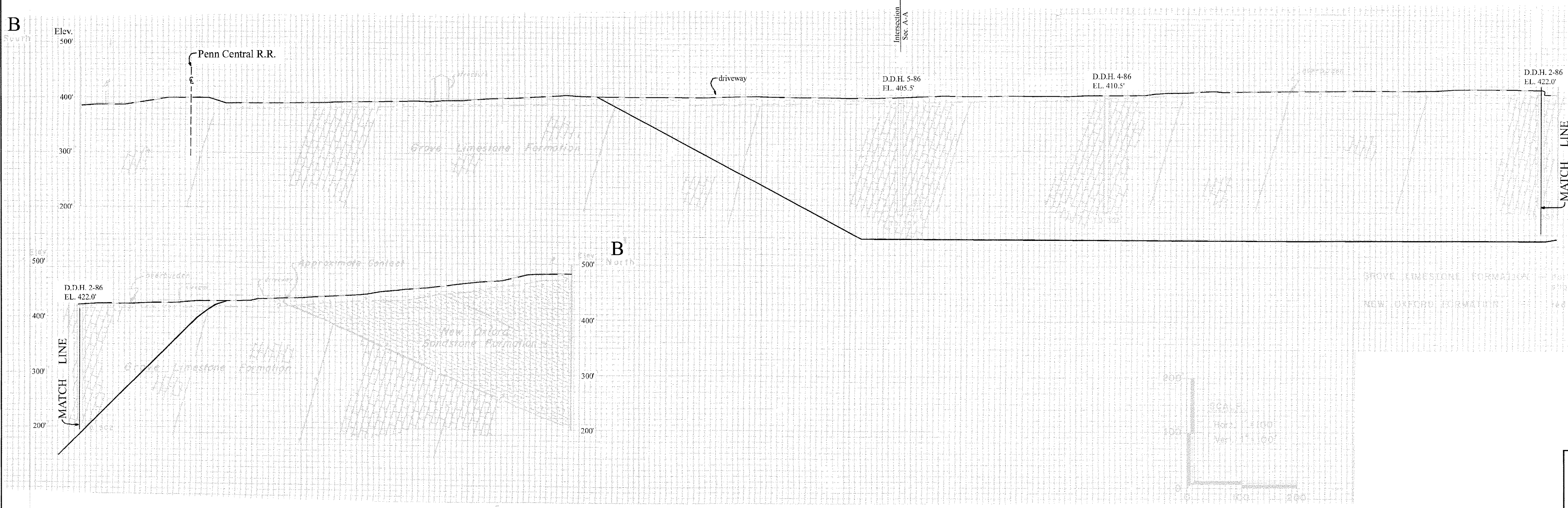
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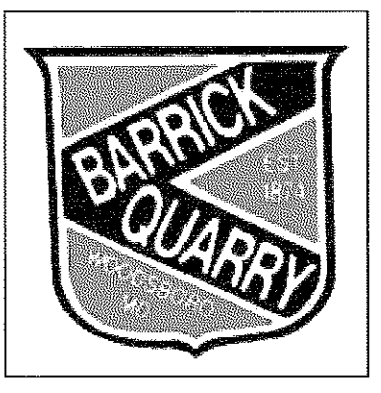
DESIGN BY: *ESM*
DRAWN BY: *WEL*
CHECKED BY: *TJS*
SCALE: *AS NOTED*
DATE: 03/27/2012
SHEET # *2* of *10*



NOTE:
SOIL BORING LOCATIONS AND
CROSS SECTIONAL INFORMATION
OBTAINED FROM QUINN GEOSCIENCE
CORPORATION TEST DATED OCT. 1996.



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CROSS SECTION SHEET
for
BARRICK QUARRY
77-SP-0045-G
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DESIGN BY: FSH
DRAWN BY: WEL
CHECKED BY: TJS
SCALE: AS NOTED
DATE: 03/27/2012
SHEET # 8 of 10

21.0 STANDARDS AND SPECIFICATIONS FOR TOPSOIL

Definition

Placement of topsoil over a prepared subsoil prior to establishment of permanent vegetation.

Purpose

To provide a suitable soil medium for vegetation growth. Soils of concern have low moisture content, low nutrient levels, low pH, and are toxic to plants, and/or unacceptable soil gradation.

Conditions Where Practice Applies

- This practice is limited to areas having 2:1 or flatter slopes where:
- The texture of the exposed subsoil/forest material is not adequate to produce vegetation growth.
- The soil material is so shallow that the rooting zone is not deep enough to support plants or to have continuing supplies of moisture and plant nutrients.
- The original soil to be vegetated contains mineral toxic to plant growth.
- The soil is so acidic that treatment with limestone is not feasible.

6. For the purpose of these Standards and Specifications, areas having slopes steeper than 2:1 require special consideration and design for adequate stabilization. Areas having slopes steeper than 2:1 shall have the appropriate stabilization shown on the plans.

Construction and Material Specifications

- Topsoil salvaged from the existing site may be used provided that it meets the standards set forth in these specifications. Typically, the depth of topsoil to be salvaged for a given material of concern shall be determined by representative soil profile section in the Soil Survey conducted by USDA-CES in cooperation with Maryland Agricultural Experiment Station.

- Topsoil Specifications - Soil to be used as topsoil must meet the following:

a. Topsoil shall be a loam, sandy loam, clay loam, silt loam, sandy clay loam, loamy sand. Other soils may be used if recommended by the appropriate authority. Topsoil approved by the appropriate authority. Topsoil shall not be a mixture of different soil types. Subsoils and shall contain less than 5% by volume of clumps, stones, slag, coarse fragments, roots, rocks, roots, clumps, or other materials larger than 1 and 1/2" in diameter.

b. Topsoil must be free of plants or plant parts such as Bermuda grass, quackgrass, Johnsongrass, nutgrass, poison ivy, thistle, or others as specified.

c. When the subsoil is either highly acidic or composed of heavy clays, ground limestone shall be applied at the rate of 4-8 tons/acre (200-400 pounds per 1,000 square feet) prior to the placement of topsoil. Lime shall be distributed uniformly over designated areas and worked into the soil in conjunction with those operations as directed in the following procedures.

- For sites having disturbed areas under 5 acres:

i. Place topsoil (if required) and apply soil amendments as specified in 21.0 Vegetative Stabilization - Section 1 - Vegetative Stabilization Methods and Materials.

- For sites having disturbed areas over 5 acres:

i. On soil meeting topsoil specifications, obtain test results detailing fertilizer and lime amendments required to bring the soil into compliance with the following:

a. pH for topsoil shall be between 6.0 and 7.5. If the tested soil demonstrates a pH of less than 6.0, sufficient lime shall be prescribed to raise the pH to 6.0 or higher.

b. Organic content of topsoil shall be not less than 1.5 percent by weight.

c. Topsoil having salinity soil content greater than 500 parts per million shall not be used.

d. No top or subsoil shall be placed on soil which has been treated with soil sterilants or chemicals used for weed control until sufficient time has elapsed (14 days min.) to permit dissipation of phytotoxic materials.

NOTE: Topsoil substitutes or amendments, as recommended by a qualified agricultural or soil scientist and approved by the appropriate approval authority, may be used in lieu of natural topsoil.

- Place topsoil (if required) and apply soil amendments as specified in 21.0 Vegetative Stabilization - Section 1 - Vegetative Stabilization Methods and Materials.

- Topsoil Application

1. When topsoiling, maintain needed erosion and sediment control practices such as dimensions, Grade Stabilization Structures, Earth Dikes, Slope Silt Fence and Sediment Traps and Basins.

2. Grades on the areas to be topsoiled, which have been previously established, shall be maintained, about 4" - 8" higher in elevation.

3. Topsoil shall be uniformly distributed in a 4" - 8" layer and lightly compacted to a minimum thickness of 4". Spreading shall be performed in such a manner that sodding or seeding can proceed with a minimum of additional soil preparation and tillage. Any irregularities in the surface resulting from topsoiling or other operations shall be corrected in order to prevent the formation of depressions or water pockets.

4. Topsoil shall not be placed while the topsoil or subsoil is in a frozen or muddy condition, when the subsoil is excessively wet or in a condition that may otherwise be detrimental to proper grading and seeded preparation.

5. Any project that has a state issued N.O.I. permit must document each inspection and maintain an inspection log. (Please see the N.O.I. for details).

6. All erosion and sediment control measures shall be installed and maintained in continuous compliance with the latest version of the 2011 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL.

7. All utilities, such as storm drain, public water, sanitary sewer, electric power, telephone, cable, and gas lines that are not in good order and are not undergoing active grading shall be temporarily or permanently stabilized within 3 days of initial disturbance.

8. The owner/developer or their designee is responsible for conducting routine inspections and regular maintenance. The site and controls should be inspected weekly and the next day after each rain event. Any accumulated sediment shall be removed and disposed of in a suitable area and shall be temporary or permanently stabilized.

9. Any project that has a state issued N.O.I. permit must document each inspection and maintain an inspection log. (Please see the N.O.I. for details).

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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 the following schedule: Apply 2 tons per acre dolomitic limestone (92 lbs/1000 s.f.) And 800 lbs. / acre (20.7 lbs./1000s.f.) of 10-20-20 before seeding. Harrow or disc into upper 3 in. Of soil.

SEEDING: Apply a mixture of Turf Type Tall fescue (80%) and Hard Fescue (20%) in accordance with seeding dates and rates shown in the Permanent Seeding Summary shown on this sheet. For stabilization outside of the seeding dates, apply straw mulch at rates and methods specified below and apply permanent seeding within proper seeding dates.

MULCHING: Immediately following seeding, apply a uniform 1-2 in. Deep layer of un-rotted small grain straw at a rate of 2 tons/acre. (Apply 2.5 tons/acre if a mulch anchoring tool is used). Straw may be anchored with wood cellulose fiber at a rate of 750 lbs. / acre mixed at a ratio of 50 lbs. Of wood fiber/ 100 gal. of water. Synthetic liquid binders such as Terra Tex II, Acrylic DLR (Agra- Tack), DCA-70, Petrosol and other approved equals may be used at rates recommended by the manufacturers.

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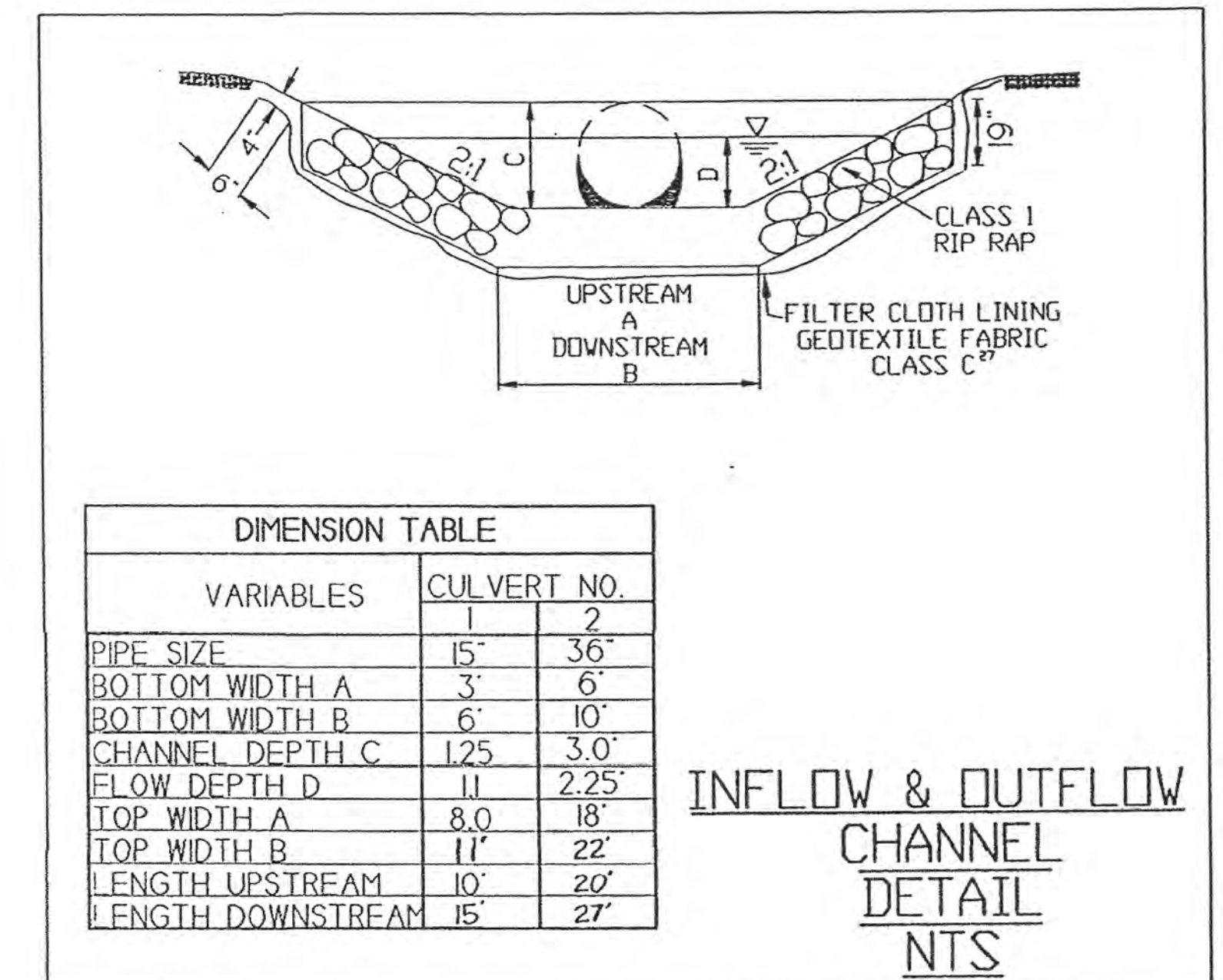
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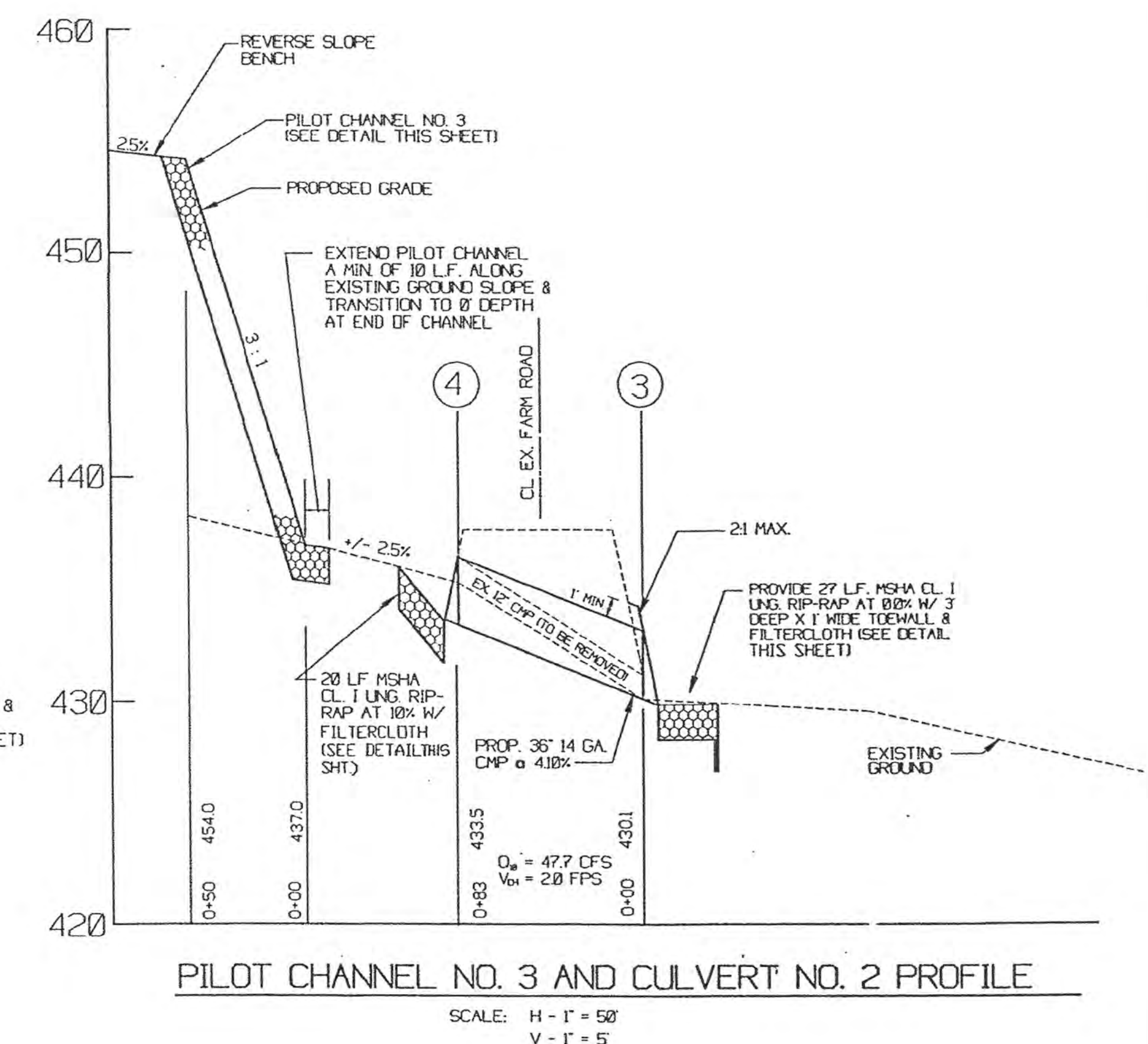
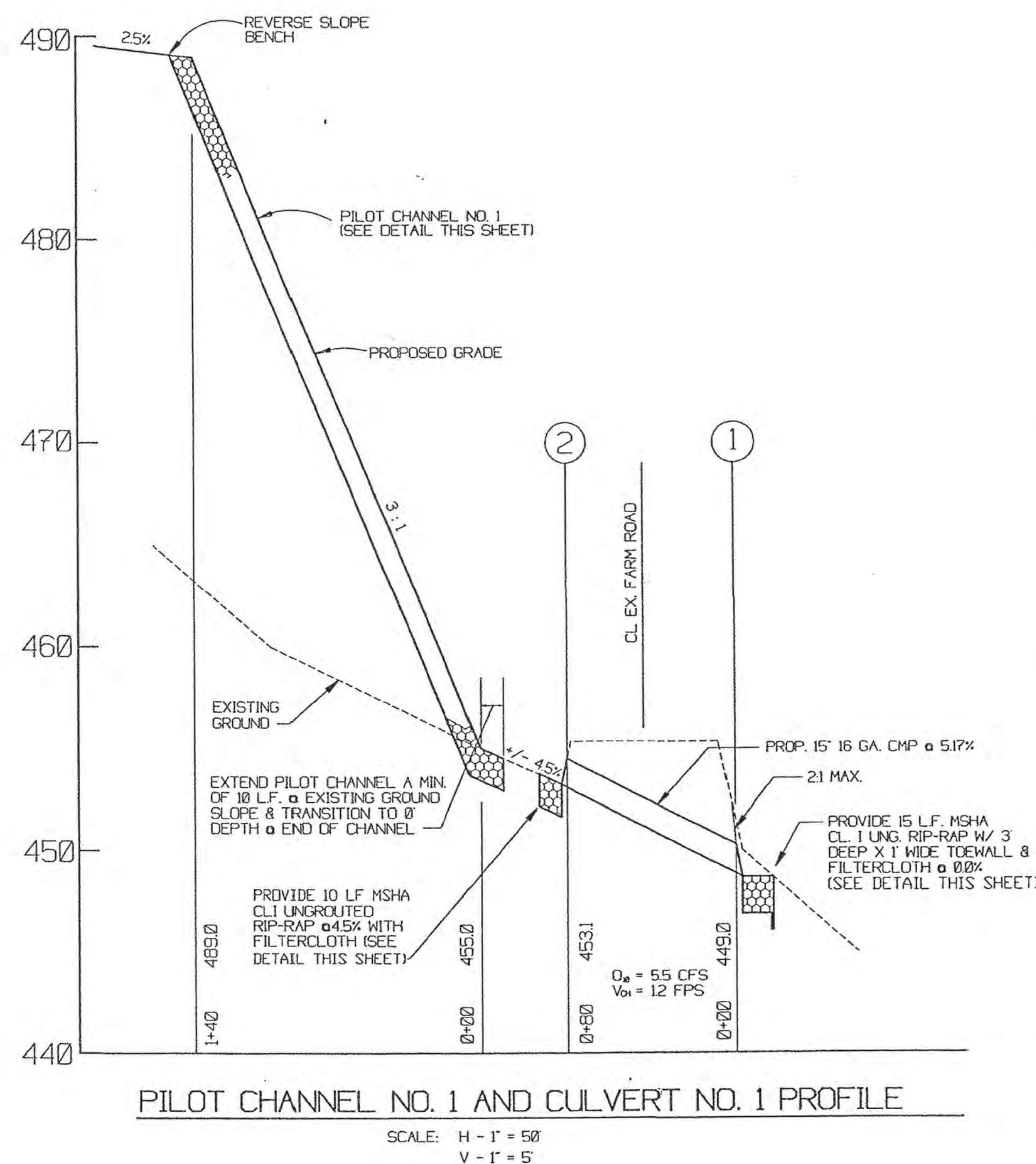
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STRUCTURE TABLE	
STRUCTURE NO.	STRUCTURE TYPE
1	MSHA STD. NO. MD-370.01 15' CMP ENDSECTION
2	MSHA STD. NO. MD-370.01 15' CMP ENDSECTION
3	MSHA STD. NO. MD-370.01 36' CMP ENDSECTION
4	MSHA STD. NO. MD-370.01 36' CMP ENDSECTION



SCD and NRCS approval for sediment and erosion control is contingent upon issuance of all applicable regulatory permits.

FREDERICK SOIL CONSERVATION DISTRICT

Approved By Drum Parley

Date: 1/17/96

Reviewed for FREDERICK S.C.D.
and meets Technical Requirements

Approved By R. MacLeod
District Conservationist

Date: 01-16-96

NATURAL RESOURCES CONSERVATION SERVICE

5 YEAR UPDATE FOR STATE MNING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT

Denny Lennings 5/17/19
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL
REQUIREMENTS

5 YEAR UPDATE FOR STATE MINING PERMIT 77-SP-0045
APPROVED FREDERICK SOIL CONSERVATION DISTRICT

Devin Ransburg 10/22/12
DISTRICT MANAGER DATE
REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL
REQUIREMENTS

APPROVED FREDERICK SOI
CONSERVATION DISTRICT



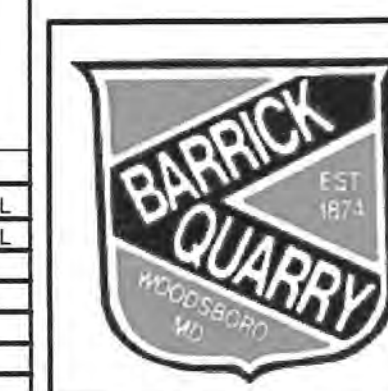
 DISTRICT MANAGER DATE

REVIEWED FOR FREDERICK S.C.D. AND MEETS TECHNICAL REQUIREMENTS

DISTRICT CONSERVATIONIST
NATURAL RESOURCES CONSERVATION SERVICE

SCD AND NRCS APPROVAL FOR SEDIMENT AND EROSION CONTROL IS
CONTINGENT UPON ISSUANCE OF ALL APPLICABLE REGULATORY PERMITS

REVISIONS		
1.	S.C.D. 5/16/12	WE
2.	S.C.D. 10/5/12	WE
3.		
4.		
5.		
6.		
7.		
8.		
9.		



E&S CONTROL NOTES & DETAILS
for
BARRICK QUARRY
77-SP-0045-G
FREDERICK COUNTY, MARYLAND

S. W. Barrick & Sons, Inc.
11609 Legore Bridge Road
Woodsboro, Maryland 21789
Phone: (301) 845-6343
Fax: (301) 845-2396
www.swbarrick.com

DESIGN BY: F.S.H.
DRAWN BY: WEL
CHECKED BY: T.J.S.
SCALE: AS NOTED
DATE: 03/27/2012
SHEET #: 10 of 10