

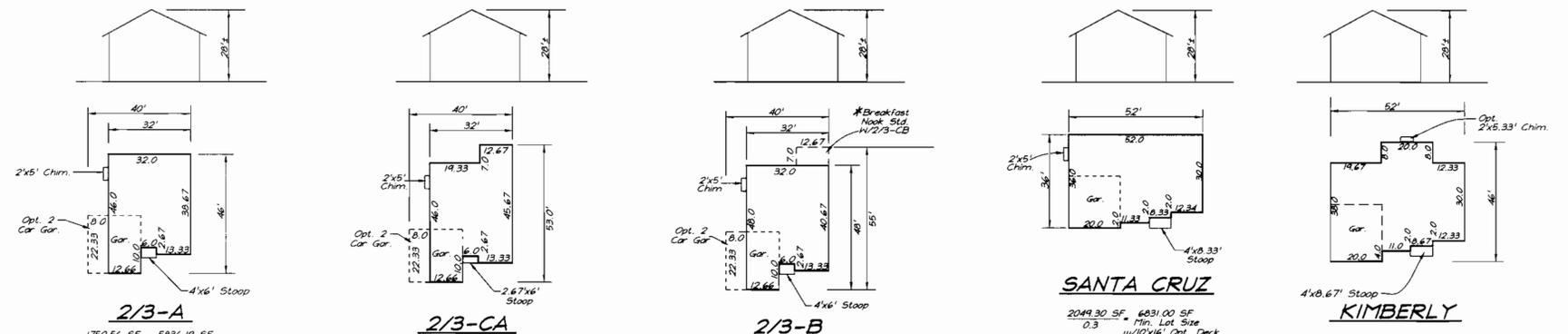
1/4-A
1850.23 SF = 6167.48 SF
0.3 Min. Lot Size w/10'x16' Deck & 2 Car Gar.

1/4-B
1923.75 SF = 6412.50 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck And 2 Car Gar.

1/4-CA
1840.49 SF = 6134.97 SF
0.3 Min. Lot Size (2 Car Gar.) w/10'x16' Opt. Deck

DIMENSION 6
1884.32 SF = 6614.40 SF
0.3 Min. Lot Size And 2' Opt. Exts.

VISTA
1657.98 SF = 5526.6 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck



2/3-A
1750.56 SF = 5836.19 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

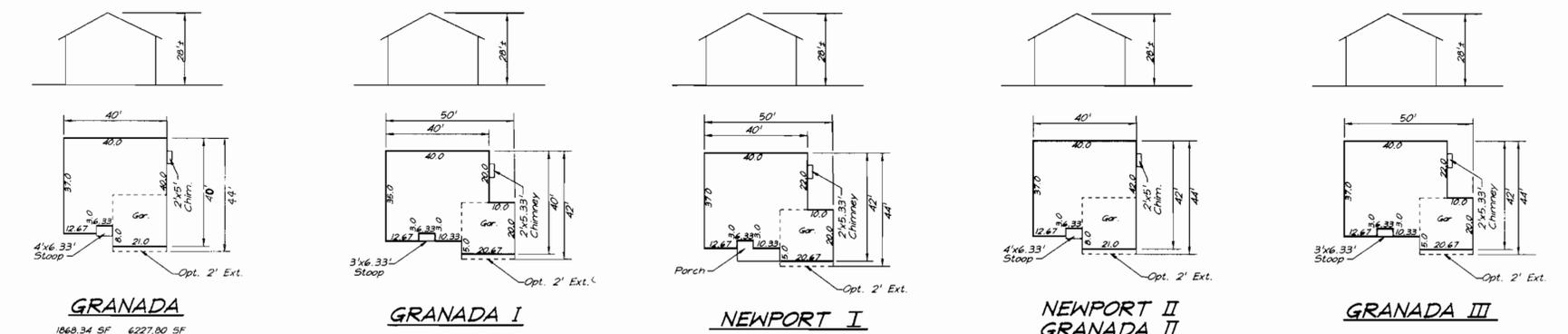
2/3-CA
1821.57 SF = 6071.89 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck And Opt. 2 Car Gar.

2/3-B
1919.14 SF = 6397.14 SF
0.3 Min. Lot Size (2 Car Gar. w/Nook) And 10'x16' Deck

2/3-CB*
1840.49 SF = 6134.97 SF
0.3 Min. Lot Size (2 Car Gar.) w/10'x16' Opt. Deck

SANTA CRUZ
2049.30 SF = 6831.00 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

KIMBERLY
2146.02 SF = 7153.40 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck



GRANADA
1868.34 SF = 6227.00 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

GRANADA I
1865.35 SF = 6217.83 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

GRANADA II
1803.33 SF = 6011.10 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

GRANADA III
1945.35 SF = 6484.50 SF
0.3 Min. Lot Size w/2' Opt. Ext. And 10'x16' Opt. Deck

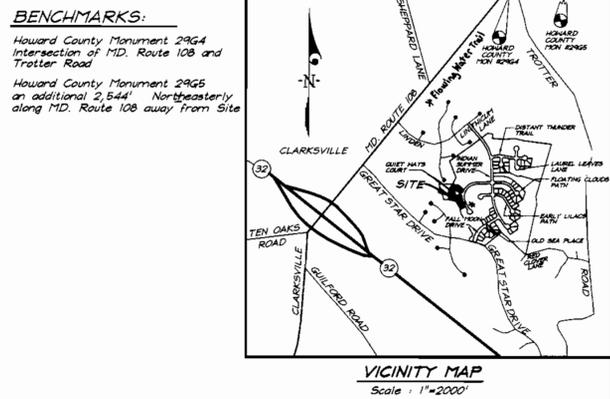
CUSTOM KIMBERLY
2246.02 SF = 7486.73 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

ADDRESS CHART

LOT NUMBER	STREET ADDRESS
148	5908 QUIET WAYS COURT
149	5912 QUIET WAYS COURT
150	5916 QUIET WAYS COURT
151	5917 QUIET WAYS COURT
269	5900 QUIET WAYS COURT
270	5904 QUIET WAYS COURT
271	5913 QUIET WAYS COURT
272	5909 QUIET WAYS COURT
273	5905 QUIET WAYS COURT
274	12156 FLOWING WATER TRAIL
156	12160 FLOWING WATER TRAIL
157	12164 FLOWING WATER TRAIL
158	12168 FLOWING WATER TRAIL

SHEET INDEX

DESCRIPTION	SHEET No.
COVER SHEET	1 of 4
SITE DEVELOPMENT / LANDSCAPE PLAN	2 of 4
SEDIMENT AND EROSION CONTROL PLAN	3 of 4
SEDIMENT AND EROSION CONTROL DETAILS	4 of 4



- GENERAL NOTES:**
- Subject property is zoned: NTSFLD per 10-18-93 Comprehensive Zoning Plan.
 - The total area included in this submission is 2.43 Acres.
 - The total number of lots included in this submission is: 13
 - Improvement to property: Single Family Detached
 - The maximum lot coverage permitted is: 30%
 - Department of Planning and Zoning reference file numbers: 5-93-21, P-95-11, F-96-130, F-98-120.
 - Utilities shown as existing are taken from approved Water and Sewer plans Contract #34-3420-D, approved Road Construction plans F-96-130, and actual field survey.
 - Any damage to county owned rights-of-way shall be corrected at the developer's expense.
 - All roadways are public and existing.
 - The existing topography was taken from Road Construction Plans prepared by Daft, Maune, Walker, Inc. 7-10-97
 - The coordinates shown hereon are based upon the Howard County Geodetic Control which is based upon the Maryland State Plane Coordinate System - Howard County Monuments Numbers: 2964 & 2965
 - The contractor shall notify the Department of Public Works/ Division of Construction Inspection from Section 4 Area 5, F-96-102 at least twenty-four (24) hours prior to the start of work.
 - The contractor shall notify "Miss Utility" at 1-800-257-7777 at least 48 hours prior to any excavation work.
 - For driveway entrance details, refer to Ho. Co. Design Manual Volume IV details R.6.03 & R.6.05.
 - In accordance with FDP-Phase 222-A, Part 4 bay windows or chimneys not more than 10 feet in width may project not more than 4 feet into any setbacks; porches and decks may project not more than 3 feet into the front or rear setbacks. Awnings may not project into any setbacks.
 - Stormwater Management quantity and quality for the improvements from Bright Flow Ponds, area North of Distant Thunder Trail DA to 17309 from Section 4 Area 5, F-96-102 will be provided by an excavated pond East of Distant Thunder Trail. Said pond will be jointly maintained. Stormwater Management quantity for the improvements West of Indian Summer Drive and South of Sunlit Water Way is provided by Village of River Hill Section 4 Area 1, Phase 1, F-96-110. Water quality will be provided by bio-retention or shallow marsh at the storm drain outfalls and will be jointly maintained. Stormwater Management quantity for the improvements East of Indian Summer Drive and South of Distant Thunder Trail are provided for in Section 4 Area 1, F-96-110 by proposed features as described in a report prepared by Whitman, Regardt & Associates and approved as of 1/20/95. Water quality will be provided by bio-retention or shallow marsh at the storm drain outfalls and will be jointly maintained.
 - SHC Elevations shown are at the property lines.
 - This plan has been prepared in accordance with the provisions of section 16.124 of the Howard County code and Landscape Manual. Financial Surety for the trees in Schedule A in the amount of \$2,100,000 shall be part of the Builders Grading Permit Application for Lots 269 and 274. (See sheet 3.)
 - This property is exempt from the Forest Conservation requirements per section 16.1202 (b)(1)(iv) of the Howard County Code because it is part of a planned unit Development with preliminary plan approval prior to 12/31/92

SPECIAL NOTES:
This plan is for house siting and lot grading only. Improvements shown within the rights-of-way on this S.D.P. are not to be used for construction. For construction, see approved Road Construction Plans F-96-130 and/or approved Water and Sewer Plans Contract #34-3420-D.

OWNER / DEVELOPER
THE HOWARD RESEARCH AND DEVELOPMENT CORP.
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044

SUBDIVISION NAME	COLUMBIA	SECTION/AREA	LOTS/PARCELS
VILLAGE OF RIVER HILL		4/4	148-151, 156-158 & 269-274
PLAT NO.	12424, 13288, 12426	ZONE	NTSFMD
BLOCK NO.	1	TAX MAP NO.	35
ELECTION DIST.	5TH	CENSUS TRACT	6055
WATER CODE	110	SEWER CODE	6653000

CLARK • FINEFROCK & SACKETT, INC.
ENGINEERS • PLANNERS • SURVEYORS
7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED	B.A.L.	SCALE	1" = 30'
DRAWN	K.B.	DRAWING	1 of 4
CHECKED	B.A.L.	JOB NO.	00-006
DATE	5-18-00	FILE NO.	00-006-X

SEDIMENT AND EROSION CONTROL PLAN
SITE DEVELOPMENT PLAN
LOTS 148-151, 156-158 AND 269-274
COLUMBIA VILLAGE OF RIVER HILL
SECTION 4 AREA 4
FIFTH (5th) ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

FOR: ALLEN HOMES
10260 Old Columbia RD.
Rivers Corporate Park
Columbia MD, 21046

SDP 00-135 (9) D-00-006

APPROVED: DEPARTMENT OF PLANNING & ZONING

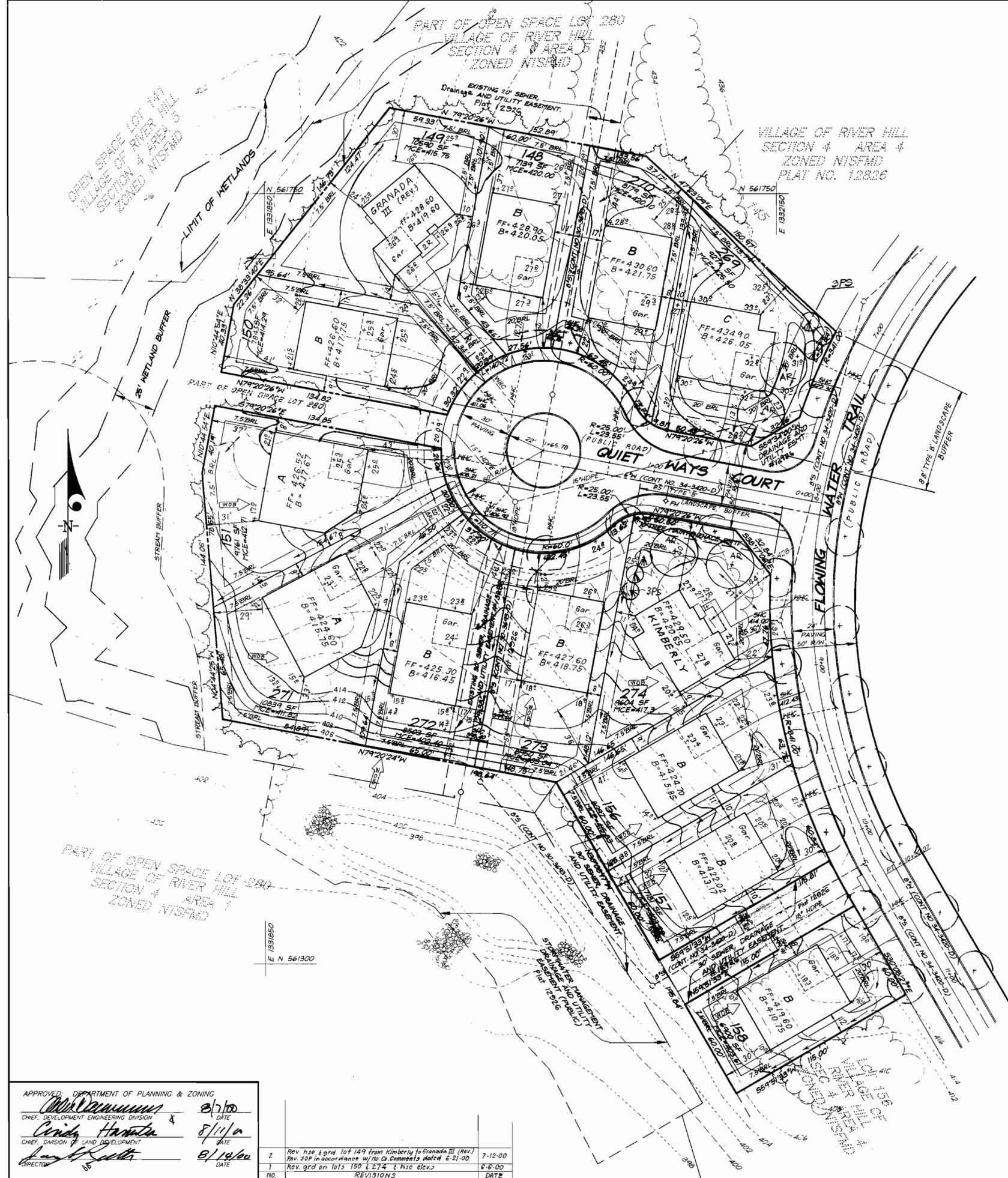
[Signature] 8/7/00
CHIEF, DEVELOPMENT ENGINEERING DIVISION

[Signature] 8/11/00
CHIEF, DIVISION OF LAND DEVELOPMENT

[Signature] 8/14/00
DIRECTOR

NO.	REV. SDP in accordance w/Ho Co Comments, dated 6-21-00	DATE
1		7-12-00





LEGEND

CONTOUR INTERVAL: 2 FT

EXISTING CONTOUR: 348

PROPOSED CONTOUR: 348

DIRECTION OF DRAINAGE: (Arrow pointing right)

WALK OUT BASEMENT: (Symbol)

SPOT ELEVATION: (Symbol)

STABILIZED CONSTRUCTION ENTRANCE: (Symbol)

EROSION CONTROL MATTING: (Symbol)

SUPER SILT FENCE: (Symbol)

SILT FENCE: (Symbol)

TREE PROTECTION FENCE: (Symbol)

EXISTING TREES TO REMAIN: (Symbol)

LIMIT OF DISTURBED AREA: (Symbol)

STREET TREE PER F-96-130: (Symbol)

F-98-120: (Symbol)

PLANT SCHEDULE

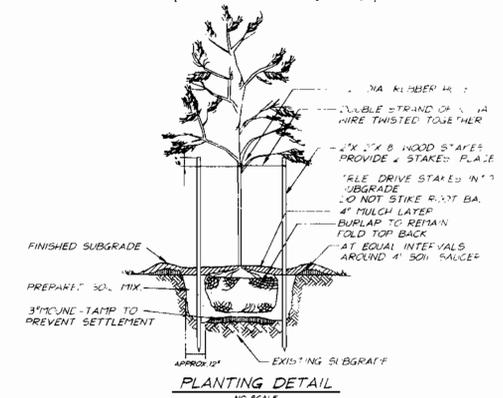
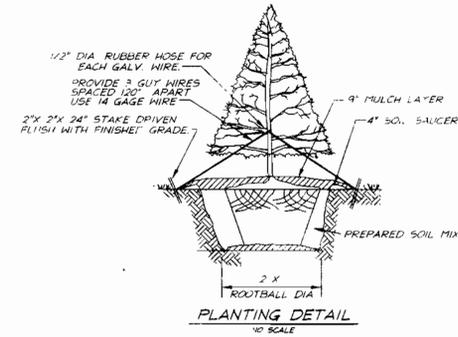
KEY	PLANT NAME	SIZE	QUAN.	REMARKS
(AR)	ACER RUBRUM 'RED SUNSET'	2 1/2"-3" CAL.	4	B&B
(AR)	RED SUNSET MAPLE	12"-14" HT.		
(PS)	PINUS STROBUS	6'-8' HT.	6	B&B
(PS)	WHITE PINE			

- NOTES**
- All plant materials shall be full and heavy, well formed and symmetrical, conform to the most current AAN specifications and be installed in accordance with HRD planting specifications.
 - Contractor shall verify location of all underground utilities prior to digging.
 - Final location of plant material may need to vary to meet final field conditions. Trees shall not be planted in the bottom of drainage swales.

SCHEDULE A PERIMETER LANDSCAPE EDGE

Category	Adjacent to Roadways	LOT 269	LOT 274
Landscape Type B		269	274
Frontage/Perimeter		88	85
Number of Plants Required			
Shade Trees	(V&S)	2	2
Evergreen Trees	(V&O)	3	3
Shrubs			
Number of Plants Provided			
Shade Trees		2	2
Evergreen Trees		3	3
Surety Amounts		\$1,050.00	\$1,050.00

Landscaping per Section 16.124 of the Howard County Code and Landscape Manual will be provided for Lot 269 for 5 trees in the amount of \$1,050.00 and for Lot 274 for 5 trees in the amount of \$1,050.00. Surety will be provided at time of grading permit application.



DEVELOPER'S/BUILDERS CERTIFICATE

I/We certify that the landscaping shown on this plan will be done according to this plan, and per Section 16.124 of Howard County Code and the Howard County Landscape Manual. I/We further certify that upon completion a Certificate of Landscape Installation, accompanied by an executed one year guarantee of plant materials, will be submitted to the Department of Planning and Zoning.

Allan Washack
ALLAN WASHACK

5-18-00
Date

OWNER/DEVELOPER

HOWARD RESEARCH AND DEVELOPMENT CORP
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MD 21044

APPROVED: DEPARTMENT OF PLANNING & ZONING
[Signature] 8/7/00
CHIEF, DEVELOPMENT ENGINEERING DIVISION
[Signature] 8/11/00
CHIEF, DIVISION OF LAND DEVELOPMENT
[Signature] 8/14/00
DIRECTOR

NO.	REVISIONS	DATE
2	Rev. hse 149d lot 149 from Kimberly to Granada III (Rev.) Rev. SDP in accordance w/110.0a Comments dated 6-21-00	7-12-00
1	Rev. grd on lots 150 & 274 & hse elev.	6-6-00



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ENGINEERS • PLANNERS • SURVEYORS

7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED: B A L	SITE DEVELOPMENT and LANDSCAPE PLAN	SCALE: 1" = 30'
DRAWN: ZAH, JTR	LOTS 148-151, 156-158 AND 269-274	DRAWING: 2 of 4
CHECKED: J M E	COLUMBIA VILLAGE OF RIVER HILL	JOB NO.: 00-006
DATE: 5-18-00	SECTION 4 AREA 4 FIFTH (5th) ELECTION DISTRICT HOWARD COUNTY, MARYLAND	FILE NO.: 00-006X

FOR: ALLAN HOMES
10260 OLD COLUMBIA ROAD
RIVERS CORPORATE PARK
COLUMBIA, MARYLAND 21046

NO.	REVISIONS	DATE
1	Rev. Ord. on lots 150 & 274 & hse. elev.	6-6-00
2	Rev. hse. elev. on lot 149 from KIMBERLY to GRANADA III (Rev.) Rev. S&E in accordance w/ H.Co. Comments dated 6-21-00	7-12-00

LEGEND

CONTOUR INTERVAL 2 FT.

EXISTING CONTOUR

PROPOSED CONTOUR

DIRECTION OF DRAINAGE

WALK OUT BASEMENT

SPOT ELEVATION

STABILIZED CONSTRUCTION ENTRANCE

EROSION CONTROL MATTING

SUPER SILT FENCE

SILT FENCE

TREE PROTECTION FENCE

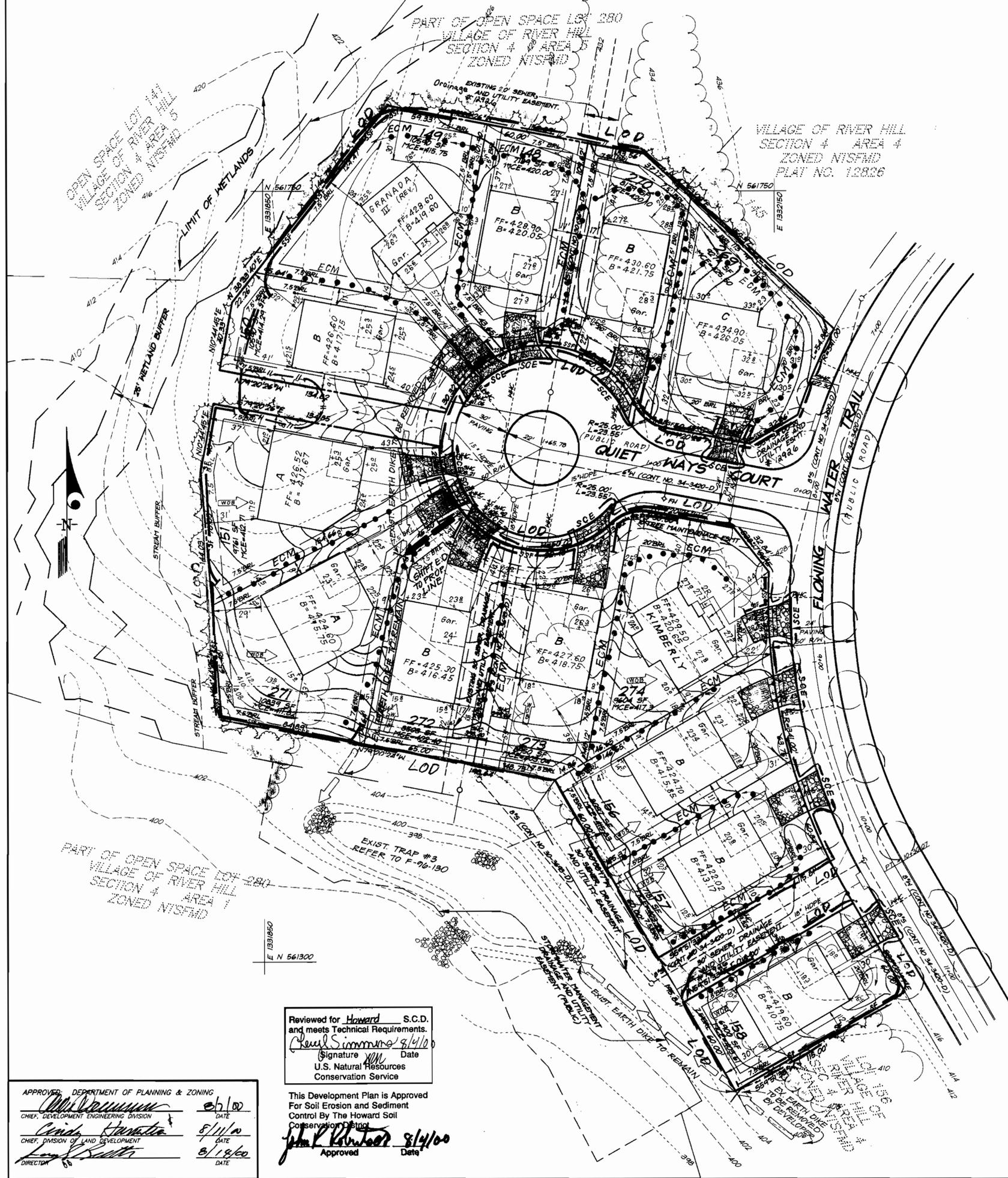
EXISTING TREES TO REMAIN

LIMIT OF DISTURBED AREA

STREET TREE PER F-90-130 F-98-120

EXIST. EARTH DIKE

PROP. EARTH DIKE



DEVELOPER'S/BUILDERS CERTIFICATE

"We certify that all development and construction will be done according to this 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 at a Dept. 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 Howard Soil Conservation District or their authorized agencies, as are deemed necessary."

C. Allen W. Clark 5-18-00
Signature of Developer/Builder Date

OWNER/DEVELOPER

HOWARD RESEARCH AND DEVELOPMENT CORP
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MD 21044



ENGINEER'S CERTIFICATE

Thereby 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 5-18-00
Date

Reviewed for Howard S.C.D. and meets Technical Requirements.
Kevin Simmons 8/11/00
Signature Date
U.S. Natural Resources Conservation Service

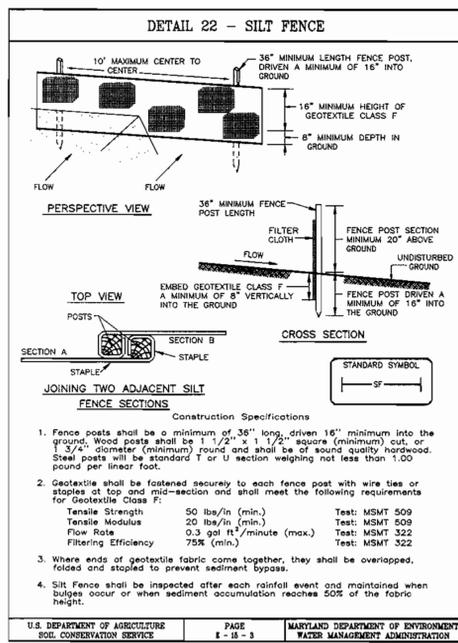
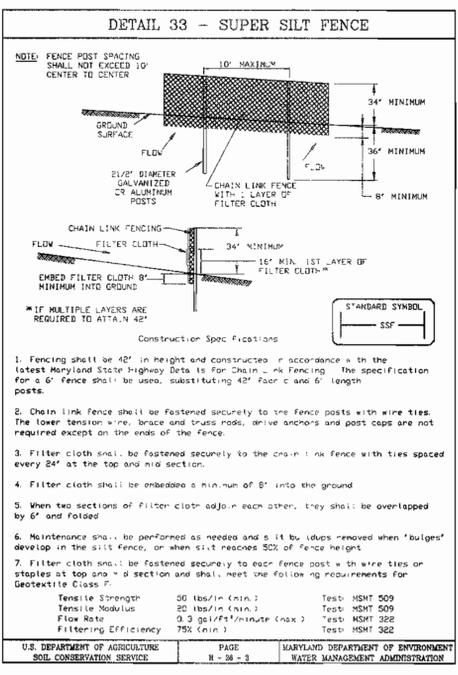
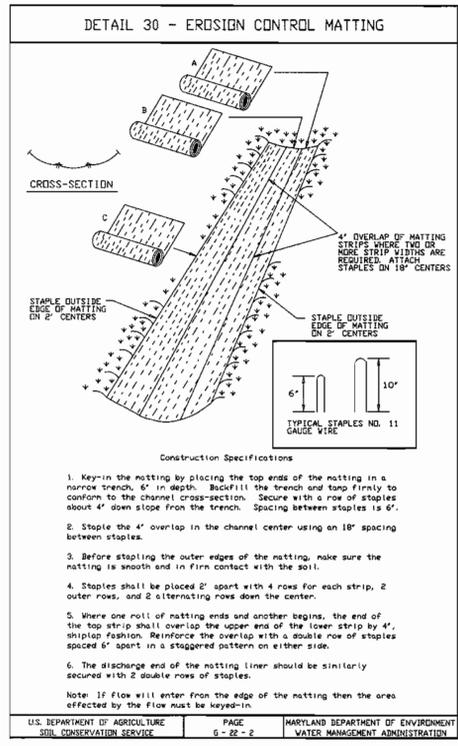
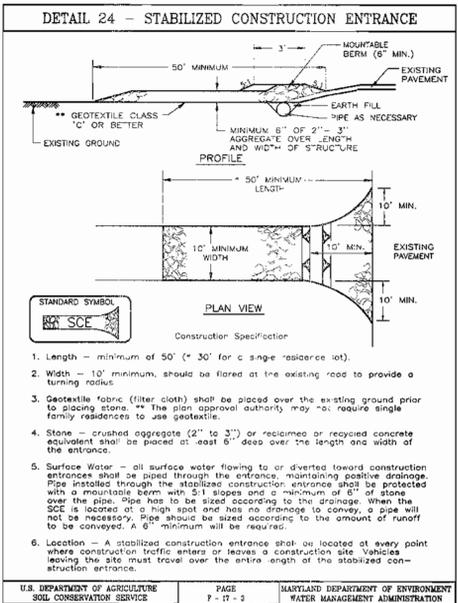
This Development Plan is Approved For Soil Erosion and Sediment Control By The Howard Soil Conservation District.
John K. Kuntz 8/14/00
Approved Date

APPROVED: DEPARTMENT OF PLANNING & ZONING
John Kuntz 8/11/00
CHIEF, DEVELOPMENT ENGINEERING DIVISION
Chris Kuntz 8/11/00
CHIEF, DIVISION OF LAND DEVELOPMENT
John Kuntz 8/14/00
DIRECTOR

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ENGINEERS • PLANNERS • SURVEYORS
7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED BAL	SEDIMENT AND EROSION CONTROL PLAN LOTS 148-151, 156-158 AND 269-274 COLUMBIA VILLAGE OF RIVER HILL SECTION 4 AREA 4 FIFTH (5th) ELECTION DISTRICT HOWARD COUNTY, MARYLAND	SCALE 1" = 30'
DRAWN ZAH		DRAWING 3 of 4
CHECKED JME		JOB NO. 00-006
DATE 5-18-00		FILE NO. 00-006SE

FOR: ALLAN HOPES
10260 OLD COLUMBIA ROAD
RIVERS CORPORATE PARK
COLUMBIA, MARYLAND 21046



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, if not previously loosened.

SOIL AMENDMENTS: In lieu of soil test recommendations, use one of the following schedules:

- Preferred - Apply 2 tons per acre dolomitic limestone (92 lbs/100 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.).
- Acceptable - Apply 2 tons per acre dolomitic limestone (92 lbs/100 sq.ft.) and apply 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 (14 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 (0.5 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 unrotted small grain straw immediately after seeding. Anchor mulch immediately after application using mulch anchoring tool or 210 gallons per acre (8 gal/1000 sq.ft.) of emulsified asphalt on flat areas. On slopes 8 feet or higher, use 340 gallons per acre (8 gal/1000 sq.ft.) for anchoring.

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

TEMPORARY SEEDING NOTES

SEEDBED PREPARATION: Loosen upper three inches of soil by raking, discing 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 rye (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 1 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 210 gallons per acre (8 gal/1000 sq.ft.) of emulsified asphalt on flat areas. On slopes 8 feet or higher, use 340 gallons per acre (8 gal/1000 sq.ft.) for anchoring.

REFER TO THE 1994 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL FOR RATE AND METHODS NOT COVERED.

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 vegetable growth. Soils of concern have low moisture content, low nutrient levels, low pH, materials 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/parent material is not adequate to produce vegetative growth.
- The soil material is so shallow that the rooting zone is not deep enough to support plants or furnish continuing supplies of moisture and plant nutrients.
- The original soil to be vegetated contains material toxic to plant growth.
- The soil is so acidic that treatment with limestone is not feasible.

Topsoil Application

- When topsoiling, maintain needed erosion and sediment control practices such as diversions, Grade Stabilization Structures, Earth Dikes, Slope Silt Fence and Sediment Traps and Basins.
- Grades on the areas to be topsoiled, which have been previously established, shall be maintained, albeit 4" - 8" higher in elevation.
- 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.
- 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 seedbed preparation.

Construction and Material Specifications

- Topsoil salvaged from the existing site may be used provided that it meets the standards as set forth in these specifications. Typically, the depth of topsoil to be salvaged for a given soil type can be found in the representative soil profile section in the Soil Survey, published by USDA-SCS in cooperation with Maryland Agricultural Experimental Station.
- Topsoil Specifications - Soil to be used as topsoil must meet the following:
 - Topsoil shall be a loam, sandy loam, clay loam, silt loam, sandy clay loam, loamy sand. Other soils may be used if recommended by an agronomist or a soil scientist and approved by the appropriate approval authority. Regardless, topsoil shall not be a mixture of contrasting textured subsoils and shall contain less than 5% by volume of cinders, stones, slag, coarse fragments, gravel, sticks, roots, trash or other materials larger than 1 and 1/2" in diameter.
 - Topsoil must be free of plants or plant parts such as Bermuda grass, quackgrass, Johnsongrass, nutsedge, poison ivy, thistle, or others as specified.
 - Where the subsoil is either highly acidic or composed of heavy clays, ground limestone shall be spread 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 tillage operations as described in the following procedures.
- For sites having disturbed areas under 5 acres:
 - Place topsoil (if required) and apply soil amendments as specified in 20.0 Vegetative Stabilization - Section 1 - Vegetative Stabilization Methods and Materials.

SEDIMENT AND EROSION CONTROL NOTES

- A minimum of 48 hours notice must be given to the Howard County Department of Inspections, Licenses and Permits, Sediment Control Division prior to the start of any construction (310-1855).
- All vegetative and structural practices are to be installed according to the provisions of this plan and are to be in conformance with the 1994 MARYLAND STANDARDS AND SPECS. FOR SOIL EROSION AND SEDIMENT CONTROL and revisions thereto.
- Following initial soil disturbance or redistribution, permanent or temporary stabilization shall be completed within:
 - 7 calendar days for all perimeter sediment control structures, perimeter slopes and all slopes greater than 3:1.
 - 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 the perimeter in accordance with Vol. 1, Chapter 7, of the HOWARD COUNTY DESIGN MANUAL, Storm Drainage.
- All disturbed areas must be stabilized within the time period specified above, in accordance with the 1994 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL for permanent seedings, sod, temporary seeding and mulching (Sec. 6).
- Temporary stabilization with mulch 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.

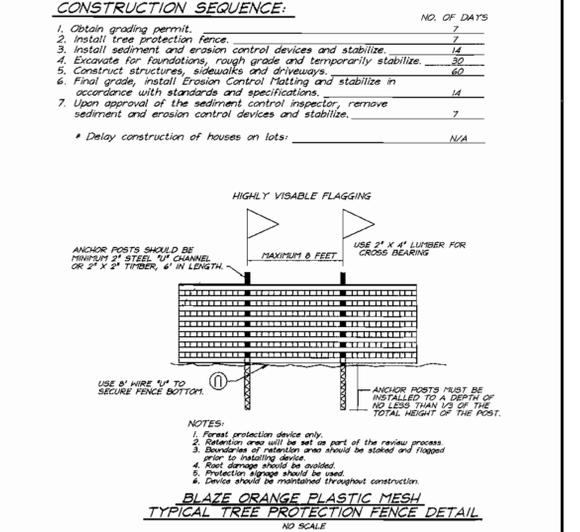
SITE ANALYSIS:

Total Area of Site:	2.49 Acres
Area Disturbed:	2.47 Acres
Area to be roofed or paved:	0.97 Acres
Area to be vegetatively stabilized:	1.50 Acres
Total Cut:	6375 Cu Yd
Total Fill:	9785 Cu Yd

Off-site 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 the initial approval by the inspection agency is made.
- Trenches for the construction of utilities shall be backfilled and stabilized within one working day, or is limited to three pipe lengths.
- The total amount of silt fence = 300 LF
- The total amount of super silt fence = 790 LF
- The total amount of super diversion fence:

* It is the responsibility of the contractor to identify the spoil/borrow area and notify the appropriate approval authority the sediment control inspector of the site and it's grading permit number at the time of construction.



APPROVED: DEPARTMENT OF PLANNING & ZONING

Chief, Development Engineering Division: *[Signature]* 8/17/00

Chief, Division of Land Development: *[Signature]* 8/11/00

Director: *[Signature]* 8/14/00

Reviewed for: HOWARD S.C.D. Technical Requirements 8/14/00

Signature: *[Signature]* Date: 8/14/00

U.S. National Resources Conservation Service

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

John R. Roberts 8/14/00

Approved: *[Signature]*

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] DATE: 8-17-00

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] DATE: 8-18-00

G. NELSON CLARK

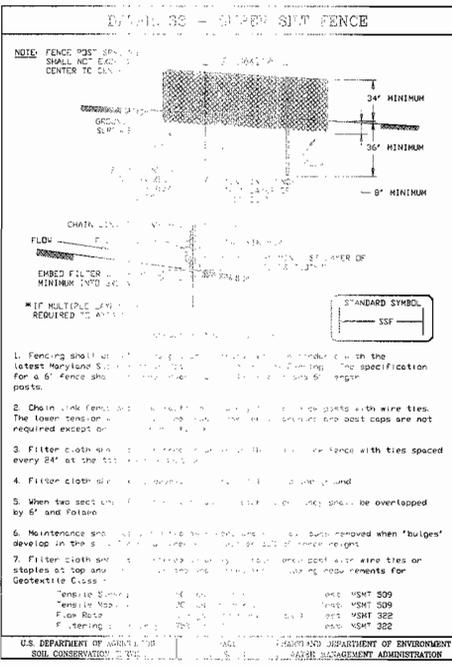
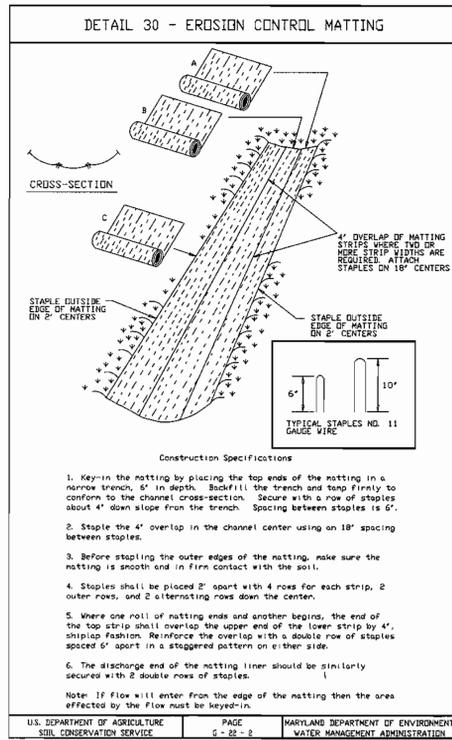
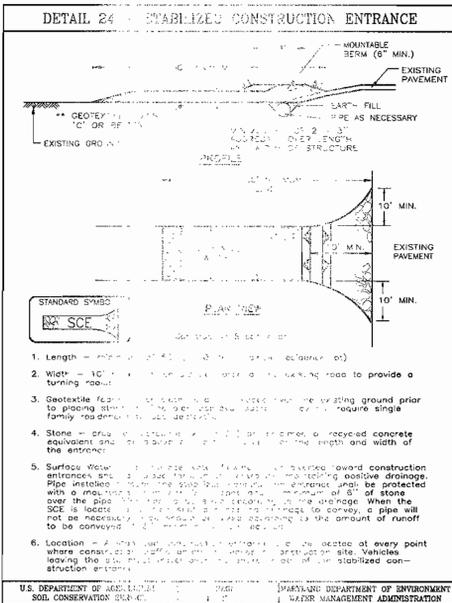
OWNER/DEVELOPER

HOWARD RESEARCH AND DEVELOPMENT CORP
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MD 21044

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

7135 MINTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED	PAC	SEDIMENT AND EROSION CONTROL DETAILS	SCALE
DRAWN	ZAH	LOTS 148-151, 156 - 158 AND 269-274	DRAWING
CHECKED	PAC	COLUMBIA VILLAGE OF RIVER HILL	4 of 4
DATE	5-18-00	SECTION 4 AREA 4	JOB NO.
		FOURTH (4th) ELECTION DISTRICT	00-006
		HOWARD COUNTY, MARYLAND	FILE NO.
		FOR: ALLAN HOMES, INC. 10260 OLD COLUMBIA ROAD RIVERSIDE PARK COLUMBIA, MD 21046	00-006-5E



NO	REVISIONS	Date
1	Rev. lot #'s 269 and 270 to 282 and 283 per re-sub plot	3-27-01

APPROVED: DEPARTMENT OF PLANNING & ZONING

John R. Roberts 8/14/00
 Signature Date

APPROVED: DEPARTMENT OF ENVIRONMENT & WATER MANAGEMENT ADMINISTRATION

John R. Roberts 8/14/00
 Signature Date

Reviewed for HOWARD S.C.D. and met Technical Requirements

John R. Roberts 8/14/00
 Signature Date

U.S. National Resource Conservation Service

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

John R. Roberts 8/14/00
 Signature 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, if not previously loosened.

SOIL AMENDMENTS: In lieu of soil test recommendations, use one of the following schedules:

- Preferred—Apply 2 tons per acre dolomitic limestone (92 lbs./100 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.)
- Acceptable—Apply 2 tons per acre dolomitic limestone (92 lbs./1000 sq.ft.) and apply 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 unrotted small grain straw immediately after seeding. Anchor mulch immediately after application using mulch anchoring tool or 210 gallons per acre (5 gal/1000 sq.ft.) of emulsified asphalt on flat areas. On slopes 3 feet or higher, use 340 gallons per acre (9 gal/1000 sq.ft.) for anchoring.

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

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 1 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 210 gallons per acre (5 gal/1000 sq.ft.) of emulsified asphalt on flat areas. On slopes 3 feet or higher, use 340 gallons per acre (9 gal/1000 sq.ft.) for anchoring.

REFER TO THE 1994 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL FOR RATE AND METHODS NOT COVERED.

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 vegetable growth. Soils of concern have low moisture content, low nutrient levels, low pH, materials 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/parent material is not adequate to produce vegetative growth.
 - The soil material is so shallow that the rooting zone is not deep enough to support plants or furnish continuing supplies of moisture and plant nutrients.
 - The original soil to be vegetated contains material toxic to plant growth.
 - The soil is so acidic that treatment with limestone is not required.
- 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 as set forth in these specifications. Typically, the depth of topsoil to be salvaged for a given soil type can be found in the representative soil profile section in the Soil Survey publications by USDA-SCS in cooperation with Maryland Agricultural Experimental Station.
- Topsoil Specifications - Soil to be used as topsoil must meet the following:
 - Topsoil shall be a loam, sandy loam, clay loam, silt loam, sandy clay loam, loamy sand. Other soils may be used if recommended by an agronomist or a soil scientist and approved by the appropriate approval authority. Regardless, topsoil shall not be a mixture of contrasting textures, subsoils and shall contain less than 5% by volume of cinders, stones, slag, coarse fragments, gravel, sticks, roots, twigs, or other materials larger than 1 and 1/2" in diameter.
 - Topsoil must be free of plants or plant parts such as Bermuda grass, quackgrass, Johnsongrass, nutsedge, poison ivy, thistle, or others as specified.
 - Where the subsoil is either highly acidic or composed of heavy clays, ground limestones shall be spread at the rate of 4-8 tons/acre (200-400 pounds per 1,000 square feet) prior to the placement of topsoil. Limes shall be distributed uniformly over designated areas and worked into the soil in conjunction with tillage operations as described in the following procedures:
 - For sites having disturbed areas under 5 acres:
 - Place topsoil (if required) and apply soil amendments as specified in 20.0 Vegetative Stabilization - Section 1 - Vegetative Stabilization Methods and Materials.
 - For sites having disturbed areas over 5 acres:
 - On soil meeting topsoil specifications, obtain test results dictating fertilizer and lime amendments required to bring the soil into compliance with the following:
 - 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 6.5 or higher.
 - Organic content of topsoil shall be not less than 1.5 percent by weight.
 - Topsoil having soluble salt content greater than 500 parts per million shall not be used.
 - No sod or seed 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 agronomist 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 specified in 20.0 Vegetative Stabilization - Section 1 - Vegetative Stabilization Methods and Materials.
 - Topsoil Application
 - When topsoiling, maintain needed erosion and sediment control practices such as diversions, Grade Stabilization Structures, Earth Dikes, Slope Silt Fence and Sediment Traps and Basins.
 - Grades on the areas to be topsoiled, which have been previously established, shall be maintained, albeit 4" - 6" higher in elevation.
 - Topsoil shall be uniformly distributed in a 4" - 6" 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.
 - 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 seedbed preparation.

SEDIMENT AND EROSION CONTROL NOTES

- A minimum of 48 hours notice must be given to the Howard County Department of Inspections, Licenses and Permits, Sediment Control Division prior to the start of any construction (313-1855).
- All vegetative and structural practices are to be installed according to the provisions of this plan and are to be in conformance with the 1994 MARYLAND STANDARDS AND SPECS. FOR SOIL EROSION AND SEDIMENT CONTROL and revisions thereto.
- Following initial soil disturbance or redistribution, permanent or temporary stabilization shall be completed within:
 - 7 calendar days for all perimeter sediment control structures, dikes, perimeter slopes and all slopes greater than 3:1
 - 14 calendar days to all other disturbed or graded areas on the project site.
- All sediment traps/basins shall be fenced and warning signs posted around their perimeters in accordance with Vol. 1, Chapter 7, of the HOWARD COUNTY DESIGN MANUAL, Storm Drainage.
- All disturbed areas must be stabilized within the time period specified above, in accordance with the 1994 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL for permanent seedings, sod, temporary seeding and mulching (Sec. 15).
- Temporary stabilization with mulch alone can only be done when recommended seeding dates do not allow for proper germination and establishment of permanent 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:	2.43 Acres
Area Disturbed:	2.37 Acres
Area to be seeded or paved:	0.39 Acres
Area to be vegetatively stabilized:	1.98 Acres
Total Cut:	52,000 cu yd
Total Fill:	27,200 cu yd

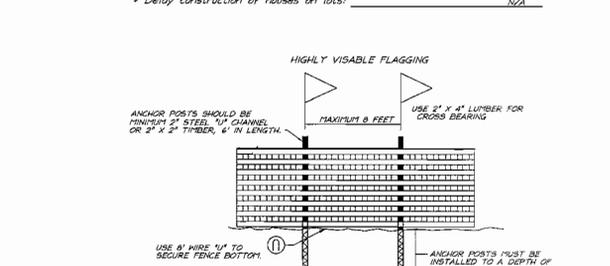
 Offsite Waste/Borrow Area Location:
 - Any sediment control practice which is disturbed by grading activity for placement of utilities must be repaired on the same day of disturbance.
 - Additional sediment control must be provided, if deemed necessary by the Howard County DPM Sediment Control Inspector.
 - On all sites with disturbances 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.
 - Trenches for the construction of utilities shall be backfilled and stabilized within one working day, or is limited to three pipe lengths.
- The total amount of silt fence = 300 LF
- The total amount of super silt fence = 790 LF
- The total amount of super diversion fence =

* 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, install Erosion Control Matting and stabilize in accordance with standards and specifications.	14
7. Upon approval of the sediment control inspector, remove sediment and erosion control devices and stabilize.	7

* Delay construction of houses on lots: N/A



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.

C. Allan Woodard 5-17-00
 NAME DATE

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.

G. Nelson Clark 5-18-00
 NAME DATE

OWNER/DEVELOPER

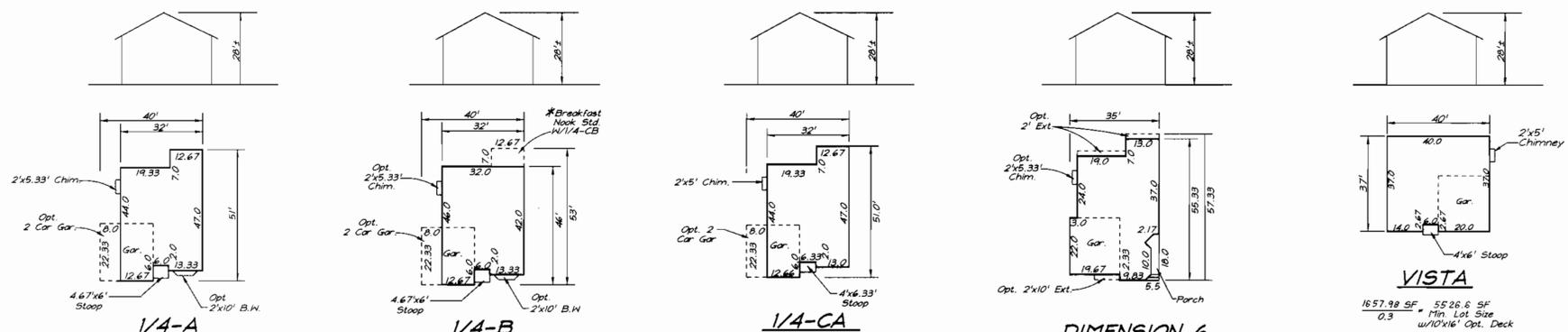
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CLARK • FINEFROCK & SACKETT, INC.
 ENGINEERS • PLANNERS • SURVEYORS

7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED PAC	SEDIMENT AND EROSION CONTROL DETAILS LOTS 148-151, 56, 58, 271-274, 282 and 283 COLUMBIA VILLAGE OF RIVER HILL	SCALE
DRAWN ZAH	SECTION 4 AREA 4	DRAWING 4 of 4
CHECKED PAC	FOURTH (4th) ELECTION DISTRICT HOWARD COUNTY, MARYLAND	JOB NO. 00-006
DATE 5-18-00	FOR: ALLAN HOMES, INC. 10260 OLD COLUMBIA ROAD RIVERS CORPORATE PARK COLUMBIA, MD 21046	FILE NO. 00-006-5E

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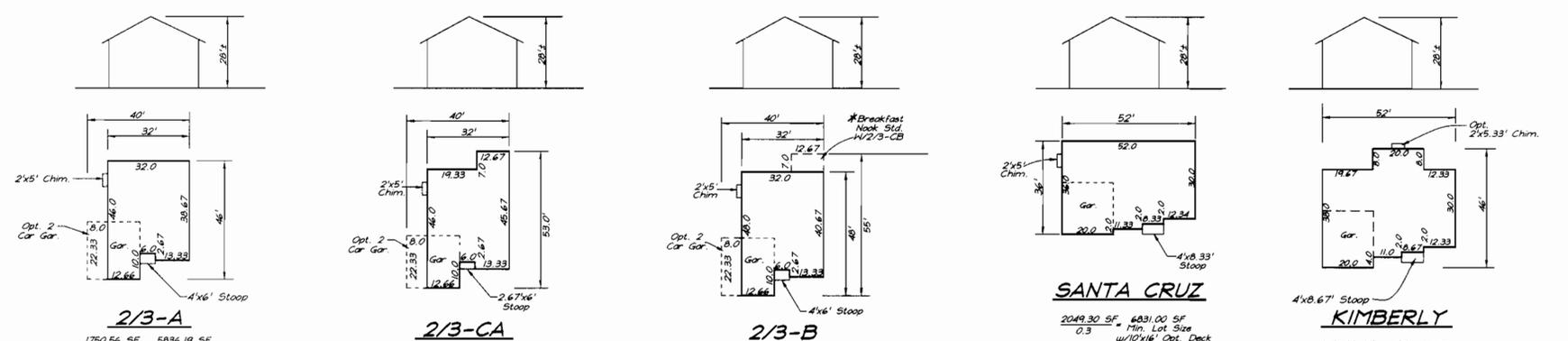


1/4-A
1850.23 SF = 6167.48 SF
0.3 Min. Lot Size
w/10'x16' Deck & 2 Car Gar.

1/4-B
1923.75 SF = 6412.50 SF
0.3 Min. Lot Size
w/10'x16' Opt. Deck
And 2 Car Gar.

1/4-CA
1840.49 SF = 6134.97 SF
0.3 Min. Lot Size (2 Car Gar.)
w/10'x16' Opt. Deck

DIMENSION 6
1984.32 SF = 6614.40 SF
0.3 Min. Lot Size
w/10'x16' Opt. Deck
And 2 Opt. Exts.

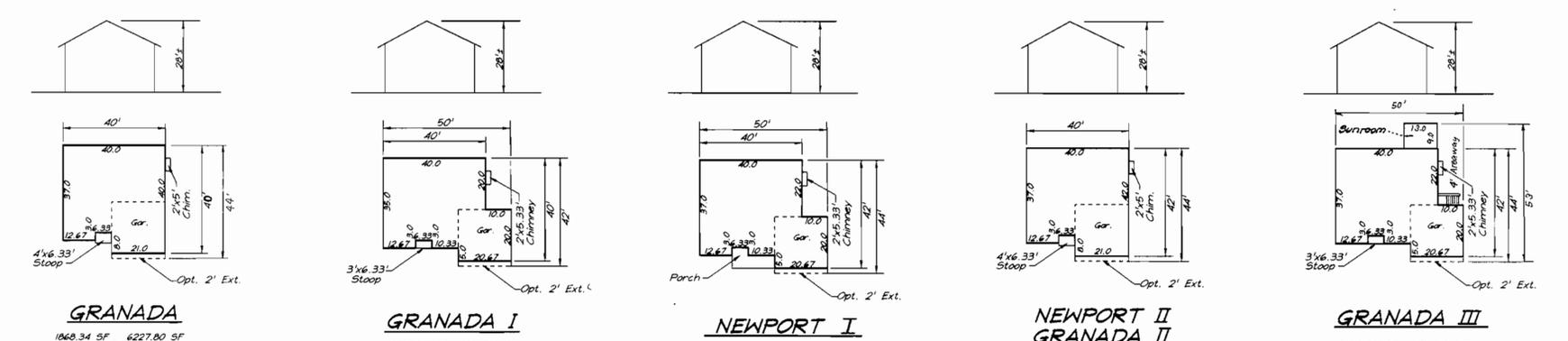


2/3-A
1750.56 SF = 5836.19 SF
0.3 Min. Lot Size
w/10'x16' Opt. Deck

2/3-CA
1821.57 SF = 6071.89 SF
0.3 Min. Lot Size
w/10'x16' Opt. Deck
And Opt. 2 Car Gar.

2/3-B
1919.14 SF = 6397.14 SF
0.3 Min. Lot Size (2 Car Gar. w/Nook)
And 10'x16' Deck

SANTA CRUZ
2049.30 SF = 6831.00 SF
0.3 Min. Lot Size
w/10'x16' Opt. Deck



GRANADA
1868.34 SF = 6227.80 SF
0.3 Min. Lot Size
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GRANADA I
1865.35 SF = 6217.83 SF
0.3 Min. Lot Size
w/10'x16' Opt. Deck
And 10'x16' Opt. Deck

NEWPORT I
2028.65 SF = 6762.17 SF
0.3 Min. Lot Size
w/10'x16' Opt. Deck

NEWPORT II
1803.33 SF = 6011.10 SF
0.3 Min. Lot Size
w/Opt. 2' Ext.
And 10'x16' Opt. Deck

GRANADA II
1945.35 SF = 6484.50 SF
0.3 Min. Lot Size
w/2' Opt. Ext.
And 10'x16' Opt. Deck

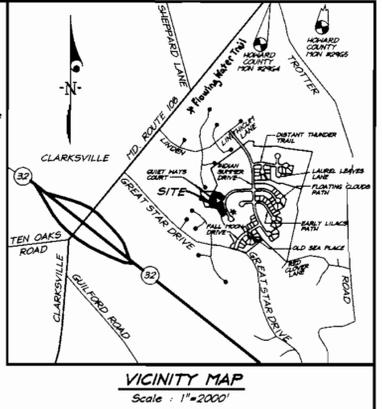
GRANADA III
2062.35 SF = 6874.50 SF
0.3 Min. Lot Size
w/all options
and 10'x16' Opt. Deck

CUSTOM KIMBERLY
2246.02 SF = 7486.73 SF
0.3 Min. Lot Size
w/10'x16' Opt. Deck

ADDRESS CHART	
LOT NUMBER	STREET ADDRESS
148	5909 QUIET WAYS COURT
149	5912 QUIET WAYS COURT
150	5916 QUIET WAYS COURT
151	5917 QUIET WAYS COURT
269	5900 QUIET WAYS COURT
270	5904 QUIET WAYS COURT
271	5913 QUIET WAYS COURT
272	5909 QUIET WAYS COURT
273	5905 QUIET WAYS COURT
274	12156 FLOWING WATER TRAIL
156	12160 FLOWING WATER TRAIL
157	12164 FLOWING WATER TRAIL
158	12168 FLOWING WATER TRAIL

SHEET INDEX		
COVER SHEET	DESCRIPTION	SHEET No.
1	1	1 of 4
2	2	2 of 4
3	3	3 of 4
4	4	4 of 4

BENCHMARKS:
Howard County Monument 29G4
Intersection of MD. Route 108 and
Trotter Road
Howard County Monument 29G5
an additional 2,544' Northeastly
along MD. Route 108 away from Site



- GENERAL NOTES:**
- Subject property is zoned: NTSFLD per 10-18-93 Comprehensive Zoning Plan.
 - The total area included in this submission is 2.43 Acres.
 - The total number of lots included in this submission is: 13
 - Improvement to property: Single Family Detached
 - The maximum lot coverage permitted is: 30%
 - Department of Planning and Zoning reference file numbers: 5-93-21, P-95-11, F-96-130, F-98-120.
 - Utilities shown as existing are taken from approved Water and Sewer plans Contract #34-3420-D, approved Road Construction plans F-96-130, and actual field survey.
 - Any damage to county owned rights-of-way shall be corrected at the developer's expense.
 - All roadways are public and existing.
 - The existing topography was taken from Road Construction Plans prepared by Datt, Maune, Walker, Inc. 7-10-97
 - The coordinates shown hereon are based upon the Howard County Geodetic Control which is based upon the Maryland State Plane Coordinate System - Howard County Monuments Numbers 29G4 & 29G5
 - The contractor shall notify the Department of Public Works/Division of Construction Inspection at (410) 313-1880 at least twenty-four (24) hours prior to the start of work.
 - The contractor shall notify "Miss Utility" at 1-800-257-7777 at least 48 hours prior to any excavation work.
 - For driveway entrance details, refer to Ho. Co. Design Manual Volume IV details R.6.03 & R.6.05.
 - In accordance with FDP-Phase 222-A, Part 4 bay windows or chimneys not more than 10 feet in width may project not more than 4 feet into any setbacks; porches and decks may project not more than 3 feet into the front or rear setbacks. Awnings may not project into any setbacks.
 - Stormwater Management quantity and quality for the improvements from Bright Flow Mews, area North of Distant Thunder Trail DA to 15309 from Section 4 Area 5, F-98-102 will be provided by an excavated pond East of Distant Thunder Trail. Said pond will be jointly maintained. Stormwater Management quantity for the improvements West of Indian Summer Drive and South of Sunlit Water Way is provided by Village of River Hill Section 4 Area 1, Phase 1, F-98-110. Water quality will be provided by bio-retention or shallow marsh at the storm drain outfalls and will be jointly maintained. Stormwater Management quantity for the improvements East of Indian Summer Drive and South of Distant Thunder Trail are provided for in Section 4 Area 1, F-98-110 by proposed features as described in a report prepared by Whitman, Requardt & Associates and approved as of 1/20/95. Water quality will be provided by bio-retention or shallow marsh at the storm drain outfalls and will be jointly maintained.
 - SHC Elevations shown are at the property lines.
 - This plan has been prepared in accordance with the provisions of section 16.124 of the Howard County code and Landscape Manual. Financial Surety for the trees in Schedule A in the amount of \$2,100,000 shall be part of the Builders Grading Permit Application for Lots 269 and 274. (See sheet 2)
 - This property is exempt from the Forest Conservation requirements per section 16.1202 (b)(1)(iv) of the Howard County Code because it is part of a planned unit Development with preliminary plan approval prior to 12/31/92

SPECIAL NOTES:
This plan is for house siting and lot grading only. Improvements shown within the rights-of-way on this S.D.P. are not to be used for construction. For construction, see approved Road Construction Plans F-96-130 and/or approved Water and Sewer Plans Contract #34-3420-D.

OWNER / DEVELOPER
THE HOWARD RESEARCH AND DEVELOPMENT CORP.
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044

SUBDIVISION NAME	COLUMBIA	SECTION/AREA	LOTS/PARCELS
VILLAGE OF RIVER HILL		4/4	148-151, 156-158 & 269-274
PLAT NO.	12924, 13288, 12926	ZONE	NTSFLD
BLOCK NO.	1	TAX MAP NO.	35
ELECTION DIST.	5TH	CENSUS TRACT	6055
WATER CODE	110	SEWER CODE	6653000

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7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED	B.A.L.	SCALE	1" = 30'
DRAWN	K.B.	DRAWING	1 of 4
CHECKED	B.A.L.	JOB NO.	00-006
DATE	5-18-00	FILE NO.	00-006-X

SEDIMENT AND EROSION CONTROL PLAN
SITE DEVELOPMENT PLAN
LOTS 148-151, 156-158 AND 269-274
COLUMBIA VILLAGE OF RIVER HILL
SECTION 4 AREA 4
FIFTH (5th) ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

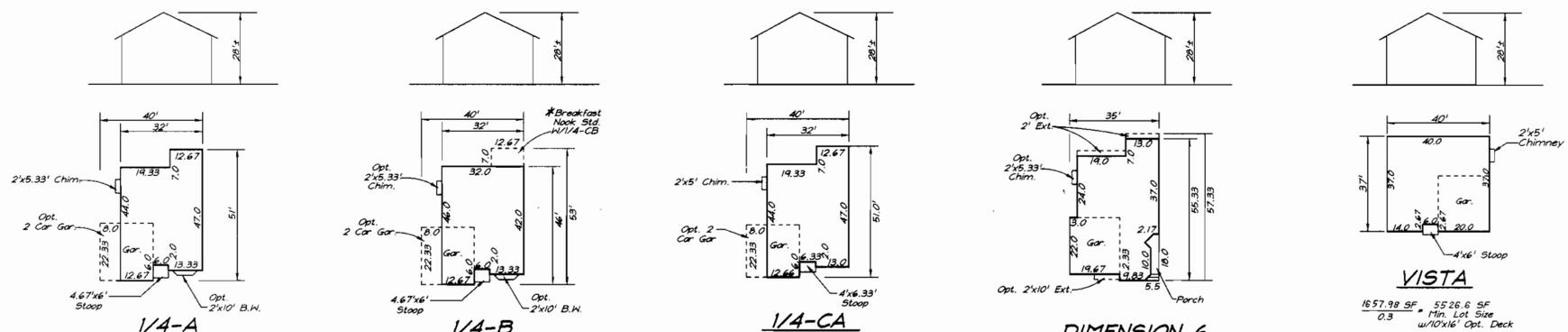
FOR: ALLEN HOMES
10260 Old Columbia RD.
Rivers Corporate Park
Columbia MD, 21046

APPROVED: DEPARTMENT OF PLANNING & ZONING
Chief, Development Engineering Division
Chief, Division of Land Development
Director

DATE: 8/11/00
DATE: 8/14/00

NO.	REVISIONS	DATE
1	Rev. hse type Granada III - added Sun Room Opt.	9-11-00
2	Rev. SDP in accordance w/ Ho Co Comments, dated 6-21-00	7-12-00



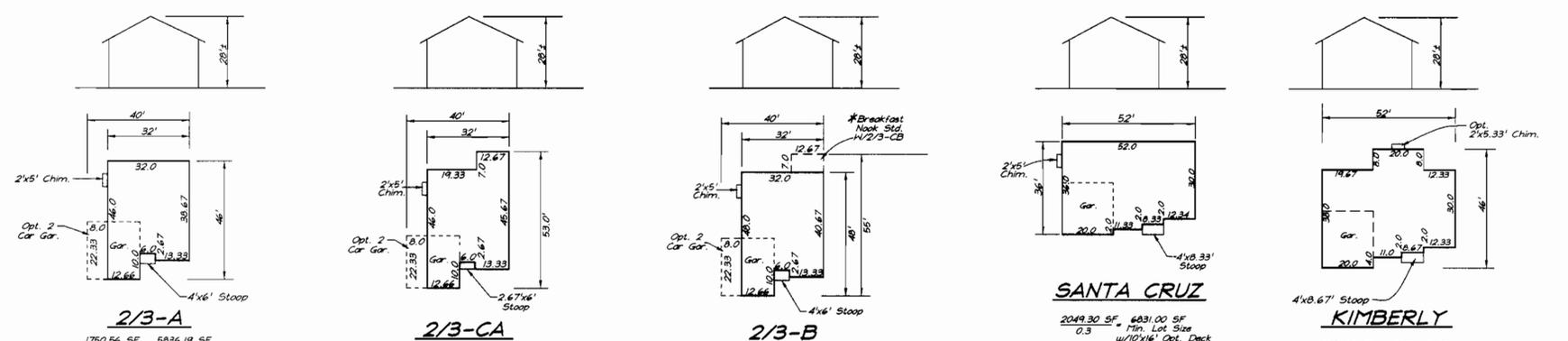


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w/10'x16' Deck & 2 Car Gar.

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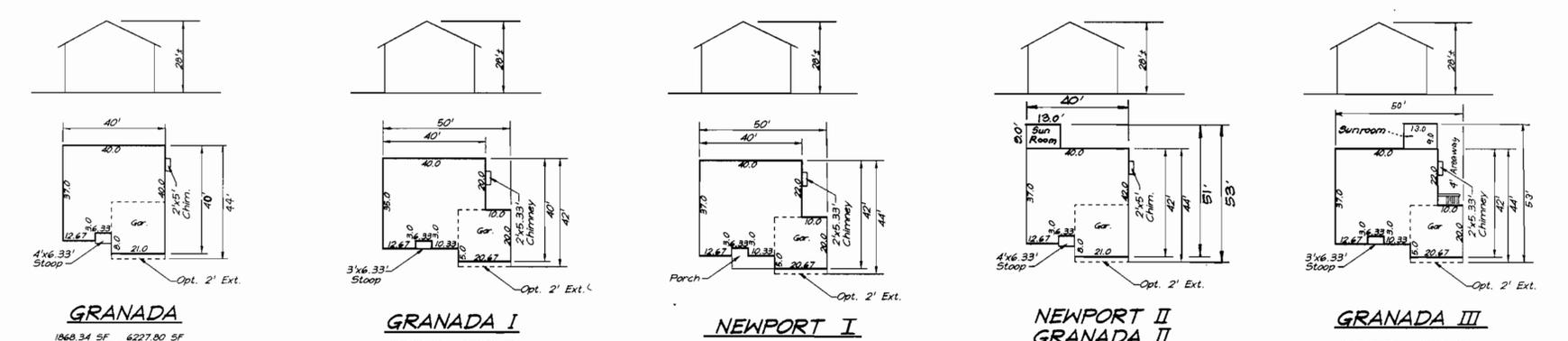


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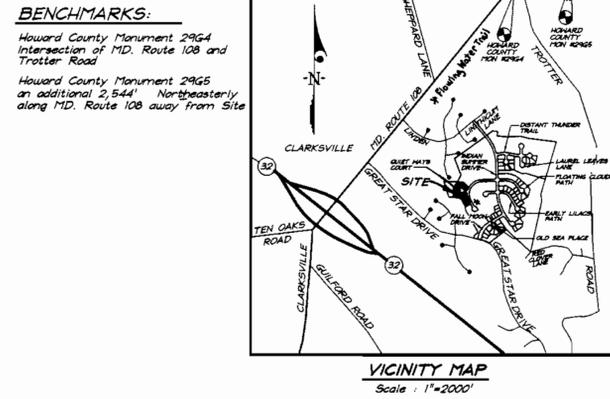
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271	5913 QUIET WAYS COURT
272	5909 QUIET WAYS COURT
273	5905 QUIET WAYS COURT
274	12156 FLOWING WATER TRAIL
156	12150 FLOWING WATER TRAIL
157	12164 FLOWING WATER TRAIL
158	12168 FLOWING WATER TRAIL

SHEET INDEX

COVER SHEET	DESCRIPTION	SHEET No.
1	1 of 4	
2	2 of 4	
3	3 of 4	
4	4 of 4	



- GENERAL NOTES:**
- Subject property is zoned: NTSFLD per 10-18-93 Comprehensive Zoning Plan.
 - The total area included in this submission is 2.43 Acres.
 - The total number of lots included in this submission is 13.
 - Improvement to property: Single Family Detached.
 - The maximum lot coverage permitted is: 30%.
 - Department of Planning and Zoning reference file numbers: 5-93-21, P-95-11, F-96-130, F-98-120.
 - Utilities shown as existing are taken from approved Water and Sewer plans Contract #34-3420-D, approved Road Construction plans F-96-130, and actual field survey.
 - Any damage to county owned rights-of-way shall be corrected at the developer's expense.
 - All roadways are public and existing.
 - The existing topography was taken from Road Construction Plans prepared by Datt, Maune, Walker Inc. 7-10-97.
 - The coordinates shown hereon are based upon the Howard County Geodetic Control which is based upon the Maryland State Plane Coordinate System - Howard County Monuments Numbers 29G4 - 29G5.
 - The contractor shall notify the Department of Public Works/Division of Construction Inspection at (410) 313-1880 at least twenty-four (24) hours prior to the start of work.
 - The contractor shall notify "Miss Utility" at 1-800-257-7777 at least 48 hours prior to any excavation work.
 - For driveway entrance details, refer to Ho. Co. Design Manual Volume IV details R.6.03 & R.6.05.
 - In accordance with FDP-Phase 222-A, Part 4 bay windows or chimneys not more than 10 feet in width may project not more than 4 feet into any setbacks; porches and decks may project not more than 3 feet into the front or rear setbacks. Awnays may not project into any setbacks.
 - Stormwater Management quantity and quality for the improvements from Bright Flow Mews, area North of Distant Thunder Trail DA to 15309 from Section 4 Area 5, F-98-102 will be provided by an excavated pond East of Distant Thunder Trail. Said pond will be jointly maintained. Stormwater Management quantity for the improvements West of Indian Summer Drive and South of Sunlit Water Way is provided by Village of River Hill Section 4 Area 1, Phase 1, F-98-110. Water quality will be provided by bio-retention or shallow marsh at the storm drain outfalls and will be jointly maintained. Stormwater Management quantity for the improvements East of Indian Summer Drive and South of Distant Thunder Trail are provided for in Section 4 Area 1, F-98-110 by proposed features as described in a report prepared by Whitman, Requardt & Associates and approved as of 1/20/95. Water quality will be provided by bio-retention or shallow marsh at the storm drain outfalls and will be jointly maintained.
 - SHC Elevations shown are at the property lines.
 - This plan has been prepared in accordance with the provisions of section 16.124 of the Howard County code and Landscape Manual. Financial Surety for the trees in Schedule A in the amount of \$2,100,000 shall be part of the Builders Grading Permit Application for Lots 269 and 274. (See sheet 2)
 - This property is exempt from the Forest Conservation requirements per section 16.1202 (b)(1)(iv) of the Howard County Code because it is part of a planned unit Development with preliminary plan approval prior to 12/31/92.

SPECIAL NOTES:

This plan is for house siting and lot grading only. Improvements shown within the rights-of-way on this S.D.P. are not to be used for construction. For construction, see approved Road Construction Plans F-96-130 and/or approved Water and Sewer Plans Contract #34-3420-D.

OWNER / DEVELOPER
THE HOWARD RESEARCH AND DEVELOPMENT CORP.
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044

SUBDIVISION NAME	COLUMBIA	SECTION/AREA	LOTS/PARCELS
VILLAGE OF RIVER HILL	4/4	148-151, 156-158 & 269-274	
PLAT NO.	12924, 13288		
BLOCK NO.	1	NTSFLD	35
ZONE			5TH
ELECTION DIST.			6055
WATER CODE	110	SEWER CODE	6653000

CLARK • FINEFROCK & SACKETT, INC.
ENGINEERS • PLANNERS • SURVEYORS
7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED B.A.L. **SCALE** 1" = 30'

DRAWN K.B. **DRAWING** 1 of 4

CHECKED B.A.L. **JOB NO.** 00-006

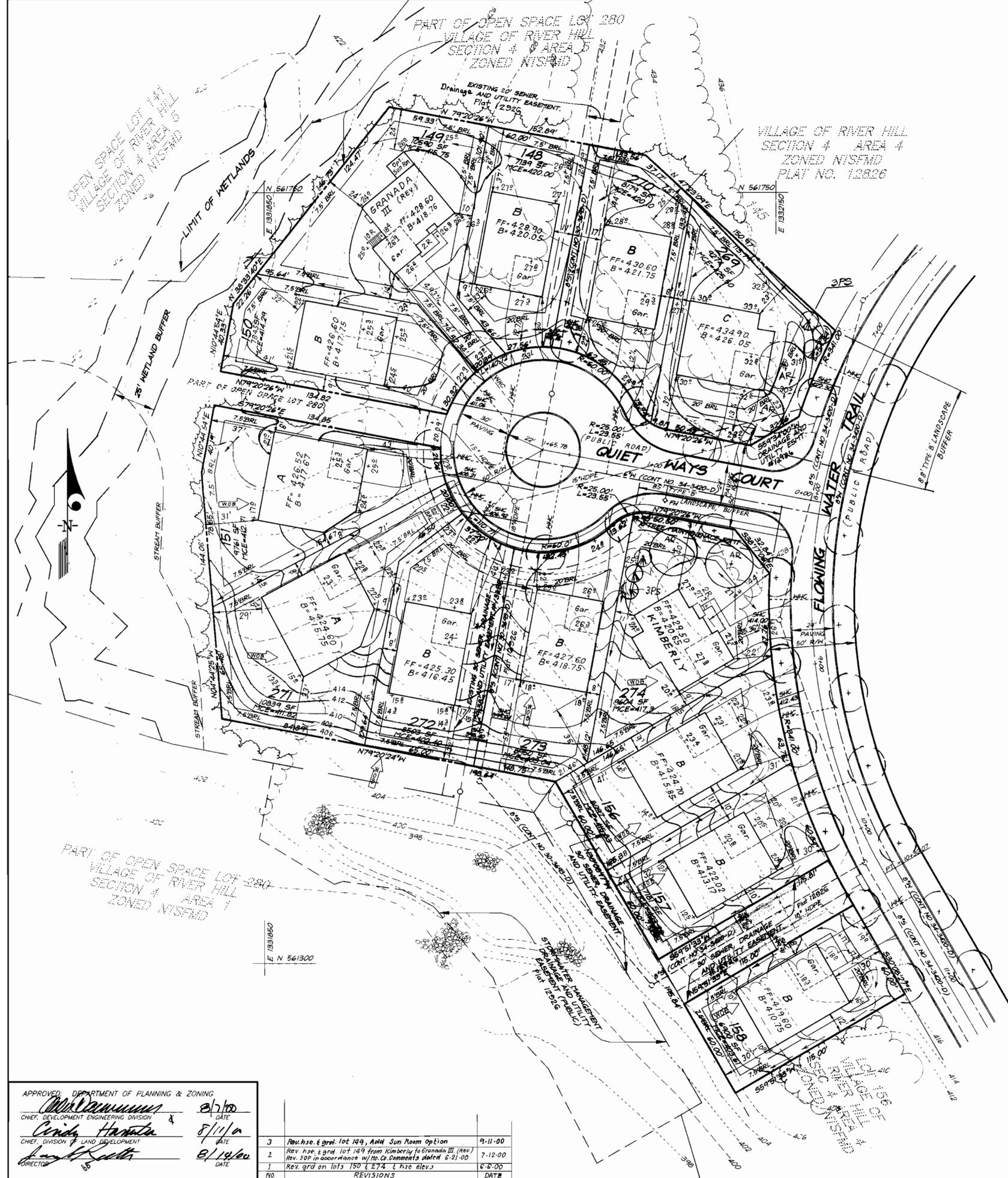
DATE 5-18-00 **FOR:** ALLEN HOMES 10260 Old Columbia Rd. Rivers Corporate Park Columbia MD, 21046 **FILE NO.** 00-006-X

APPROVED: DEPARTMENT OF PLANNING & ZONING

Chris Deamus 8/7/00
CHIEF, DEVELOPMENT ENGINEERING DIVISION
Cecilia Hamilton 8/11/00
CHIEF, DIVISION OF LAND DEVELOPMENT
Gregory Smith 8/19/00
DIRECTOR

NO.	REVISIONS	DATE
3	Add Opt. Sun Room to Granada II / Newport II	10-6-00
2	Rev. hse type Granada III - add Sun Room Opt.	9-11-00
1	Rev. SDP in accordance w/Ho Co Comments dated 6-21-00	7-12-00





LEGEND

CONTOUR INTERVAL: 2 FT

EXISTING CONTOUR: 340

PROPOSED CONTOUR: 340

DIRECTION OF DRAINAGE: (Symbol with arrow)

WALK OUT BASEMENT: (Symbol)

SPOT ELEVATION: (Symbol)

STABILIZED CONSTRUCTION ENTRANCE: (Symbol)

EROSION CONTROL MATTING: (Symbol)

SUPER SILT FENCE: (Symbol)

SILT FENCE: (Symbol)

TREE PROTECTION FENCE: (Symbol)

EXISTING TREES TO REMAIN: (Symbol)

LIMIT OF DISTURBED AREA: (Symbol)

STREET TREE PER F-96.130 & F-98.120: (Symbol)

PLANT SCHEDULE

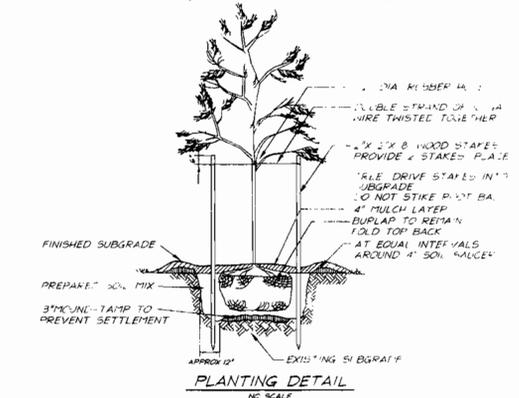
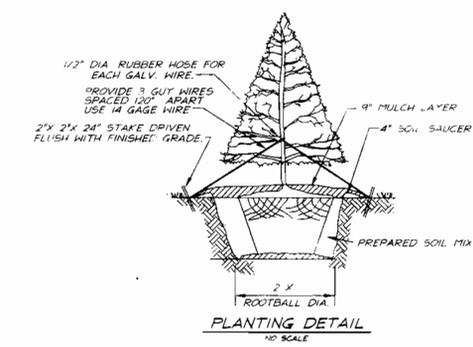
KEY	PLANT NAME	SIZE	QUAN	REMARKS
AR	ACER RUBRUM / RED SUNSET	2 1/2"-3" CAL	4	BAB
AR	RED SUNSET MAPLE	12"-14" HT		
PS	PINUS STROBUS / WHITE PINE	6'-8' HT	6	BAB

- NOTES**
- All plant materials shall be full and heavy, be well formed and symmetrical, conform to the most current AAN specifications and be installed in accordance with HRD planting specifications.
 - Contractor shall verify location of all underground utilities prior to digging.
 - Final location of plant material may need to vary to meet final field conditions. Trees shall not be planted in the bottom of drainage swales.

SCHEDULE A PERIMETER LANDSCAPE EDGE

Category	Adjacent to Roadway	LOT 269	LOT 274
Landscape Type B		260	274
Frontage/Perimeter		88	85
Number of Plants Required			
Shade Trees (W50)		2	2
Evergreen Trees (V40)		3	3
Shrubs			
Number of Plants Provided			
Shade Trees		2	2
Evergreen Trees		3	3
Surety Amounts		\$1,050.00	\$1,050.00

Landscaping per Section 16.124 of the Howard County Code and Landscape Manual will be provided for Lot 269 for 5 trees in the amount of \$1,050.00 and for Lot 274 for 5 trees in the amount of \$1,050.00. Surety will be provided at time of grading permit application.



DEVELOPER'S/BUILDERS CERTIFICATE

We certify that the landscaping shown on this plan will be done according to this plan, and per Section 16.124 of Howard County Code and the Howard County Landscape Manual. We further certify that upon completion a Certificate of Landscape Installation, accompanied by an executed one year guarantee of plant materials, will be submitted to the Department of Planning and Zoning.

Allan Washack
ALLAN WASHACK

5-18-00
Date

OWNER/DEVELOPER
HOWARD RESEARCH AND DEVELOPMENT CORP
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MD 21044

CLARK • FINEFROCK & SACKETT, INC.
ENGINEERS • PLANNERS • SURVEYORS
7135 MINNISTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED BAL	SITE DEVELOPMENT and LANDSCAPE PLAN LOTS 148-151, 156-158 AND 269-274 COLUMBIA VILLAGE OF RIVER HILL SECTION 4 AREA 4 FIFTH (5th) ELECTION DISTRICT HOWARD COUNTY, MARYLAND	SCALE 1" = 30'
DRAWN ZAH JTR		DRAWING 2 of 4
CHECKED JME		JOB NO. 00-006
DATE 5-18-00		FILE NO. 00-006X

FOR: ALLAN HOMES
10280 OLD COLUMBIA ROAD
RIVERS CORPORATE PARK
COLUMBIA, MARYLAND 21046

APPROVED: DEPARTMENT OF PLANNING & ZONING
[Signature] 8/11/00
 CHIEF, DEVELOPMENT ENGINEERING DIVISION
[Signature] 8/11/00
 CHIEF, DIVISION OF LAND DEVELOPMENT
[Signature] 8/14/00
 DIRECTOR

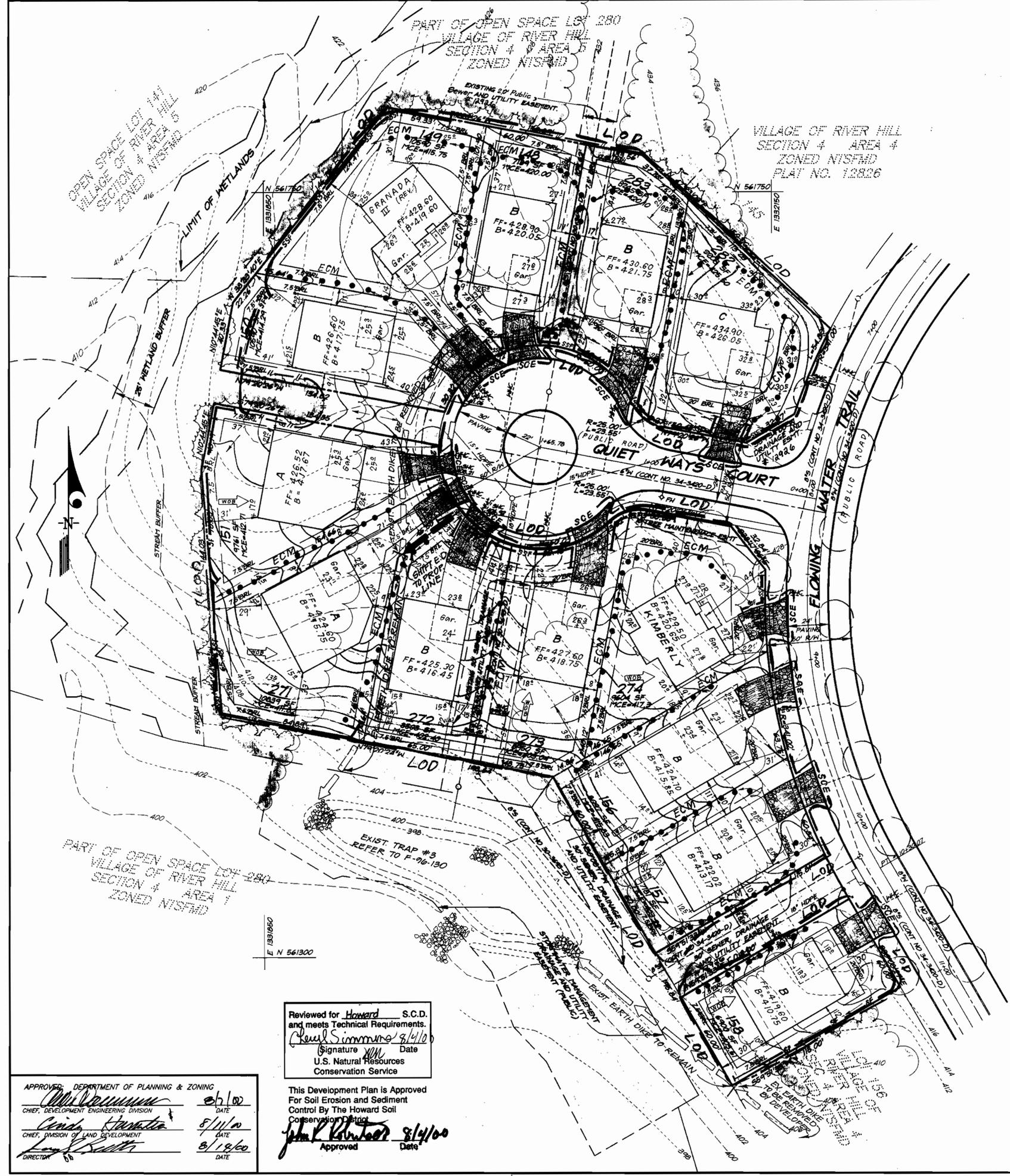
NO.	REVISIONS	DATE
3	Rev. hse. & grnd. lot 149, Add Sun Room Option	9-11-00
2	Rev. hse. & grnd. lot 149 from Kimberly to Granada III (REV) Rev. SDP in accordance w/ Ho. Co. Comments dated 6-21-00	7-12-00
1	Rev. grd on lots 150 & 274 & hse elev.	6-6-00



NO.	REVISIONS	DATE
1	Rev. grad. on lots 150 & 274 & hse. elev.	6-6-00
2	Rev. hse & grad on lot 149 from KIMBERLY to GRANADA III (REV) Rev. SEE in accordance w/ Ho.Co. Comments dated 6-21-00	7-12-00
3	Rev. lot #s 282 & 270 to 282 & 283 per Re-Sub. Plat	3/27/01

LEGEND

CONTOUR INTERVAL	2 FT.
EXISTING CONTOUR	--- 340 ---
PROPOSED CONTOUR	--- 340 ---
DIRECTION OF DRAINAGE	--->---
WALK OUT BASEMENT	--->---
SPOT ELEVATION	+ 78.4
STABILIZED CONSTRUCTION ENTRANCE	--->---
EROSION CONTROL MATTING	--->---
SUPER SILT FENCE	--->---
SILT FENCE	--->---
TREE PROTECTION FENCE	--->---
EXISTING TREES TO REMAIN	--->---
LIMIT OF DISTURBED AREA	--->---
STREET TREE PER F-90-130	--->---
F-98-120	--->---
EXIST. EARTH DIKE	--->---
PROP. EARTH DIKE	--->---



DEVELOPER'S/BUILDERS CERTIFICATE

"We certify that all development and construction will be done according to this 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 at a Dept. 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 Howard Soil Conservation District or their authorized agencies, as are deemed necessary."

C. Allan Whistler 5-18-00
Signature of Developer/Builder Date

OWNER/DEVELOPER

HOWARD RESEARCH AND DEVELOPMENT CORP
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MD 21044



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 5-18-00
G. Nelson Clark Date

Reviewed for Howard S.C.D. and meets Technical Requirements.
Paul Simmons 8/14/00
Signature Date
U.S. Natural Resources Conservation Service

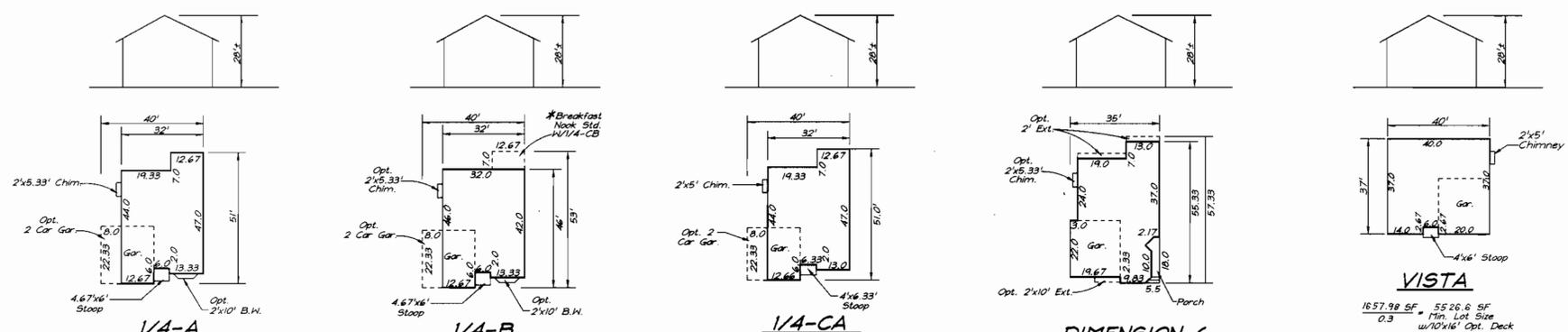
This Development Plan is Approved For Soil Erosion and Sediment Control By The Howard Soil Conservation District
John P. Robertson 8/14/00
Approved Date

APPROVED: DEPARTMENT OF PLANNING & ZONING
Chad Hamilton 8/14/00
CHIEF, DEVELOPMENT ENGINEERING DIVISION DATE
Chris Hamilton 8/14/00
CHIEF, DIVISION OF LAND DEVELOPMENT DATE
John Smith 8/14/00
DIRECTOR DATE

CLARK • FINEFROCK & SACKETT, INC.
ENGINEERS • PLANNERS • SURVEYORS
7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED BAL	SEDIMENT AND EROSION CONTROL PLAN LOTS 148-151, 156 - 158, 271-274, 282 and 283 COLUMBIA VILLAGE OF RIVER HILL SECTION 4 AREA 4 FIFTH (5th) ELECTION DISTRICT HOWARD COUNTY, MARYLAND	SCALE 1" = 30'
DRAWN JTR		DRAWING 3 of 4
CHECKED JME		JOB NO. 00-006
DATE 5-18-00		FILE NO. 00-006SE

FOR: ALLAN HOPES
10260 OLD COLUMBIA ROAD
RIVERS CORPORATE PARK
COLUMBIA, MARYLAND 21046

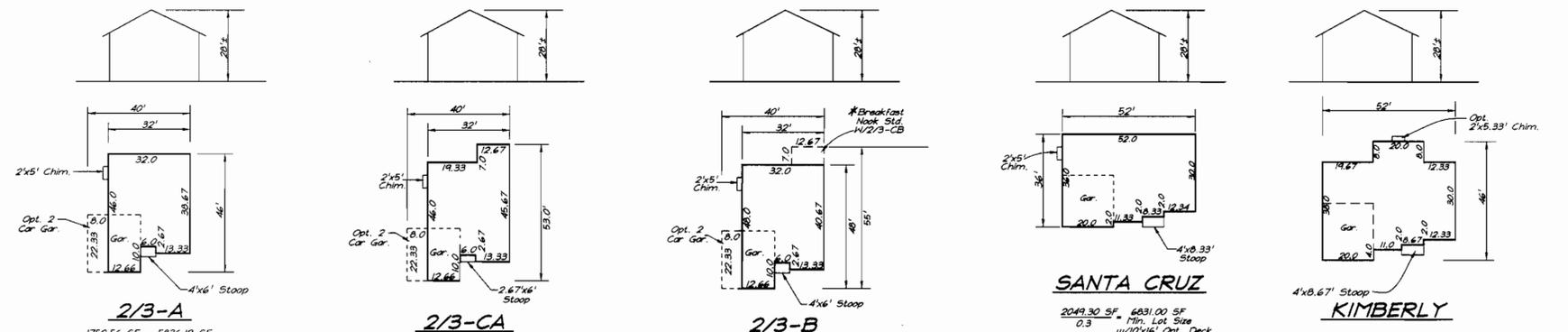


1/4-A
1050.23 SF = 6167.48 SF
0.3 Min. Lot Size w/10'x16' Deck & 2 Car Gar.

1/4-B
1923.75 SF = 6412.50 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck And 2 Car Gar.

1/4-CA
1840.49 SF = 6134.97 SF
0.3 Min. Lot Size (2 Car Gar.) w/10'x16' Opt. Deck

DIMENSION 6
1384.32 SF = 6614.40 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck And 2' Opt. Exts.

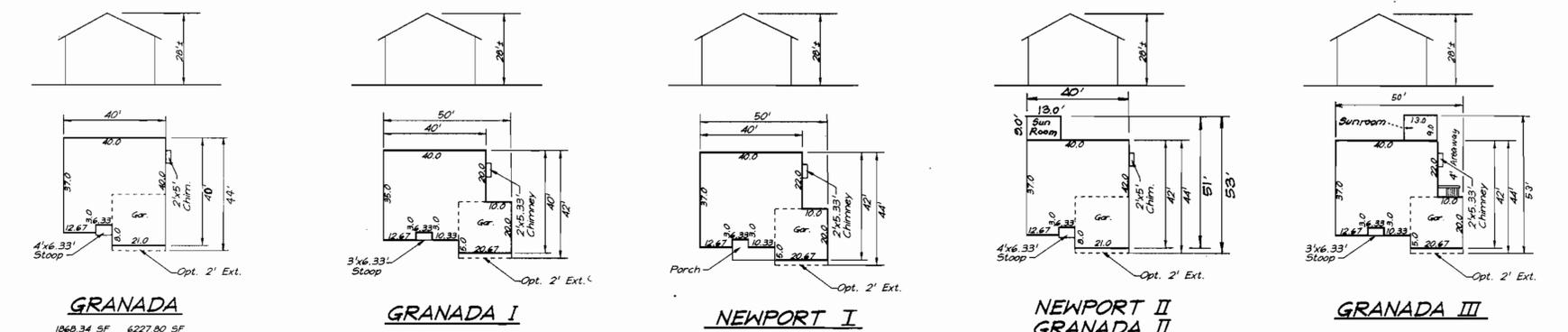


2/3-A
1750.56 SF = 5836.19 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

2/3-CA
1821.57 SF = 6071.89 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck And Opt. 2 Car Gar.

2/3-B
1919.14 SF = 6397.14 SF
0.3 Min. Lot Size (2 Car Gar. w/Nook) And 10'x16' Deck

2/3-CB*
2049.30 SF = 6831.00 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck



GRANADA
1848.34 SF = 6227.80 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

GRANADA I
1845.35 SF = 6217.83 SF
0.3 Min. Lot Size w/2' Opt. Ext. And 10'x16' Opt. Deck

NEWPORT I
2020.65 SF = 6742.17 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

NEWPORT II
1920.33 SF = 6401.1 SF
0.3 Min. Lot Size w/ All Options And 10'x16' Opt. Deck

GRANADA II
1945.35 SF = 6484.50 SF
0.3 Min. Lot Size w/2' Opt. Ext. And 10'x16' Opt. Deck

GRANADA III
2062.35 SF = 6874.50 SF
0.3 Min. Lot Size w/ all options and 10'x16' Opt. Deck

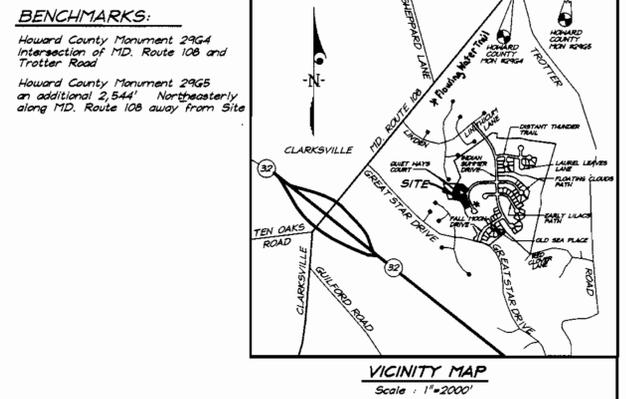
CUSTOM KIMBERLY
2246.02 SF = 7486.73 SF
0.3 Min. Lot Size w/10'x16' Opt. Deck

ADDRESS CHART

LOT NUMBER	STREET ADDRESS
148	5908 QUIET WAYS COURT
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SEDIMENT AND EROSION CONTROL DETAILS	4 of 4



- GENERAL NOTES:**
- Subject property is zoned: NTSFLD per 10-18-93 Comprehensive Zoning Plan.
 - The total area included in this submission is 2.43 Acres.
 - The total number of lots included in this submission is: 13
 - Improvement to property: Single Family Detached
 - The maximum lot coverage permitted is: 30%
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SPECIAL NOTES:
This plan is for house siting and lot grading only. Improvements shown within the rights-of-way on this S.D.P. are not to be used for construction. For construction, see approved Road Construction Plans F-96-130 and/or approved Water and Sewer Plans Contract #34-3420-D.

OWNER / DEVELOPER
THE HOWARD RESEARCH AND DEVELOPMENT CORP.
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044

SUBDIVISION NAME	COLUMBIA	SECTION/AREA	LOTS/PARCELS
VILLAGE OF RIVER HILL	4/4	148-151, 156-158	#271-274, 282 & 283
PLAT NO.	12924, 13288, 12926, 14689	BLOCK NO.	1
PLAT NO.	12924, 13288, 12926, 14689	ZONE	NTSFLD
		TAX MAP NO.	35
		ELECTION DIST.	5TH
		CENSUS TRACT	6055
WATER CODE	110	SEWER CODE	6653000

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ENGINEERS • PLANNERS • SURVEYORS
7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED BY: B.A.L.
DRAWN BY: K.B.
CHECKED BY: B.A.L.
DATE: 5-18-00

SEDIMENT AND EROSION CONTROL PLAN
SITE DEVELOPMENT PLAN
LOTS 148-151, 156-158, 271-274, 282 and 283
COLUMBIA VILLAGE OF RIVER HILL
SECTION 4 AREA 4
FIFTH (5th) ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

SCALE: 1" = 30'
DRAWING: 1 of 4
JOB NO.: 00-006
FILE NO.: 00-006-X

FOR: ALLEN HOMES
10260 Old Columbia RD.
Rivers Corporate Park
Columbia MD, 21046

SDP 00-135 (9) D:00-006

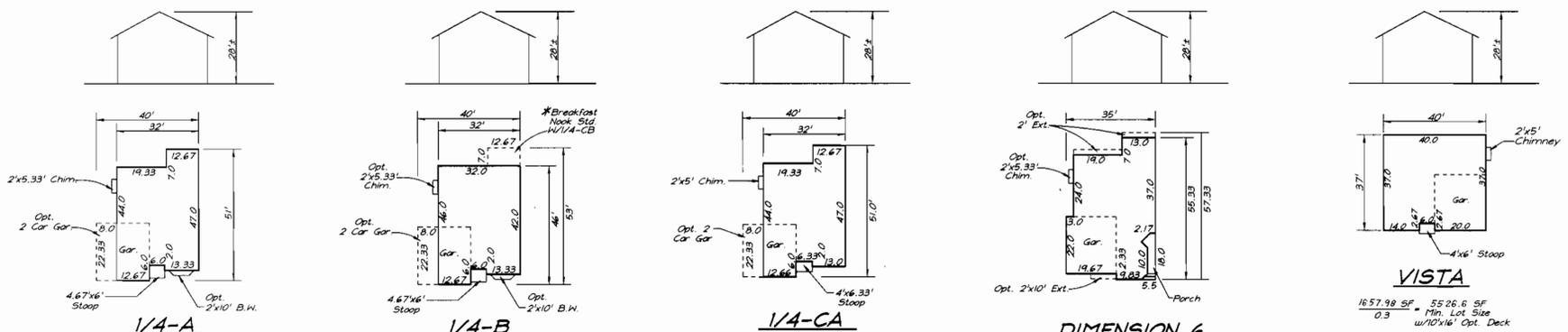
APPROVED: DEPARTMENT OF PLANNING & ZONING
CHIEF, DEVELOPMENT ENGINEERING DIVISION
CHIEF, DIVISION OF LAND DEVELOPMENT
DIRECTOR

DATE: 5/11/00
DATE: 5/19/00

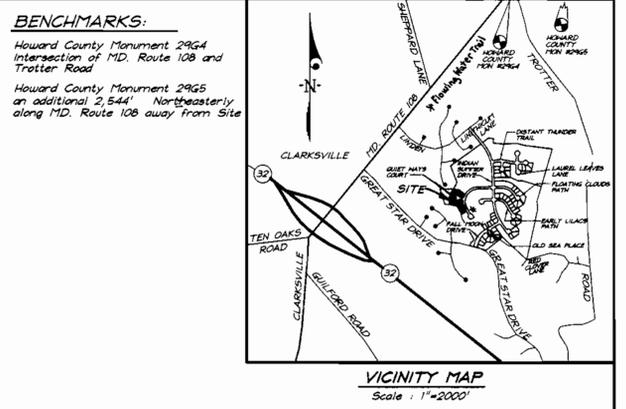
REVISIONS

NO.	REVISIONS	DATE
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3	Add Opt. Sun Room to Granada II / Newport II	10-6-00
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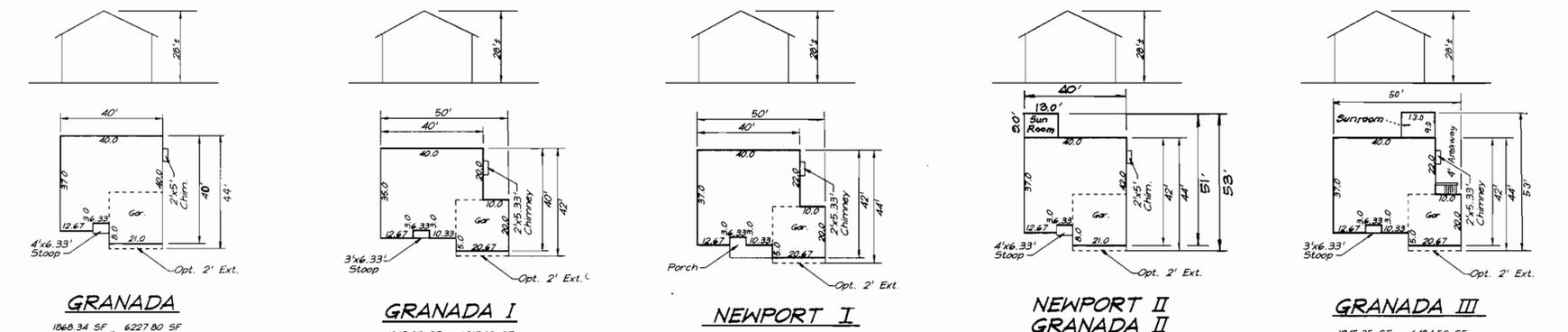
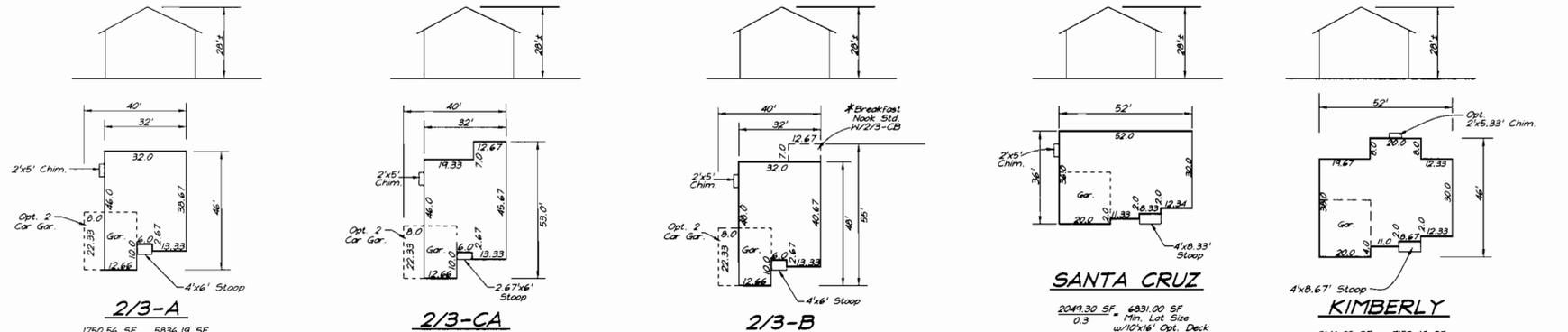


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 - Stormwater Management quantity and quality for the improvements from Bright Flow Maus, area North of Distant Thunder Trail DA to 1309 from Section 4 Area 5, F-96-102 will be provided by an excavated pond East of Distant Thunder Trail. Said pond will be jointly maintained. Stormwater Management quantity for the improvements West of Indian Summer Drive and South of Sunlit Water Way is provided by Village of River Hill Section 4 Area 1, Phase 1, F-96-110. Water quality will be provided by bio-retention or shallow marsh at the storm drain outfalls and will be jointly maintained. Stormwater Management quantity for the improvements East of Indian Summer Drive and South of Distant Thunder Trail are provided for in Section 4 Area 1, F-96-110 by proposed features as described in a report prepared by Whitman, Reardon & Associates and approved as of 1/20/95. Water quality will be provided by bio-retention or shallow marsh at the storm drain outfalls and will be jointly maintained.
 - SHC Elevations shown are at the property lines.
 - This plan has been prepared in accordance with the provisions of section 16.124 of the Howard County code and Landscape Manual. Financial Surety for the trees in Schedule A in the amount of \$2,100.00 shall be part of the Builders Grading Permit Application for Lots 282 and 283. (See sheet 2)
 - This property is exempt from the Forest Conservation requirements per section 16.1202 (b)(1)(iv) of the Howard County Code because it is part of a planned unit Development with preliminary plan approval prior to 12/31/92



- SPECIAL NOTES:**
- This plan is for house siting and lot grading only. Improvements shown within the rights-of-way on this S.D.P. are not to be used for construction. For construction, see approved Road Construction Plans F-96-130 and/or approved Water and Sewer Plans Contract #34-3420-D.

OWNER / DEVELOPER
 THE HOWARD RESEARCH AND DEVELOPMENT CORP.
 10275 LITTLE PATUXENT PARKWAY
 COLUMBIA, MARYLAND 21044

SUBDIVISION NAME	COLUMBIA	SECTION/AREA	4/4	LOTS/PARCELS	148-151, 156-158 & 271-274, 282 & 283
PLAT NO.	12924, 13286, 12926, 14669	BLOCK NO.	1	ZONE	NTSFLD
TAX MAP NO.	35	ELECTION DIST.	5TH	CENSUS TRACT	6055
WATER CODE	110	SEWER CODE	6653000		

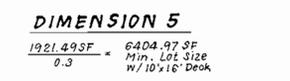
CLARK • FINEFROCK & SACKETT, INC.
 ENGINEERS • PLANNERS • SURVEYORS
 7135 MINTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

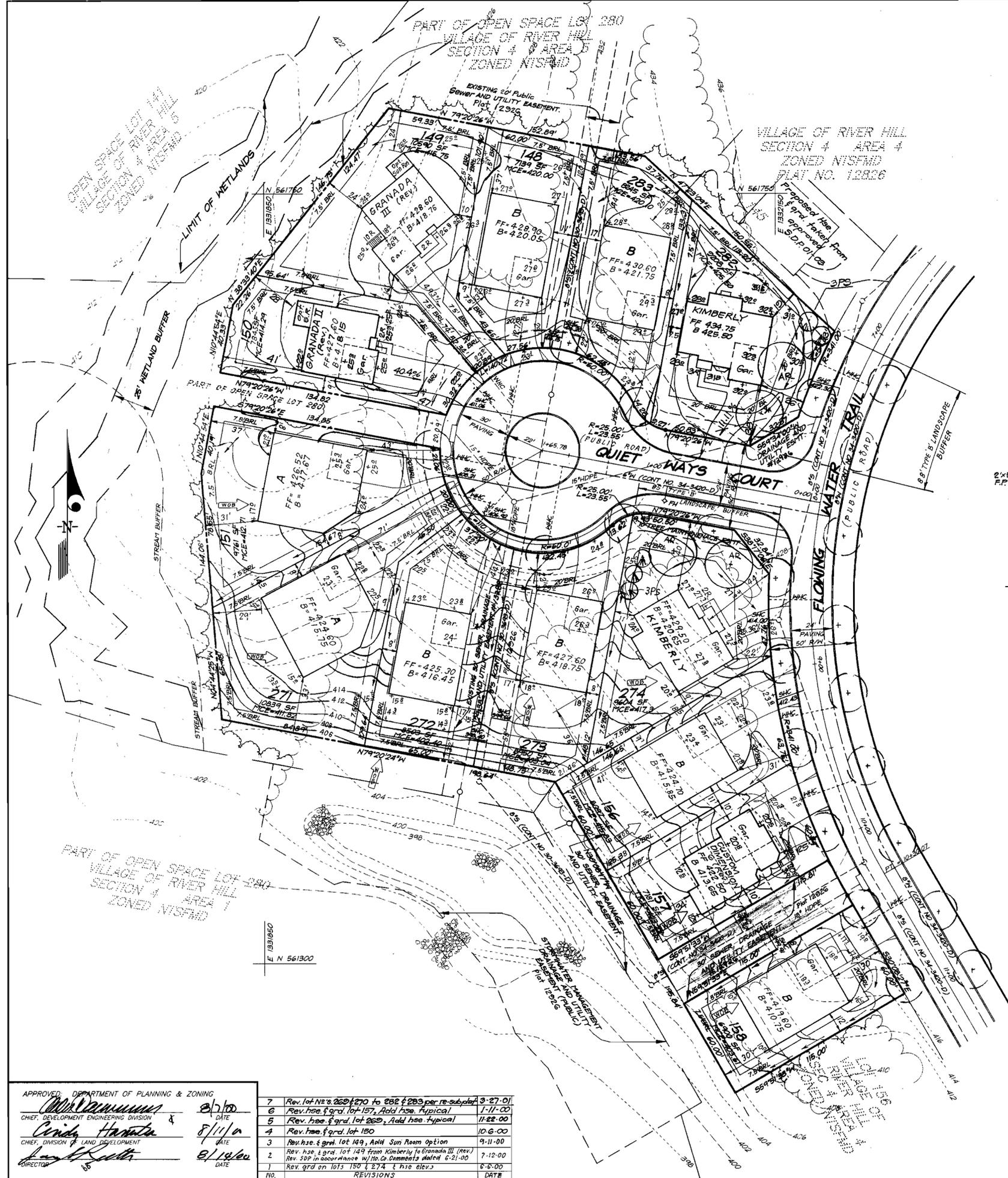
DESIGNED	B.A.L.	SEDIMENT AND EROSION CONTROL PLAN	SCALE	1" = 30'
DRAWN	K.B.	SITE DEVELOPMENT PLAN	DRAWING	1 of 4
CHECKED	B.A.L.	LOTS 148-151, 156-158, 271-274, 282 and 283	JOB NO.	00-006
DATE	5-18-00	COLUMBIA VILLAGE OF RIVER HILL	FILE NO.	00-006-X

FOR: ALLEN HOMES
 10640 Old Columbia Rd.
 Rivers Corporate Park
 Columbia MD, 21046

APPROVED: DEPARTMENT OF PLANNING & ZONING
 [Signature]
 CHIEF, DEVELOPMENT ENGINEERING DIVISION
 [Signature]
 CHIEF, DIVISION OF LAND DEVELOPMENT
 [Signature]
 DIRECTOR

NO.	REVISIONS	DATE
5	Added Dimension 5 house type	4-18-01
4	Rev. lot No's. 269 & 270 to 282 & 283 per re-subplat.	3-27-01
3	Add Opt. Sun Room to Granada II / Newport II	10-6-00
2	Rev. hse type Granada III - add Sun Room Opt.	9-11-00
1	Rev. SDP in accordance with comments, dated 6-21-00	7-12-00





LEGEND

CONTOUR INTERVAL: 2 FT

EXISTING CONTOUR: 340

PROPOSED CONTOUR: 340

DIRECTION OF DRAINAGE:

WALK OUT BASEMENT:

SPOT ELEVATION:

STABILIZED CONSTRUCTION ENTRANCE:

EROSION CONTROL MATTING:

SUPER SILT FENCE:

SILT FENCE:

TREE PROTECTION FENCE:

EXISTING TREES TO REMAIN:

LIMIT OF DISTURBED AREA:

STREET TREE PER F96-130 & F-98-120:

PLANT SCHEDULE

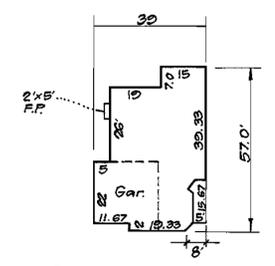
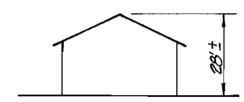
KEY	PLANT NAME	SIZE	QUAN.	REMARKS
(AR)	ACER RUBRUM 'RED SUNSET'	2 1/2"-3" CAL.	4	B4B
(PS)	PINUS STROBUS WHITE PINE	6'-8' HT.	6	B4B

- NOTES**
- All plant materials shall be full and heavy, be well formed and symmetrical, conform to the most current AAN specifications and be installed in accordance with HRD planting specifications.
 - Contractor shall verify location of all underground utilities prior to digging.
 - Final location of plant material may need to vary to meet final field conditions. Trees shall not be planted in the bottom of drainage swales.

SCHEDULE A PERIMETER LANDSCAPE EDGE

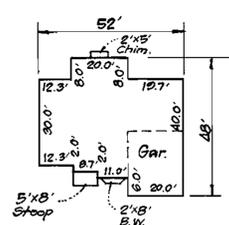
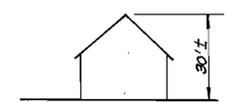
Category	Adjacent to Roadways	LOT 282	LOT 274
Landscape Type B		282	274
Frontage/Perimeter		88	85
Number of Plants Required			
Shade Trees (V50)		2	2
Evergreen Trees (V40)		3	3
Shrubs			
Number of Plants Provided			
Shade Trees		2	2
Evergreen Trees		3	3
Surety Amounts		\$1,050.00	\$1,050.00

Landscaping per Section 16.124 of the Howard County Code and Landscape Manual will be provided for lot 282 for 5 trees in the amount of \$1,050.00 and for Lot 274 for 5 trees in the amount of \$1,050.00. Surety will be provided at time of grading permit application.

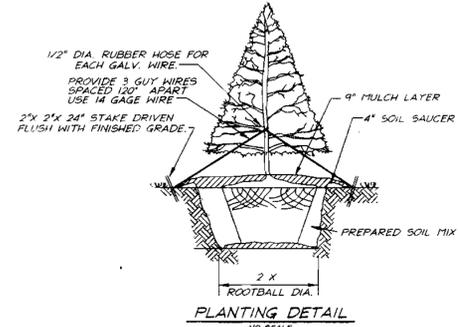


CUSTOM DIMENSION 6

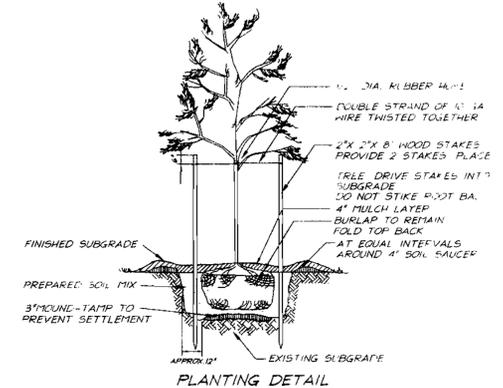
$\frac{2061}{0.3} = 6870 \text{ SF Min. Lot Size w/10'x16' Deck}$



KIMBERLY (Mod.)
For Lot 282 Only
 $2309 \pm = 7628.0 \text{ sq. Min. Lot Size w/opt. incl. 10'x16' opt. Deck}$



PLANTING DETAIL
NO SCALE



PLANTING DETAIL
NO SCALE

DEVELOPER'S/BUILDERS CERTIFICATE

I/We certify that the landscaping shown on this plan will be done according to this plan, and per Section 16.124 of Howard County Code and the Howard County Landscape Manual. I/We further certify that upon completion a certificate of landscape installation, accompanied by an executed one year guarantee of plant materials, will be submitted to the Department of Planning and Zoning.

Allan Washack
ALLAN WASHACK

5-18-00
Date

OWNER/DEVELOPER

HOWARD RESEARCH AND DEVELOPMENT CORP
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MD 21044

APPROVED: DEPARTMENT OF PLANNING & ZONING
[Signature]
CHIEF, DEVELOPMENT ENGINEERING DIVISION
[Signature]
CHIEF, DIVISION OF LAND DEVELOPMENT
[Signature]
DIRECTOR

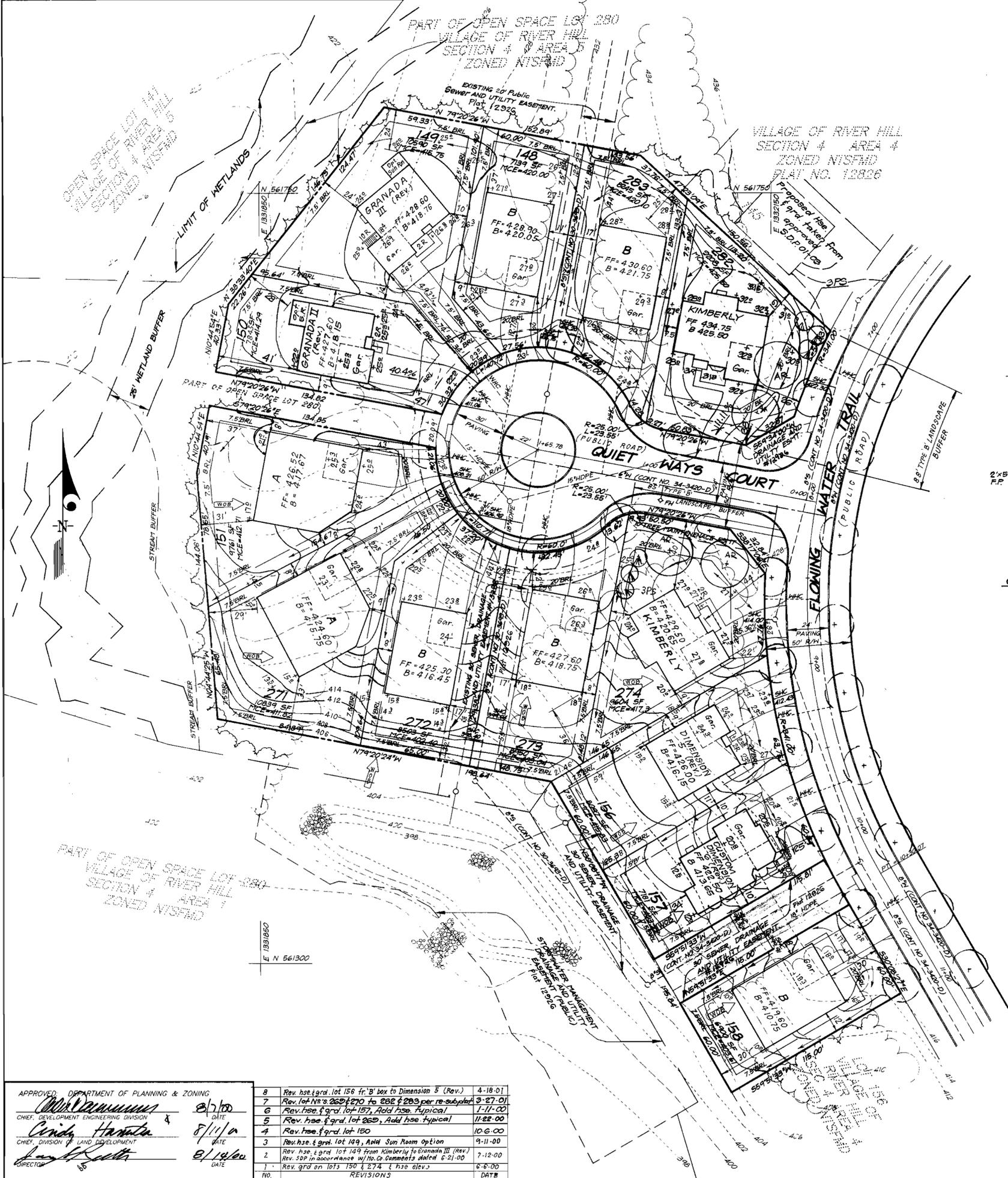
REVISIONS

NO.	REVISIONS	DATE
7	Rev. lot No's 280 & 270 to 282 & 283 per re-subplat	3-27-01
6	Rev. hse. & grd. lot 157, Add hse. typical	1-11-00
5	Rev. hse. & grd. lot 280, Add hse. typical	11-22-00
4	Rev. hse. & grd. lot 150	10-6-00
3	Rev. hse. & grd. lot 149, Add Sun Room Option	9-11-00
2	Rev. hse. & grd. lot 149 from Kimberly to Granada III (REV) Rev. SFP in accordance w/Ho.Co. Comments dated 6-21-00	7-12-00
1	Rev. grd on lots 150 & 274 & hse elev.	6-6-00



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ENGINEERS • PLANNERS • SURVEYORS
7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED BAL	SITE DEVELOPMENT and LANDSCAPE PLAN LOTS 148-151, 156-158, 271-274, 282 and 283 COLUMBIA VILLAGE OF RIVER HILL SECTION 4 AREA 4 FIFTH (5th) ELECTION DISTRICT HOWARD COUNTY, MARYLAND	SCALE 1" = 30'
DRAWN ZAH JFR		DRAWING 2 of 4
CHECKED JME		JOB NO. 00-006
DATE 5-18-00		FILE NO. 00-006X
		FOR: ALLAN HOTES 10280 OLD COLUMBIA ROAD RIVERS CORPORATE PARK COLUMBIA, MARYLAND 21046



- LEGEND**
- CONTOUR INTERVAL: 2 FT
 - EXISTING CONTOUR: [Symbol]
 - PROPOSED CONTOUR: [Symbol]
 - DIRECTION OF DRAINAGE: [Symbol]
 - WALK OUT BASEMENT: [Symbol]
 - SPOT ELEVATION: [Symbol]
 - STABILIZED CONSTRUCTION ENTRANCE: [Symbol]
 - EROSION CONTROL MATTING: [Symbol]
 - SUPER SILT FENCE: [Symbol]
 - SILT FENCE: [Symbol]
 - TREE PROTECTION FENCE: [Symbol]
 - EXISTING TREES TO REMAIN: [Symbol]
 - LIMIT OF DISTURBED AREA: [Symbol]
 - STREET TREE PER F-98-130 & F-98-120: [Symbol]

PLANT SCHEDULE

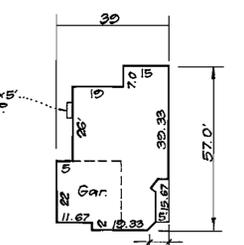
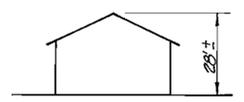
KEY	PLANT NAME	SIZE	QUAN	REMARKS
(AR)	ACER RUBRUM / RED SUNSET	2 1/2"-3" GAL.	4	B4B
(AR)	RED SUNSET MAPLE	12"-14" HT.	4	B4B
(PS)	PINUS STROBUS	6'-8" HT.	6	B4B
(PS)	WHITE PINE			

- NOTES**
- All plant materials shall be full and heavy be well formed and symmetrical, conform to the most current AAM specifications and be installed in accordance with H&R planting specifications.
 - Contractor shall verify location of all underground utilities prior to digging.
 - Final location of plant material may need to vary to meet final field conditions. Trees shall not be planted in the bottom of drainage swales.

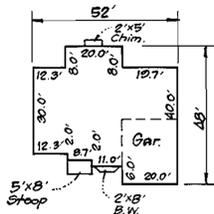
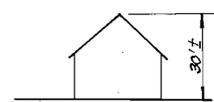
SCHEDULE A PERMETER LANDSCAPE EDGE

Category	Adjacent to Roadway	LOT 282	LOT 274
Landscape Type B		282	274
Frontage/Perimeter		88	85
Number of Plants Required			
Shade Trees (1/30)		2	2
Evergreen Trees (1/40)		3	3
Shrubs			
Number of Plants Provided			
Shade Trees		3	2
Evergreen Trees			3
Surety Amounts		\$1,050.00	\$1,050.00

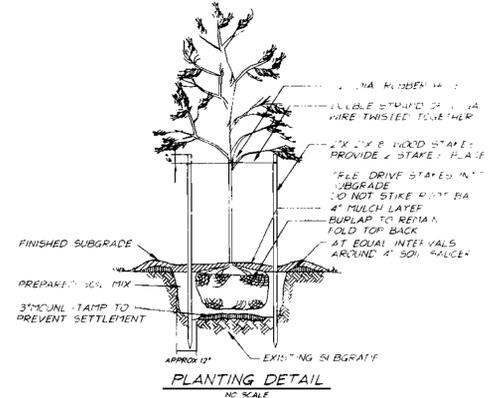
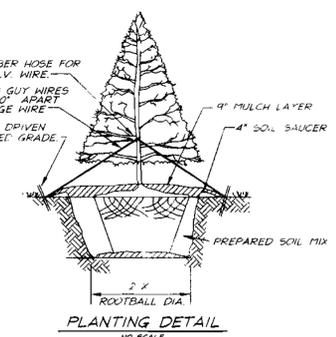
Landscaping per Section 16.124 of the Howard County Code and Landscape Manual will be provided for Lot 282 for 5 trees in the amount of \$1,050.00 and for Lot 274 for 5 trees in the amount of \$1,050.00. Surety will be provided at time of grading permit application.



CUSTOM DIMENSION 6
 $\frac{2061}{0.3} = 6870$ SF Min. Lot Size w/10'x16' Deck



KIMBERLY (Mod.)
 For Lot 282 Only
 $\frac{2922.4}{0.3} = 7698.0$ Min. Lot Size w/10'x16' opt. Deck



DEVELOPER'S/BUILDERS CERTIFICATE

I/We certify that the landscaping shown on this plan will be done according to this plan, and per Section 16.124 of Howard County Code and the Howard County Landscape Manual. I/We further certify that upon completion a Certificate of Landscape Installation, accompanied by an executed one year guarantee of plant materials, will be submitted to the Department of Planning and Zoning.

Allan Washack
ALLAN WASHACK

5-18-00
 Date

OWNER/DEVELOPER

HOWARD RESEARCH AND DEVELOPMENT CORP
 10275 LITTLE PATUXENT PARKWAY
 COLUMBIA, MD 21044

APPROVED, DEPARTMENT OF PLANNING & ZONING
Michael J. ...
 CHIEF, DEVELOPMENT ENGINEERING DIVISION
Conrad ...
 CHIEF, DIVISION OF LAND DEVELOPMENT
James ...
 DIRECTOR

REVISIONS

NO.	REVISIONS	DATE
8	Rev. hse. & grd. lot 156 fr. 'B' box to Dimension 5 (Rev.)	4-18-01
7	Rev. lot 156's 282' x 270' to 282' x 283' per re-subplot	3-27-01
6	Rev. hse. & grd. lot 157, Add hse. typical	1-11-00
5	Rev. hse. & grd. lot 282, Add hse. typical	11-22-00
4	Rev. hse. & grd. lot 150	10-6-00
3	Rev. hse. & grd. lot 149, Add Sun Room option	9-11-00
2	Rev. hse. & grd. lot 149 From Kimberly to Granada III (Rev.)	7-12-00
1	Rev. SDP in accordance w/No. Co. Comments dated 6-21-00	6-8-00
1	Rev. grd on lots 150 & 274 & hse. elev.	6-8-00



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 ENGINEERS • PLANNERS • SURVEYORS
 7135 MINSTREL WAY • COLUMBIA, MD 21045 • (410) 381-7500 BALT. • (301) 621-8100 WASH.

DESIGNED: B.A.L. SITE DEVELOPMENT and LANDSCAPE PLAN
 DRAWN: ZAH, J.T.R. LOTS 148-151, 156-158, 271-274, 282 and 283
 CHECKED: J.M.E. SCALE: 1" = 30'
 DATE: 5-18-00 DRAWING: 2 of 4
 JOB NO.: 00-006
 FILE NO.: 00-006X

FOR: ALLAN WASHACK
 10280 OLD COLUMBIA ROAD
 RIVERS CORPORATE PARK
 COLUMBIA, MARYLAND 21046