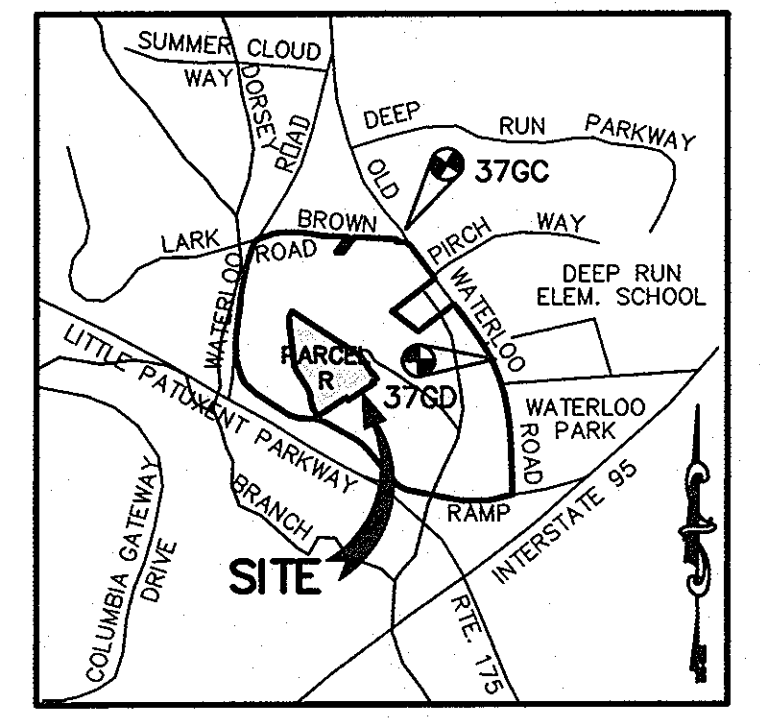


SHEET INDEX	
NO	DESCRIPTION
1	TITLE SHEET
2	SITE DEVELOPMENT PLAN
3	HANDICAPPED ACCESSIBILITY PLAN AND DETAILS
4	GRADING AND DRAINAGE PLAN
5	SIDEWALK UNDERDRAIN PLAN
6	LOADING DOCK GRADING AND UTILITIES
7	EROSION AND SEDIMENT CONTROL PLAN
8	SEDIMENT CONTROL NOTES AND DETAILS
9	CONSTRUCTION DETAILS
10	RECHARGE SYSTEM DETAILS
11	STORM SEWER PROFILES
12	STORM SEWER PROFILES
13	WATER PROFILES
14	LANDSCAPE PLAN
15	LIGHTING PLAN

SITE DEVELOPMENT PLAN GATEWAY OVERLOOK BENSON EAST PARCEL R 6th ELECTION DISTRICT HOWARD COUNTY, MARYLAND



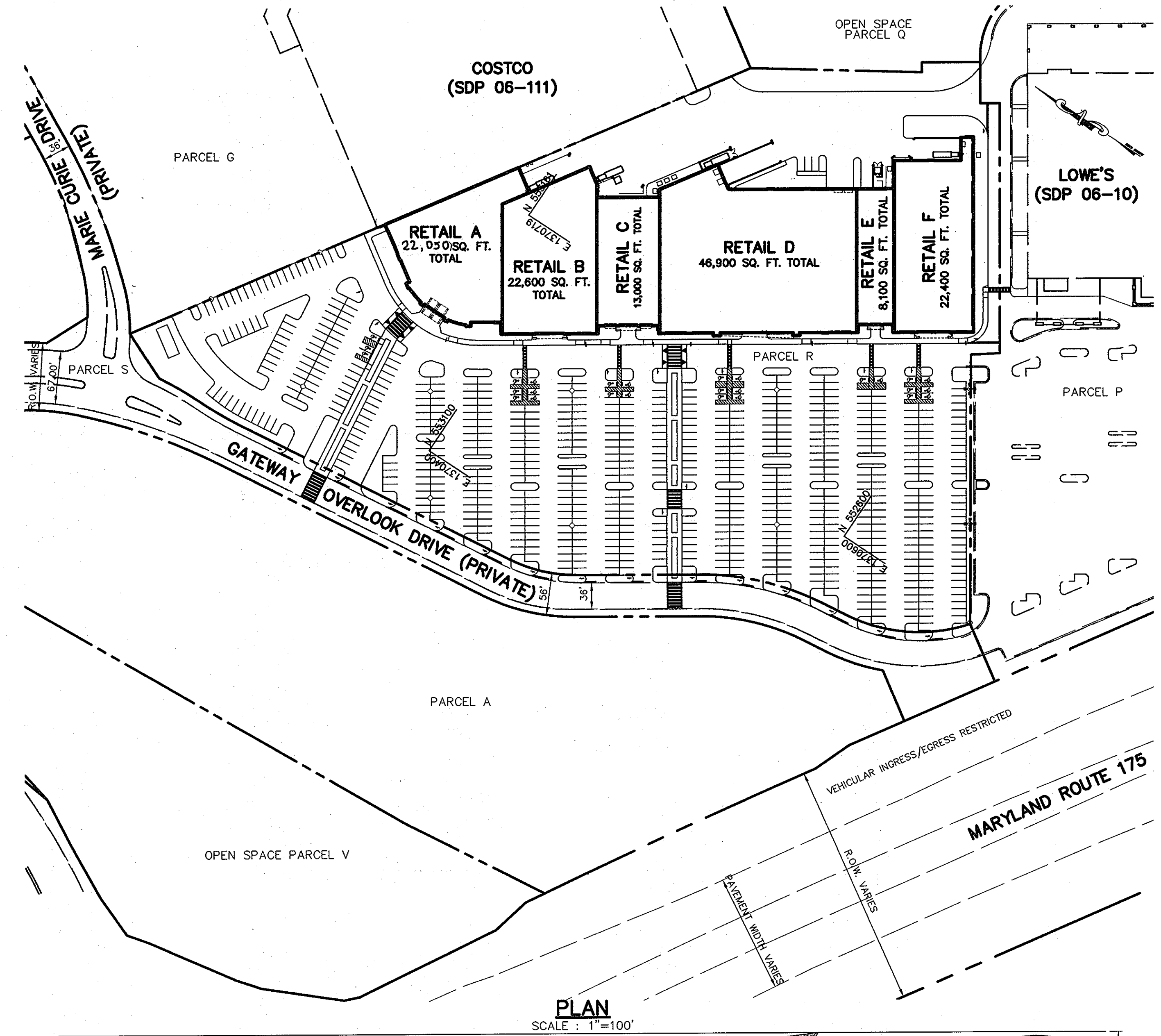
VICINITY MAP
SCALE: 1"=2000'
COPYRIGHT ADD. THE MAP PEOPLE
PERMITTED USE NO. 20894285

BENCHMARKS
CONTROL STATION 37GD
ELEVATION 331.855
N 555,250.791
E 1,370,946.348

CONTROL STATION 37CG
ELEVATION 307.455
N 552,081.826
E 1,370,625.818

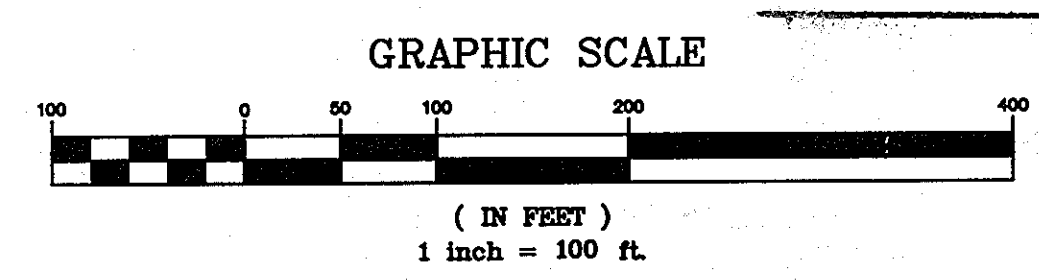
GENERAL NOTES

- ALL CONSTRUCTION SHALL BE IN ACCORDANCE WITH THE LATEST STANDARDS AND SPECIFICATIONS OF HOWARD COUNTY DESIGN MANUAL, VOL. IV "STANDARD SPECIFICATIONS AND DETAILS FOR CONSTRUCTION" PLUS MSHA STANDARDS AND SPECIFICATIONS, IF APPLICABLE.
- THE CONTRACTOR SHALL NOTIFY THE DEPARTMENT OF PUBLIC WORKS/BUREAU OF ENGINEERING/CONSTRUCTION INSPECTION DIVISION AT (410) 313-1880 AT LEAST FIVE (5) WORKING DAYS 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 BEING DONE.
- TRAFFIC CONTROL DEVICES, MARKINGS, AND SIGNING SHALL BE IN ACCORDANCE WITH THE LATEST EDITION OF THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD). ALL STREET AND REGULATORY SIGNS SHALL BE IN PLACE PRIOR TO THE PLACEMENT OF ANY ASPHALT.
- THE EXISTING TOPOGRAPHY IS BASED UPON THE PROPOSED CONTOURS INDICATED FOR THE MASS SITE GRADING ON SDP-04-163. PRE-DEVELOPED TOPOGRAPHY WAS TAKEN FROM FIELD RUN SURVEY WITH MAXIMUM TWO FOOT CONTOUR INTERVALS PREPARED BY DAFT McCUNE WALKER, INC. DATED MAY 2003.
- THE COORDINATES SHOWN HEREON ARE BASED UPON THE HOWARD COUNTY GEODETIC CONTROL WHICH IS BASED UPON THE MARYLAND STATE PLANE COORDINATE SYSTEM. HOWARD COUNTY MONUMENT NOS. 37GD AND 43AI WERE USED FOR THIS PROJECT.
- WATER IS PUBLIC. CONTRACT NO. 24-4209-D AND 24-4284-D.
- SEWER IS PUBLIC. CONTRACT NO. 24-4209-D AND 24-4284-D.
- THE STORMWATER MANAGEMENT FACILITIES PROPOSED UNDER SDP-04-163 FOR THIS SITE ARE ALL PRIVATELY OWNED AND MAINTAINED. WATER QUALITY VOLUME AND CHANNEL PROTECTION WILL BE PROVIDED IN ONE WET POND AND TWO MICROPOND EXTENDED DETENTION PONDS. REV. MANAGEMENT FOR THIS PARCEL IS INCLUDED HEREIN.
- APPROXIMATE LOCATION OF EXISTING UTILITIES ARE SHOWN. THE CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS TO PROTECT THE EXISTING UTILITIES AND MAINTAIN UNINTERRUPTED SERVICE. ANY DAMAGE INCURRED DUE TO CONTRACTOR'S OPERATION SHALL BE REPAIRED IMMEDIATELY AT THE CONTRACTOR'S EXPENSE. EXISTING UTILITIES ARE SHOWN BASED ON THE BEST AVAILABLE INFORMATION.
- THE WETLANDS AND STREAMS ARE BASED ON FIELD OBSERVATIONS BY DMW AND CONFIRMED BY ON-SITE MEETING WITH US ARMY CORP. OF ENGINEERS ON DEC. 13, 2002.
- THE TRAFFIC STUDY FOR THIS PROJECT WAS PREPARED BY WELLS & ASSOCIATES DATED APRIL, 2005.
- THE NOISE STUDY IS NOT REQUIRED FOR THIS PROJECT.
- THIS SITE PLAN IS EXEMPT FROM FOREST CONSERVATION OBLIGATIONS IN ACCORDANCE WITH SECTION 16.1202(b)(1)(iv) OF THE FOREST CONSERVATION MANUAL SINCE IT HAD PRELIMINARY PLAN APPROVAL PRIOR TO DECEMBER 31, 1992.
- THE BOUNDARY SURVEY FOR THIS PROJECT WAS PREPARED BY DAFT, McCUNE & WALKER, INC. SEPTEMBER 2002.
- SUBJECT PROPERTY ZONED NT, EMPLOYMENT CENTER COMMERCIAL PER 2-2-04 COMPREHENSIVE ZONING PLAN.
- ALL ELEVATIONS SHOWN ARE BASED ON THE U.S.C. AND G.S. MEAN SEA LEVEL DATUM, 1929.
- SEE DEPARTMENT OF PLANNING AND ZONING FILE NO'S.: S-03-05, FDP-240, PB 360, WP-04-113, 24-4209-D, WP-04-135, SDP-04-163, F-05-058, FDP240-A, PB 373, F 06-36, F 06-102.
- THE CONTRACTOR SHALL TEST PIT EXISTING UTILITIES AT LEAST (5) DAYS BEFORE STARTING WORK SHOWN ON THESE DRAWINGS.
- CONTRACTOR IS SOLELY RESPONSIBLE FOR CONSTRUCTION MEANS, METHODS, TECHNIQUES, SEQUENCES, PROCEDURES, AND SAFETY PRECAUTIONS AND PROGRAMS.
- PIPE SHALL NOT BE INSTALLED BY THE CONTRACTOR UNTIL THE LENGTH CALLED FOR AT EACH STATION HAS BEEN APPROVED BY THE ENGINEER IN THE FIELD.
- NO PIPE SHALL BE LAID UNTIL LINES OF EXCAVATION HAVE BEEN BROUGHT WITHIN 6" OF FINISHED GRADE.
- ALL INLETS SHALL BE CONSTRUCTED IN ACCORDANCE WITH HOWARD COUNTY STANDARDS.
- ALL PIPE ELEVATIONS SHOWN ARE INVERT ELEVATIONS.
- STORM DRAIN TRENCHES WITHIN ROAD RIGHT OF WAY SHALL BE BACKFILLED AND COMPACTED IN ACCORDANCE WITH THE HOWARD COUNTY DESIGN MANUAL, VOLUME IV, I.E., STANDARD SPECIFICATIONS AND DETAILS FOR CONSTRUCTION, LATEST AMENDMENTS.
- PROFILE STATIONS SHALL BE ADJUSTED AS NECESSARY TO CONFORM TO PLAN DIMENSIONS.
- ALL FILL AREAS WITHIN ROADWAY AND UNDER STRUCTURES SHALL BE COMPACTED TO A MINIMUM OF 95% COMPACTION OF AASHTO T180.
- ALL STREET CURB RETURNS SHALL HAVE 25' RADII UNLESS OTHERWISE NOTED.
- STREAM BANK BUFFERS ARE DETERMINED BY LAND USE ADJOINING THE OPEN SPACE. EMPLOYMENT USE = 50' BUFFER FROM ANY STREAM. RESIDENTIAL USES= 50' BUFFER FOR INTERMITTENT STREAMS AND 75' BUFFER FOR PERENNIAL STREAMS.
- FLOODPLAIN STUDY WAS PREPARED BY DAFT McCUNE & WALKER, INC. DATED 2003.
- LANDSCAPING FOR THE EXISTING SWM FACILITIES WAS ADDRESSED UNDER SDP-04-163. ALL OTHER REQUIRED LANDSCAPING IN ACCORDANCE WITH SECTION 16.124 OF THE LANDSCAPE MANUAL IS ADDRESSED HEREIN. SURETY IN THE AMOUNT OF \$67,200.00 SHALL BE POSTED WITH THE DEVELOPER'S AGREEMENT FOR THIS SITE PLAN.
- NO GRADING, REMOVAL OF VEGETATIVE COVER OF TREES, PAVING AND NEW STRUCTURES SHALL BE PERMITTED WITHIN THE REQUIRED WETLANDS, STREAM(S) OR THEIR BUFFERS, FOREST CONSERVATION EASEMENT AREAS AND 100 YEAR FLOODPLAIN.
- OUTDOOR LIGHTING SHALL CONFORM TO SECTION 134 OF THE ZONING REGULATIONS. SEE SHEET NO. 15 FOR DETAILS.
- A KNOX BOX SHALL BE PLACED ON THE FRONT OF EACH BUILDING, TO THE RIGHT OF THE MAIN ENTRANCE, AT A RANGE OF 4-5 FEET IN HEIGHT AND NO MORE THAN 6 FEET LATERALLY FROM THE DOOR. THE BOX SHALL BE ELECTRONICALLY SUPERVISED TO NOTIFY THE OWNER THAT IT IS BEING ACCESSED (INTEGRATED WITH THE FIRE ALARM SYSTEM). NFPA-1 10.12.1
- SIGNAGE SHALL BE PROVIDED ON THE BUILDING IDENTIFYING THE BUILDING ADDRESS. SIGNAGE SHALL ALSO BE PROVIDED AT THE STREET IDENTIFYING THE BUILDING ADDRESS.
- RECIPROCAL VEHICULAR CROSS-EASEMENT AGREEMENT FOR ALL APPLICABLE PARCELS SHALL BE RECORDED IN THE LAND RECORDS OF HOWARD COUNTY, MD.
- THE PLANNING BOARD OF HOWARD COUNTY ON JUNE 8, 2006 APPROVED ALL IMPROVEMENTS AS SHOWN ON THIS SITE DEVELOPMENT PLAN AND A REDUCTION OF THE REQUIRED 10' PARKING SETBACK FROM A PROPERTY LINE TO 0'.



BUILDING ELEVATION
NO SCALE

APPROVED
PLANNING BOARD
OF HOWARD COUNTY
DATE 6-08-06



ONE STORY RETAIL BUILDING: 133,600 SF TOTAL

BUILDING #	STREET ADDRESS
RETAIL A	8221 GATEWAY OVERLOOK DRIVE
RETAIL B	8231 GATEWAY OVERLOOK DRIVE
RETAIL C	8241 GATEWAY OVERLOOK DRIVE
RETAIL D	8251 GATEWAY OVERLOOK DRIVE
RETAIL E	8261 GATEWAY OVERLOOK DRIVE
RETAIL F	8271 GATEWAY OVERLOOK DRIVE

SUBDIVISION NAME BENSON EAST		SECT.	PARCEL
PLAT NO. 17876	BLOCK # 20	ZONING NT	TAX MAP NO. 37 & 43
ELECT. DIST. 6		CENSUS TRACT 606703	
WATER CODE D06	SEWER CODE 3390000		

AREA TABULATION CHART

AREA OF PARCEL R	11.7585 ACRES (512,201 SF)
LIMIT OF DISTURBED AREA	12.07 ACRES
PRESENT ZONING	NT/EMPLOYMENT CENTER COMMERCIAL
PROPOSED USE	COMMERCIAL/RETAIL SALES
RETAIL A (STORE #1)	22,056 SF (TOTAL) 20,735 SF GROUND, 1,321 SF MEZZANINE
RETAIL B (STORE #2)	22,600 SF (TOTAL)
RETAIL C (STORE #3)	13,000 SF (TOTAL)
RETAIL D (STORE #4)	46,900 SF (TOTAL)
RETAIL E (STORE #5)	8,100 SF (TOTAL)
RETAIL F (STORE #6)	22,400 SF (TOTAL)
TOTAL NET LEASABLE RETAIL SPACE	133,050 SF
BUILDING COVERAGE	3.07 AC.(133,733 SF) (26.11% OF SITE)
REQUIRED PARKING	
RETAIL/NET LEASABLE	5 SPACES/1000 SF
TOTAL REQUIRED	669 SPACES
PROVIDED PARKING	716 SPACES (INCL. 27 HC SPACES)

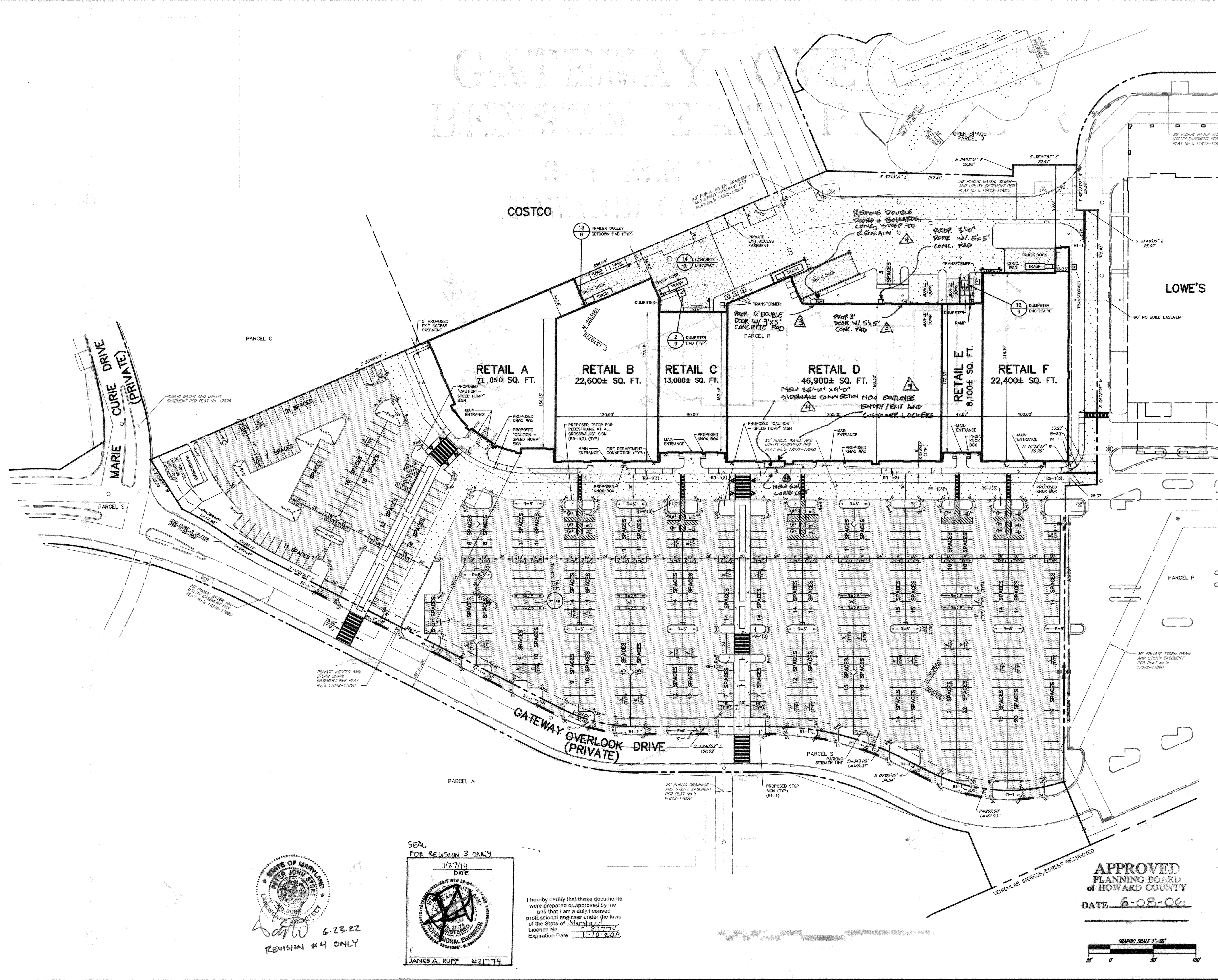
APPROVED : HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.
Derek A. Coughlin 6/8/06
 DIRECTOR DATE
Chris Hamilton 6/8/06
 CHIEF, DEVELOPMENT ENGINEERING DIVISION DATE
Chris Hamilton 6/8/06
 CHIEF, DIVISION OF LAND DEVELOPMENT DATE

8/22/07	1	REV. RETAIL "A" SF AND AREA TABULATION CHART
DATE	NO.	REVISION
OWNER / DEVELOPER HRD LAND HOLDINGS, INC. HOWARD RESEARCH AND DEVELOPMENT CORPORATION THE ROUSE BUILDING 10275 LITTLE PATUXENT PARKWAY COLUMBIA, MARYLAND 21044 410-992-6000		
PROJECT GATEWAY OVERLOOK BENSON EAST PARCEL R ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F		
AREA TAX MAP 37 & 43 ZONED - NEWTOWN BENSON EAST PARCEL R PLAT NO. 17876 6th ELECTION DISTRICT HOWARD COUNTY, MARYLAND		
TITLE TITLE SHEET.		

Patton Harris Rust & Associates, PC
 Engineers, Surveyors, Planners, Landscape Architects.
 PHRA
 1 Windsor, Suite 201A
 7535 Windsor Drive
 Allentown, PA 18195
 T 610.395.7033
 F 610.395.5811

DESIGNED BY : D.W.C.
 DRAWN BY: BCL
 PROJECT NO : 11621/1-2
 COOCCOV
 DATE : JUNE 9, 2006
 SCALE : AS SHOWN
 DRAWING NO. 1 OF 15

DATE 06/26/06
 DOMENICK W. COLANGELO #27200



LEGEND

- P-2 PAVING (LIGHT DUTY)
- P-5 PAVING (HEAVY DUTY)
- CONCRETE DRIVEWAY
- CONCRETE SIDEWALK
- PROPOSED INLET
- PROPOSED MANHOLE
- EXISTING MANHOLE
- EXISTING FIRE HYDRANT
- PROPOSED CLEAN OUT
- BOLLARD

NOTE: LOD OF 260 SF IS LESS THAN 5,000 SF, THEREFORE IT IS EXEMPT FROM PROVIDING STORMWATER MANAGEMENT. ANY FUTURE INCREASE IN LOD CUMULATIVELY TOTALING OVER 5,000 SF WILL REQUIRE THAT STORMWATER MANAGEMENT BE ADDRESSED.

6-23-22	4	REVISE DOORS & SIDEWALK
11/27/18	3	REVISE 2 DOORS AT BUILDING REAR
APPROVED: HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.		
<i>Benjamin K. Cagle</i>		8/21/06 DATE
DIRECTOR		
<i>[Signature]</i>		8/30/06 DATE
CHIEF, DEVELOPMENT ENGINEERING DIVISION		
<i>Cynthia Kinnest</i>		8/1/06 DATE
CHIEF, DIVISION OF LAND DEVELOPMENT		
6/15/16	2	ADDED 2 DOORS AT BUILDING REAR
8/22/07	1	REVISED RETAIL 'A' SF
DATE NO.		REVISION

OWNER / DEVELOPER
 HRD LAND HOLDINGS, INC.
 HOWARD RESEARCH AND DEVELOPMENT CORPORATION
 THE ROUSE BUILDING
 10275 LITTLE PATUXENT PARKWAY
 COLUMBIA, MARYLAND 21044
 410-992-6000

PROJECT GATEWAY OVERLOOK
 BENSON EAST PARCEL R
 ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F
AREA TAX MAP 37 & 43 ZONED - NEWTOWN
 BENSON EAST PARCEL R PLAT NO. 17876
 6th ELECTION DISTRICT
 HOWARD COUNTY, MARYLAND

TITLE SITE DEVELOPMENT PLAN

Patton Harris Rust & Associates, pc
 Engineers, Surveyors, Planners, Landscape Architects.
 P.H.R.A.
 1 Windsor, Suite 201A
 7535 Windsor Drive
 Allentown, PA 18195
 T 610.395.7033
 F 610.395.5811

<i>[Signature]</i>	DATE
	DATE
DESIGNED BY: D.W.C.	
DRAWN BY: EMR	
PROJECT NO: 11621/1-2 C400SIT	
DATE: JUNE 9, 2006	
SCALE: 1"=50'	
DRAWING NO. 2 OF 15	

APPROVED
 PLANNING BOARD
 OF HOWARD COUNTY
 DATE 6-08-06

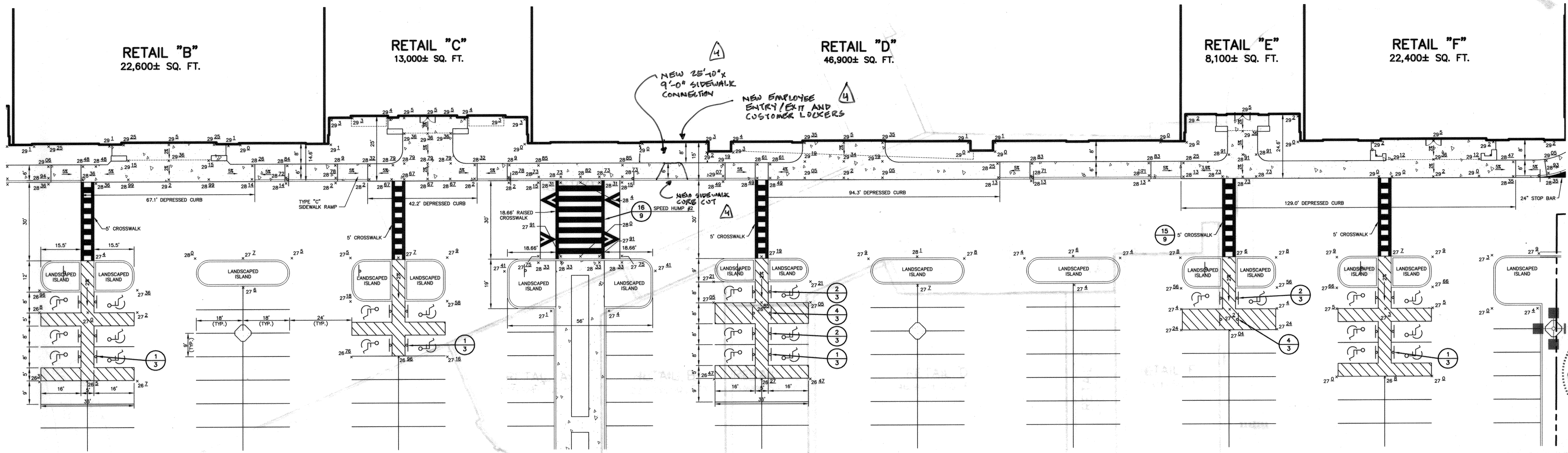
GRAPHIC SCALE 1"=50'
 0' 50' 100'

STATE OF MARYLAND
 LANDSCAPE ARCHITECT
 6-23-22
 REVISION #4 ONLY

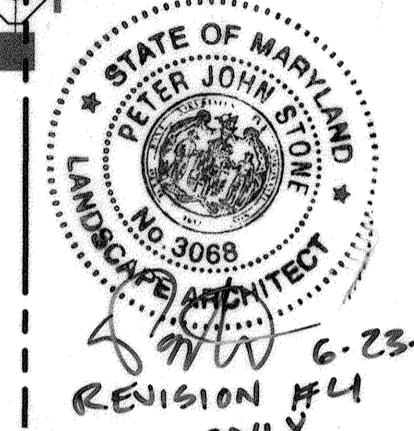
SEAL FOR REVISION 3 ONLY
 11/27/18 DATE

 JAMES A. RUFF #21774

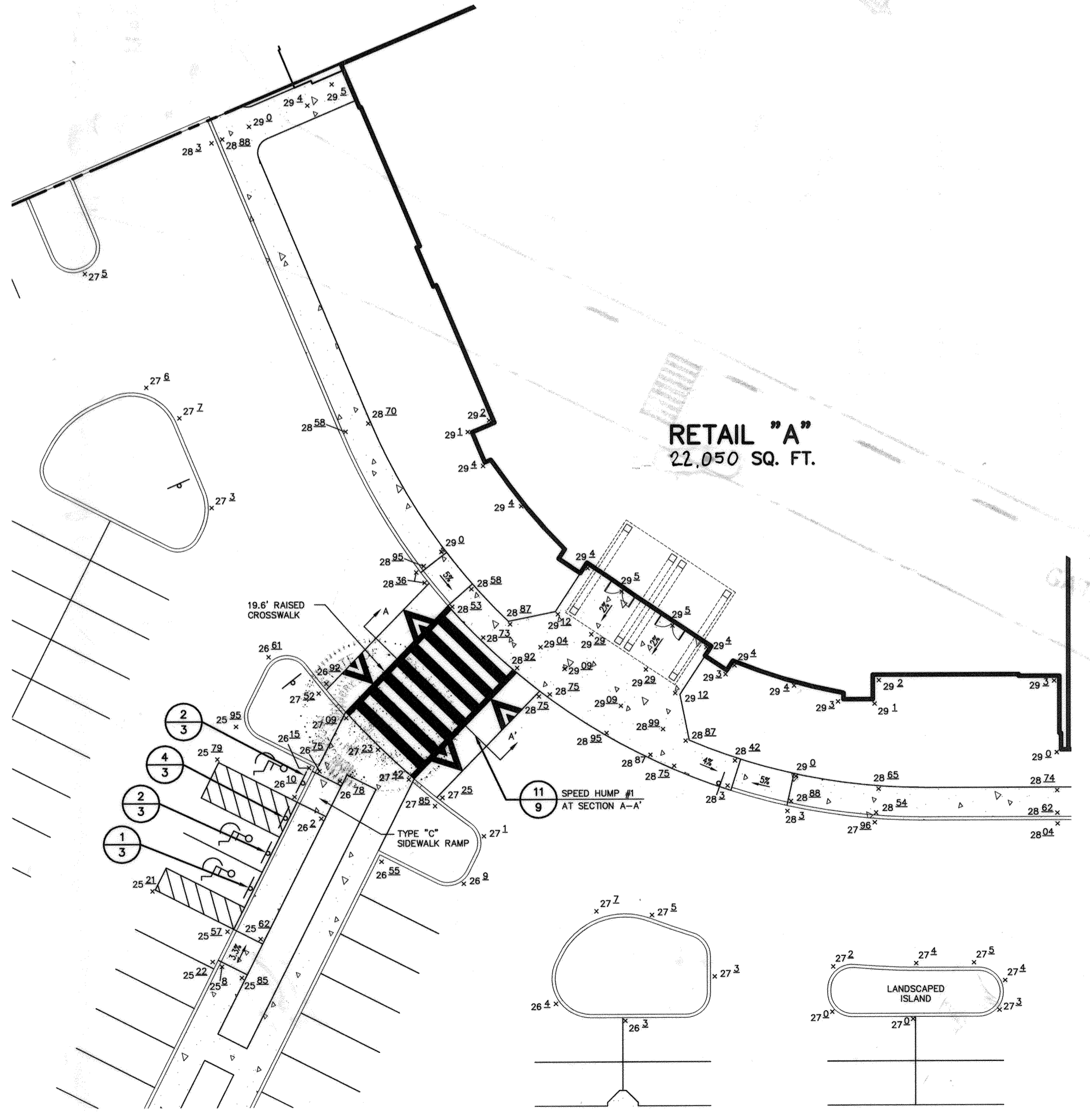
I hereby certify that these documents were prepared or approved by me, and that I am a duly licensed professional engineer under the laws of the State of Maryland.
 License No. 21774
 Expiration Date: 11-10-2019



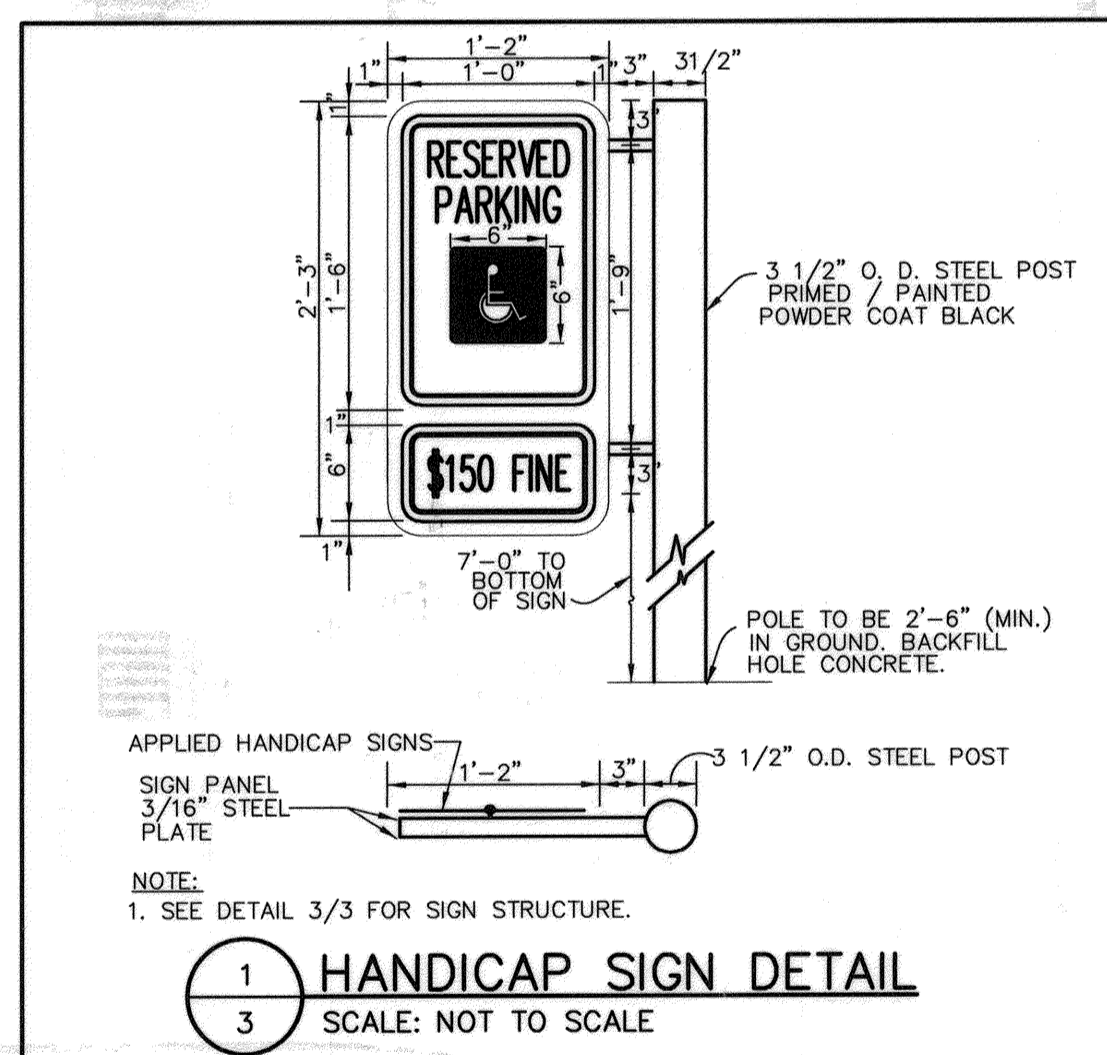
PLAN
SCALE: 1"=20'



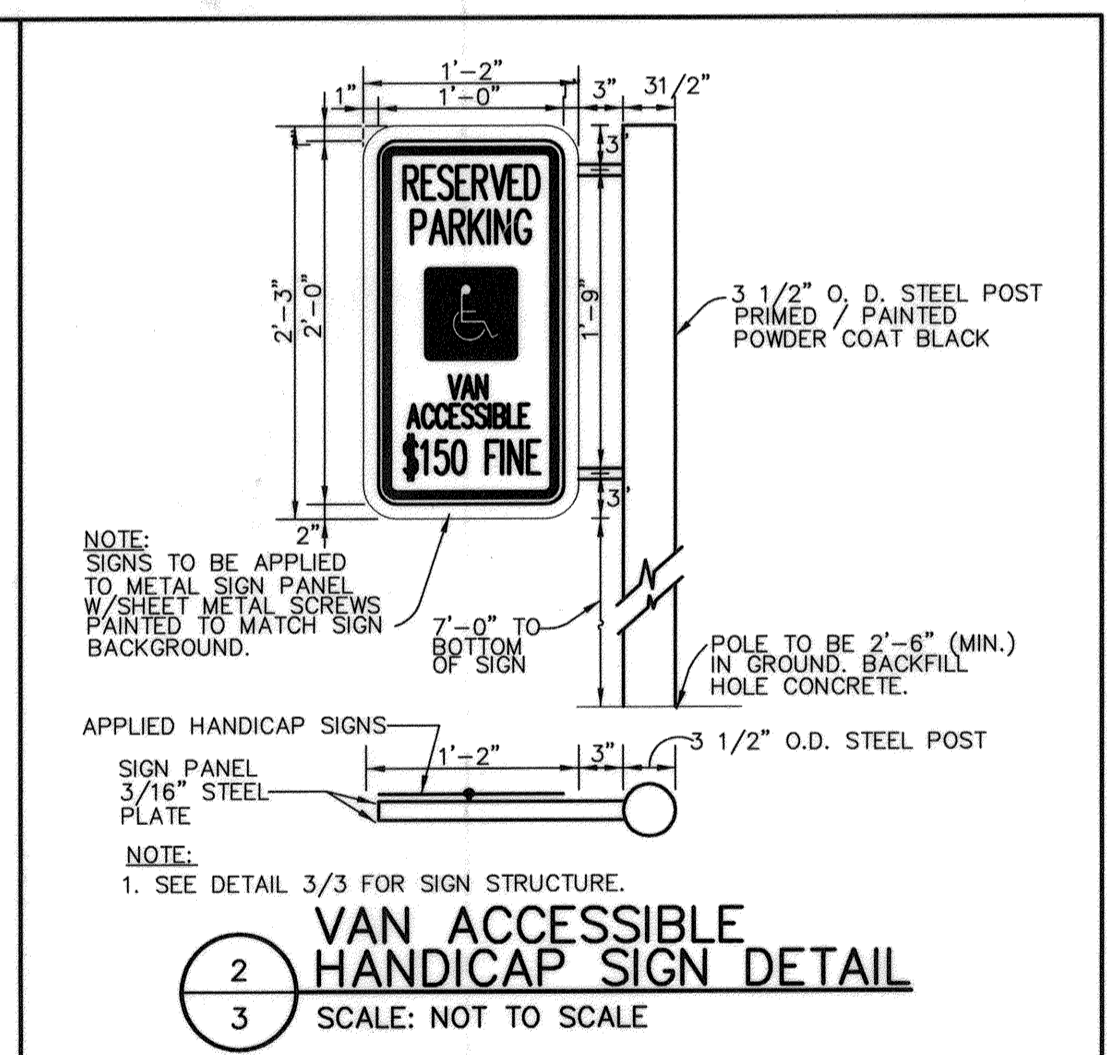
APPROVED
PLANNING BOARD
of HOWARD COUNTY
DATE 6-08-06



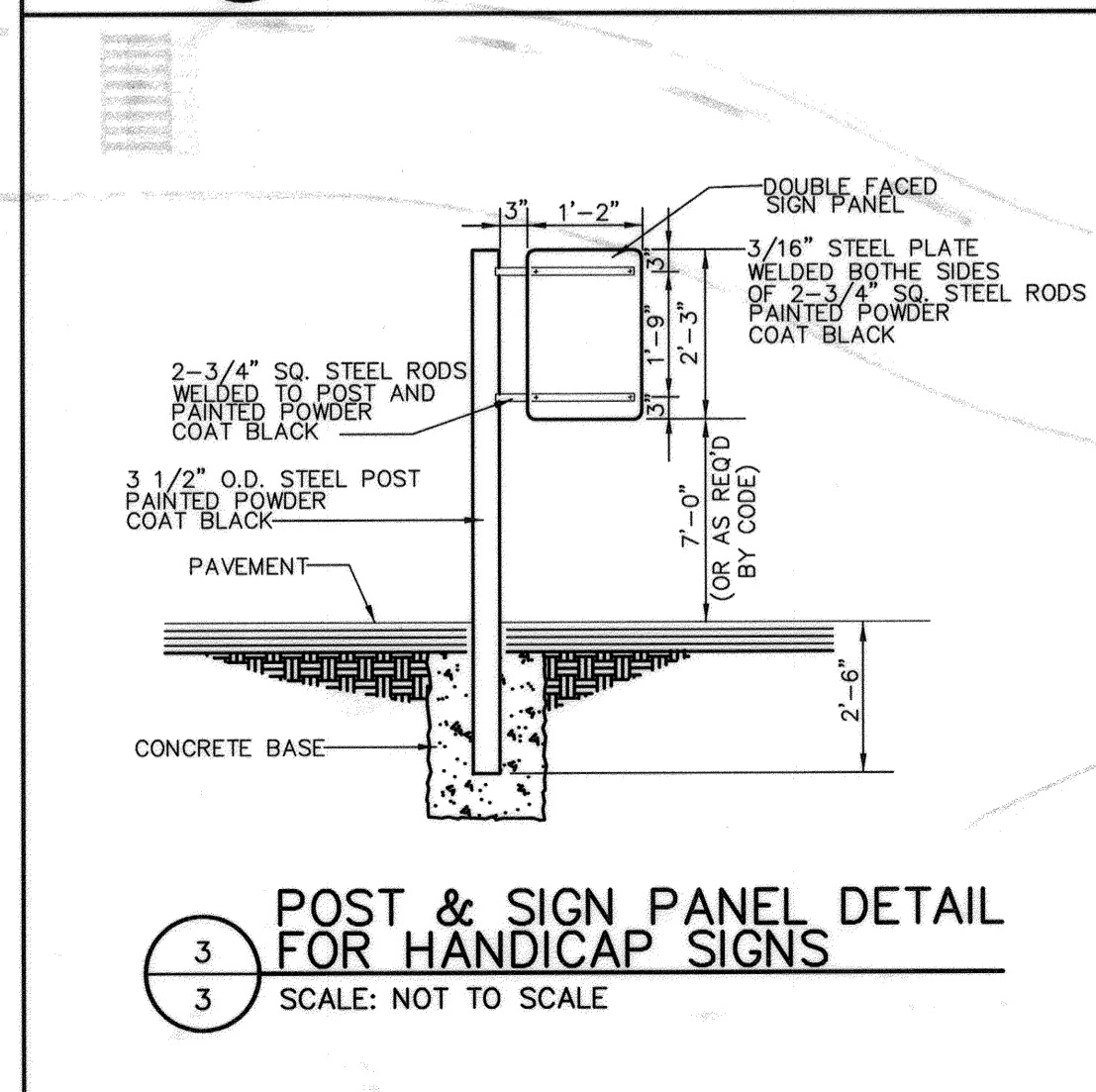
RETAIL "A"
22,050 SQ. FT.



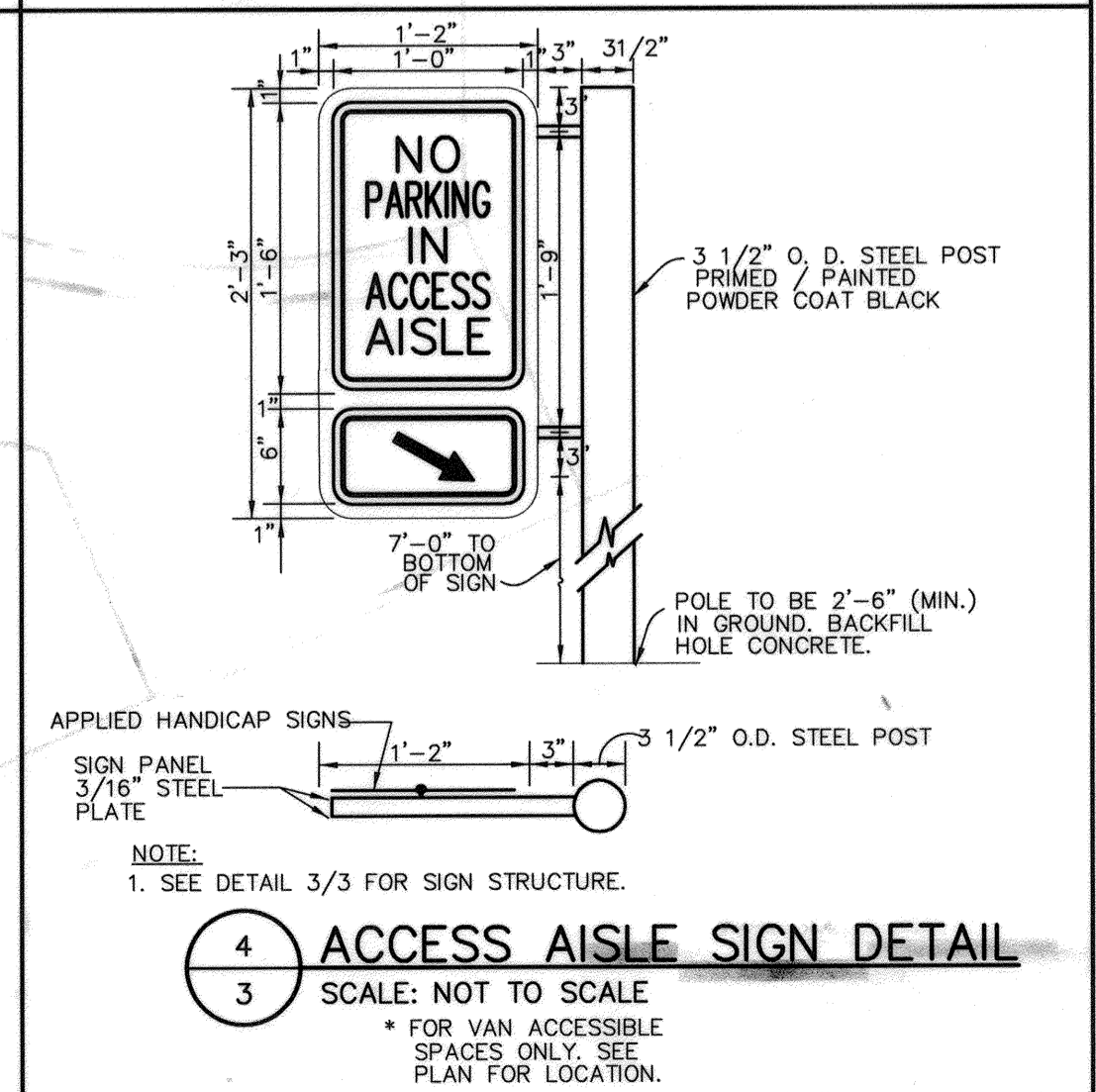
1 HANDICAP SIGN DETAIL
SCALE: NOT TO SCALE



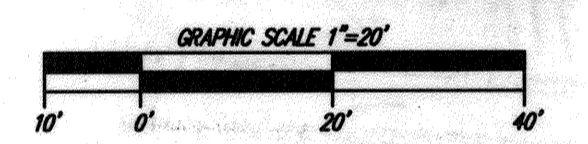
2 VAN ACCESSIBLE
HANDICAP SIGN DETAIL
SCALE: NOT TO SCALE



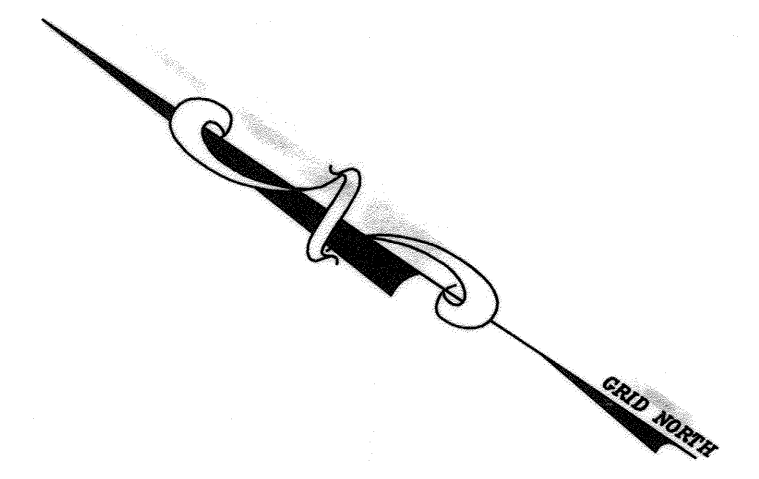
3 POST & SIGN PANEL DETAIL
FOR HANDICAP SIGNS
SCALE: NOT TO SCALE



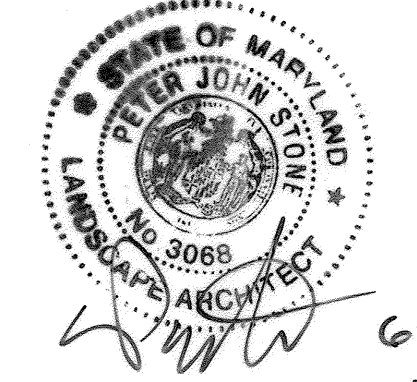
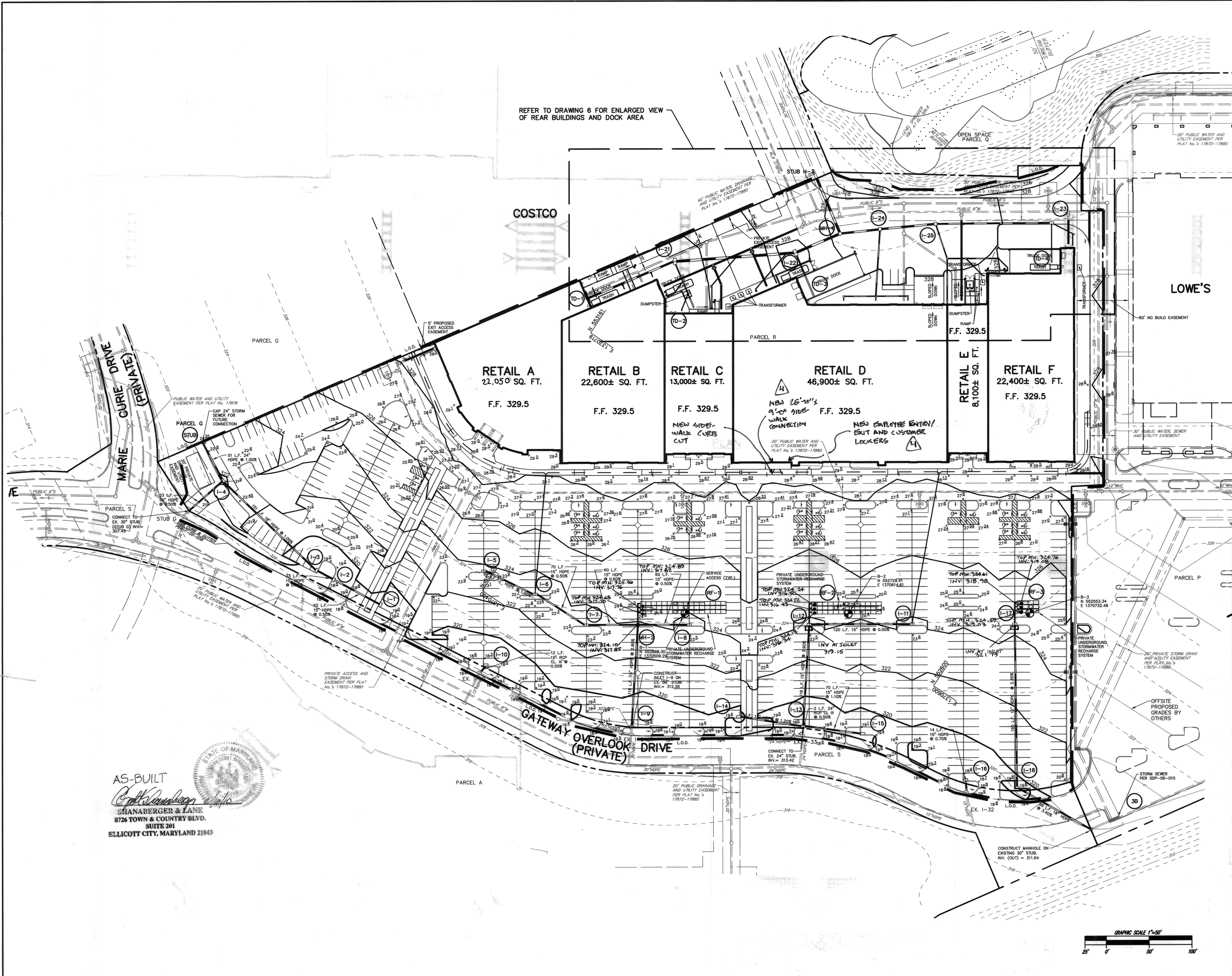
4 ACCESS AISLE SIGN DETAIL
SCALE: NOT TO SCALE



APPROVED: HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.	
DIRECTOR	DATE
CHIEF, DEVELOPMENT ENGINEERING DIVISION	DATE
CHIEF, DIVISION OF LAND DEVELOPMENT	DATE
6-23-06 SIDEWALK & DOOR REVISIONS	
DATE	REVISION
OWNER / DEVELOPER	
HRD LAND HOLDINGS, INC. HOWARD RESEARCH AND DEVELOPMENT CORPORATION THE ROUSE BUILDING 10275 LITTLE PATUXENT PARKWAY COLUMBIA, MARYLAND 21044 410-992-6000	
PROJECT	GATEWAY OVERLOOK
AREA	BENSON EAST PARCEL R ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F TAX MAP 37 & 43 ZONED - NEWTOWN BENSON EAST PARCEL R PLAT NO. 17876 6TH ELECTION DISTRICT HOWARD COUNTY, MARYLAND
TITLE	HANDICAP ACCESSIBILITY PLAN AND DETAILS
Patton Harris Rust & Associates, pc Engineers, Surveyors, Planners, Landscape Architects. PHRA 1 Windsor, Suite 201A 7335 Windsor Drive Allentown, PA 18195 T 610.395.7033 F 610.395.5811	
DATE	DESIGNED BY: D.W.C.
DATE	DRAWN BY: EMR
DATE	PROJECT NO: 11621/1-2 C401SIT
DATE	DATE: JUNE 9, 2006
DATE	SCALE: 1"=20'
DATE	DRAWING NO. 3 OF 15



REFER TO DRAWING 6 FOR ENLARGED VIEW OF REAR BUILDINGS AND DOCK AREA



- LEGEND**
- 320 --- EXISTING 10' CONTOURS
 - 322 --- EXISTING 2' CONTOURS
 - 320 --- PROPOSED 10' CONTOURS
 - 322 --- PROPOSED 2' CONTOURS
 - PROPOSED CURB & GUTTER
 - PROPOSED STORM DRAIN
 - PROPOSED SPOT ELEVATION
 - L.O.D. --- LIMIT OF DISTURBANCE

APPROVED
PLANNING BOARD
of HOWARD COUNTY
DATE 6-08-06

APPROVED : HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.

Domenick W. Colangelo 6/21/06
DIRECTOR DATE

Chris Smith 8/21/06
CHIEF, DEVELOPMENT ENGINEERING DIVISION DATE

Chris Smith 8/21/06
CHIEF, DIVISION OF LAND DEVELOPMENT DATE

6-23-22 4 SIDEWALK + DOOR REVISIONS

8/22/07 1 REV. RETAIL 'A' SF

DATE NO.	REVISION

OWNER / DEVELOPER
HRD LAND HOLDINGS, INC.
HOWARD RESEARCH AND DEVELOPMENT CORPORATION
THE ROUSE BUILDING
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044
410-992-6000

PROJECT **GATEWAY OVERLOOK**
BENSON EAST PARCEL R
ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F

AREA TAX MAP 37 & 43 ZONED - NEWTOWN
BENSON EAST PARCEL R PLAT NO. 17876
6th ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

TITLE **GRADING AND DRAINAGE PLAN**

Patton Harris Rust & Associates, pc
Engineers, Surveyors, Planners, Landscape Architects.
1 Windward, Suite 201A
7335 Windward Drive
Allentown, PA 18195
T 610.395.7033
F 610.395.5811

DATE 06/26/06

DESIGNED BY : D.W.C.

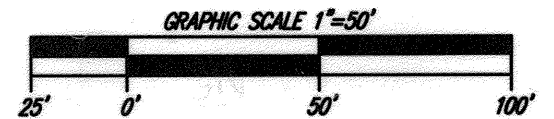
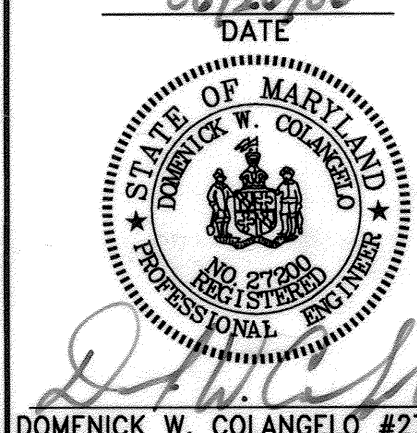
DRAWN BY: EMR

PROJECT NO : 11621/1-2
C700SDP

DATE : JUNE 9, 2006

SCALE : 1"=50'

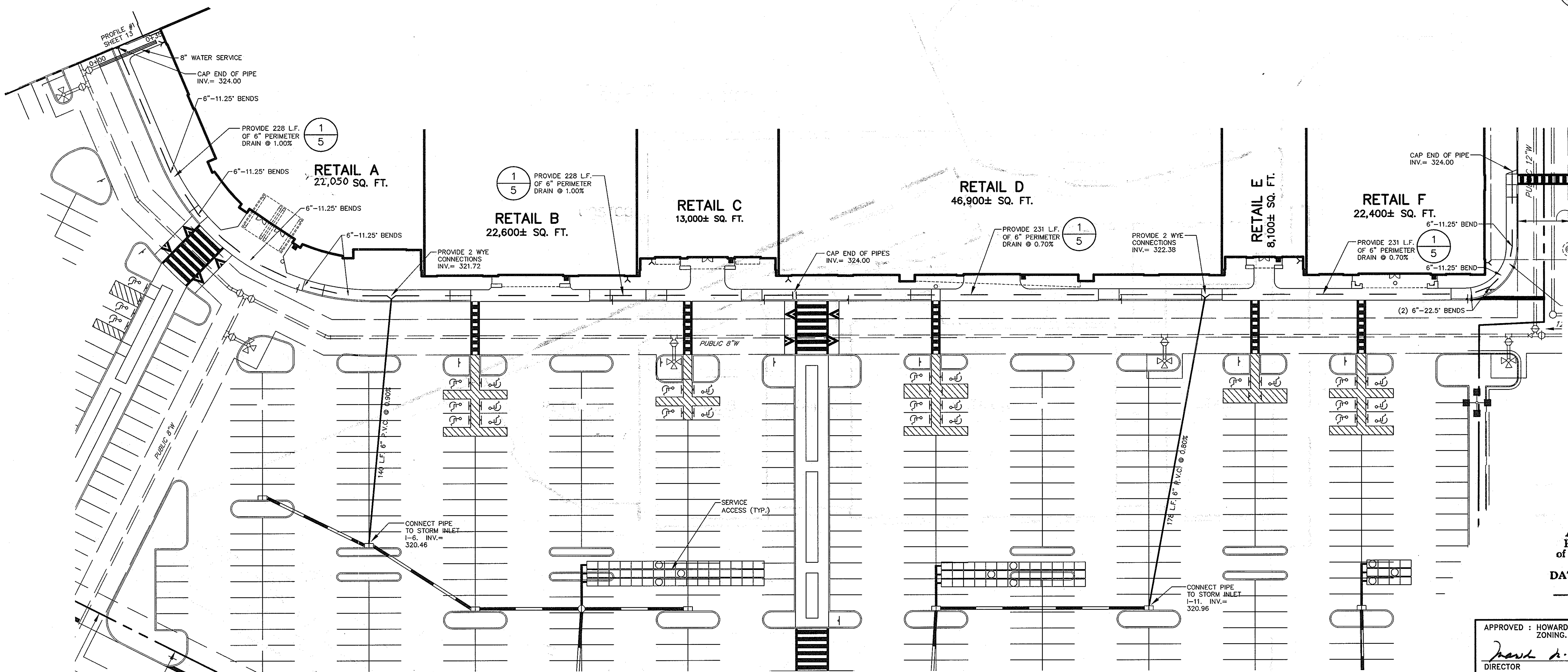
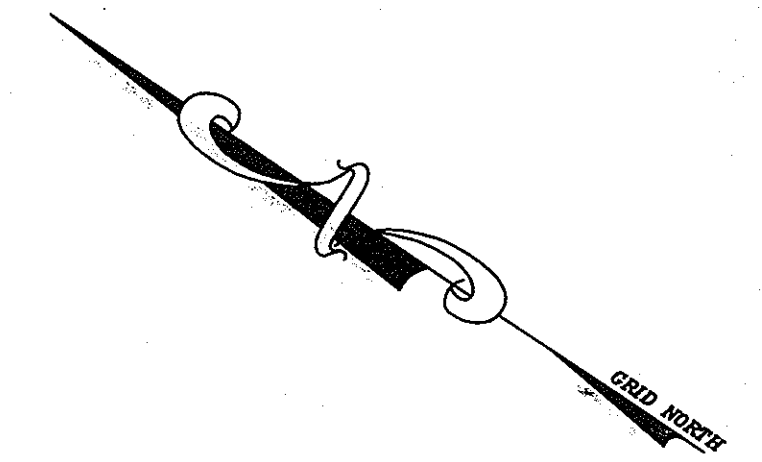
DRAWING NO. 4 OF 15



AS-BUILT
Chris Smith
SHANBERGER & LANE
3726 TOWN & COUNTRY BLVD.
SUITE 201
ELLCOTT CITY, MARYLAND 21045



P:\Project\11621-1\Engineering\CT00SDP.dwg, 6/28/2006 11:15:03 AM



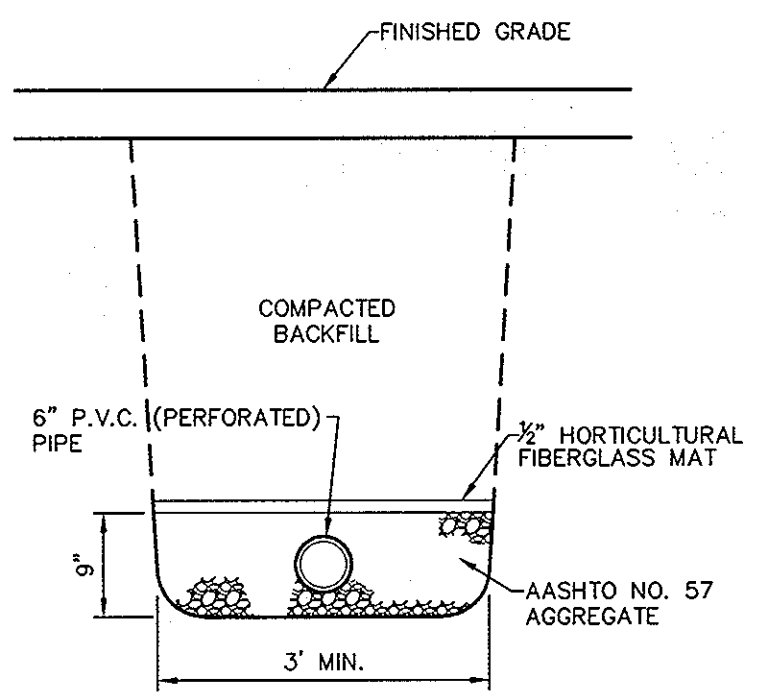
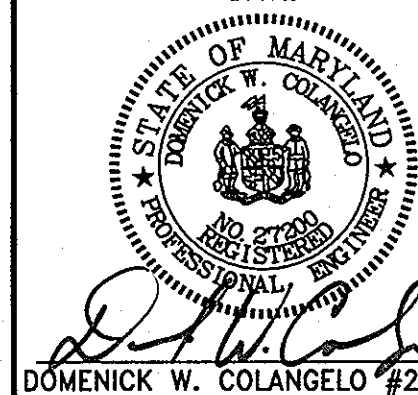
APPROVED
PLANNING BOARD
of HOWARD COUNTY
 DATE 6-08-06

APPROVED : HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.
Mark A. Wright 8/3/16
 DIRECTOR DATE
Robo
 CHIEF, DEVELOPMENT ENGINEERING DIVISION 9/0 DATE
Cathy Hunter 8/3/16
 CHIEF, DIVISION OF LAND DEVELOPMENT 8/3 DATE

8/22/07	1	REV. RETAIL 1/2 SF
DATE	NO.	REVISION
OWNER / DEVELOPER HRD LAND HOLDINGS, INC. HOWARD RESEARCH AND DEVELOPMENT CORPORATION THE ROUSE BUILDING 10275 LITTLE PATUXENT PARKWAY COLUMBIA, MARYLAND 21044 410-992-6000		
PROJECT GATEWAY OVERLOOK BENSON EAST PARCEL R ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F		
AREA TAX MAP 37 & 43 ZONED - NEWTOWN BENSON EAST PARCEL R PLAT NO. 17876 6th ELECTION DISTRICT HOWARD COUNTY, MARYLAND		
TITLE SIDEWALK UNDERDRAIN PLAN		

Patton Harris Rust & Associates, pc
 Engineers. Surveyors. Planners. Landscape Architects.
PHRA
 1 Windsor, Suite 201A
 7335 Windsor Drive
 Allentown, PA 18195
 T 610.395.7033
 F 610.395.5811

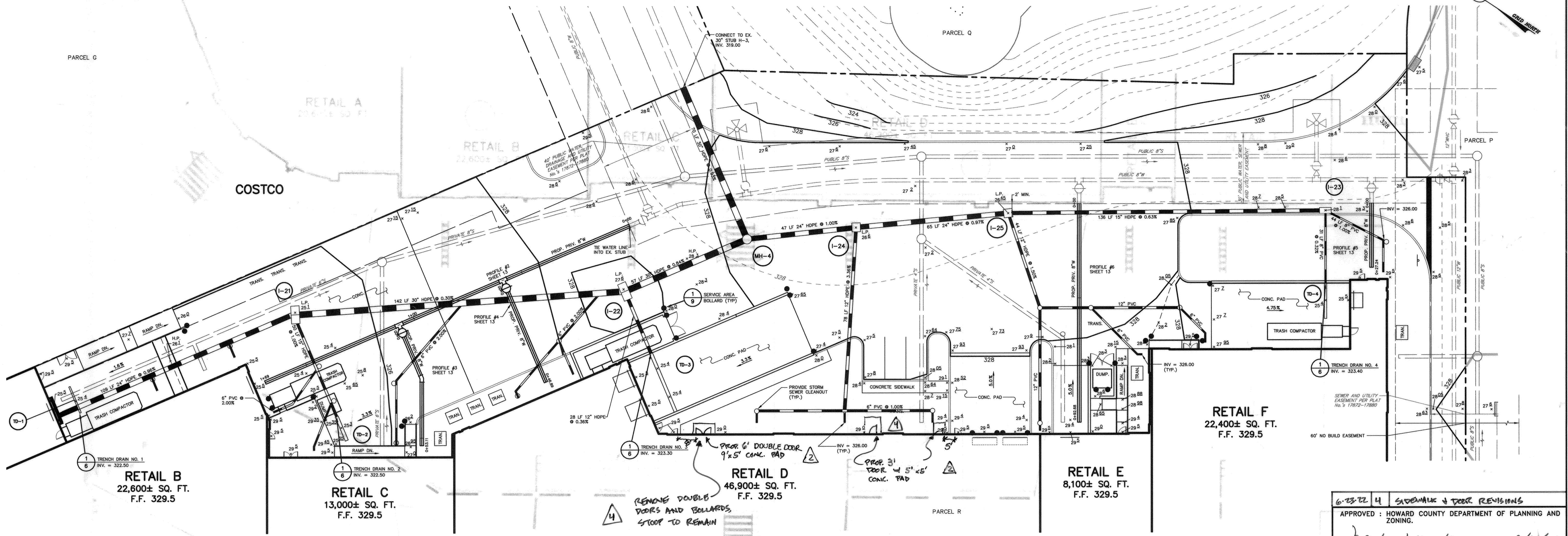
06/24/06
 DATE
 DESIGNED BY : D.W.C.
 DRAWN BY: EMR
 PROJECT NO : 11621/1-2
 C700STM
 DATE : JUNE 9, 2006
 SCALE : 1"=30'
 DRAWING NO. 5 OF 15



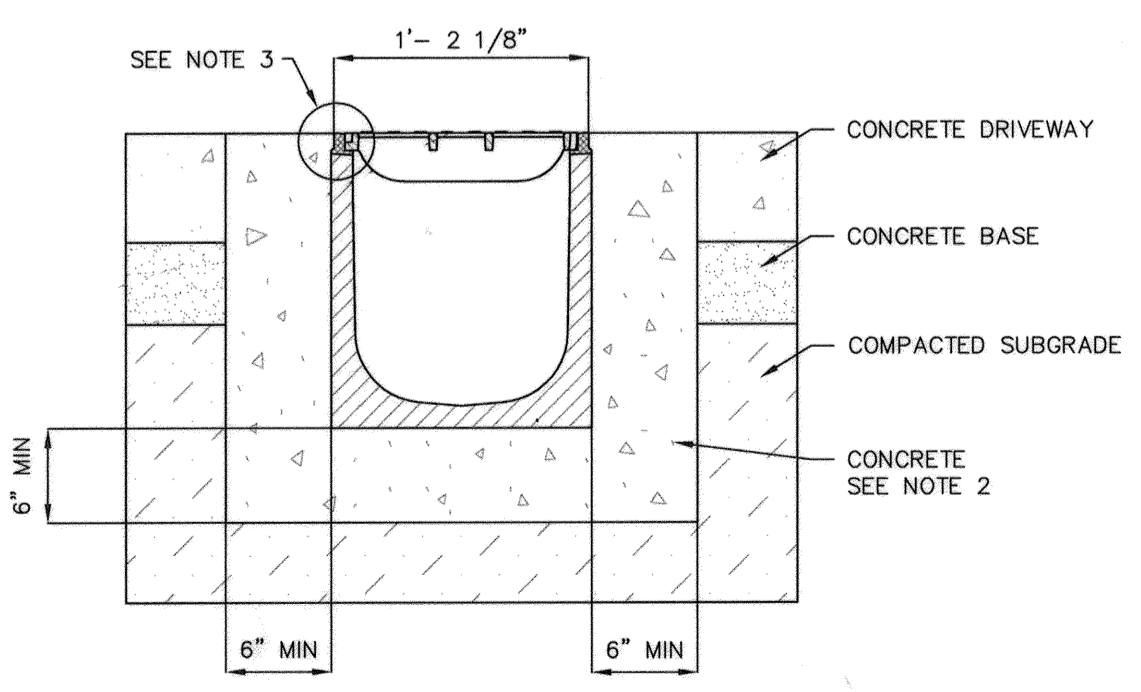
NOTE:
 CONTRACTOR TO COORDINATE HORIZONTAL AND VERTICAL LOCATIONS OF UTILITIES AT THE BUILDING WITH BUILDING PLUMBER.

1 PERIMETER DRAIN DETAIL
5 SCALE: NOT TO SCALE

P:\Project\11621-1-2\p\parrisc\700STM.dwg, 6/26/2006 11:31:24 AM

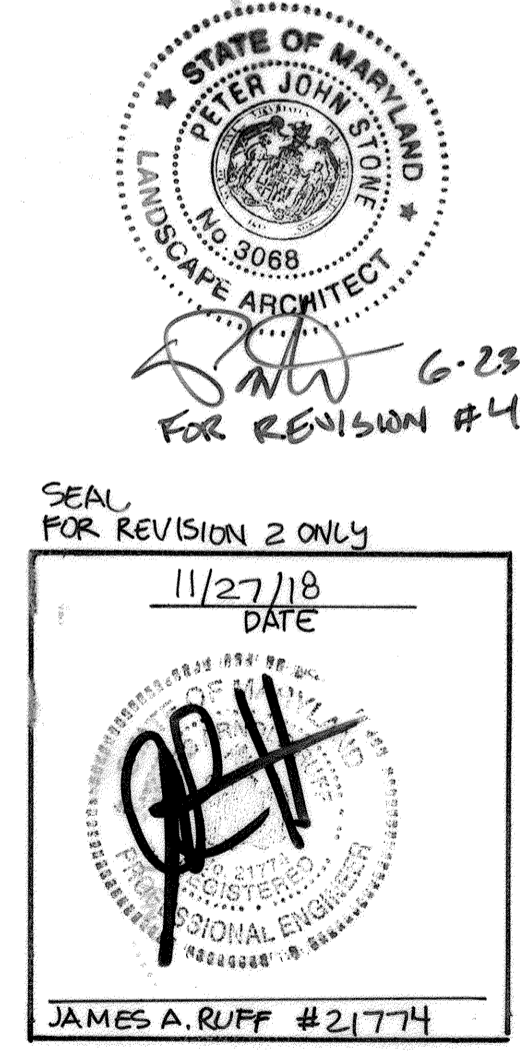


- NOTES:
1. THE SURFACE DRAINAGE SYSTEM SHALL BE POLYMER CONCRETE S300K CHANNEL SYSTEM WITH DUCTILE IRON RAIL AND GRATE AS MANUFACTURED BY ACO POLYMER PRODUCTS, INC., CHARDON, OH., OR APPROVED EQUAL.
 2. MINIMUM CONCRETE STRENGTH SHALL BE 3500 PSI. THE CONCRETE SHALL BE VIBRATED TO ELIMINATE AIR POCKETS.
 3. THE FINISHED LEVEL OF THE CONCRETE SURROUND SHALL BE APPROX. 1/8" ABOVE THE TOP OF THE CHANNEL EDGE.
 4. REFER TO MANUFACTURER'S LATEST INSTALLATION INSTRUCTIONS FOR COMPLETE DETAILS.
 5. CHANNELS SHALL BE MANUFACTURED FROM POLYESTER RESIN POLYMER CONCRETE WITH AN INTEGRALLY CAST IN DUCTILE IRON RAIL AND SUPPLIED WITH DUCTILE IRON GRATES.
 6. THE SYSTEM SHALL BE 12 INCHES NOMINAL INSIDE WIDTH WITH A 14.1 IN. OVERALL WIDTH AND A BUILT-IN SLOPE OF 0.6%. ALL CHANNELS SHALL BE INTERLOCKING WITH A MALE/FEMALE JOIN. EACH CHANNEL SHALL HAVE PREFORMED 6 IN. AND 8 IN. SCHEDULE 40 DRILL-OUT ON THE BOTTOM FOR VERTICAL CONNECTION WITH UNDERGROUND PIPING.
 7. GRATES SHALL BE SECURED USING "POWERLOK" BOLTLESS LOCKING SYSTEM. GRATE AND LOCKING SYSTEM SHALL BE FULLY REMOVABLE FROM CHANNEL.
 8. POLYMER CONCRETE SHALL HAVE MATERIAL PROPERTIES OF: COMPRESSIVE STRENGTH RANGE BETWEEN 14,000-14,500 PSI; FLEXURAL STRENGTH BETWEEN 3600-4500 PSI; TENSILE STRENGTH OF 1500 PSI. THE MATERIAL WATER ABSORPTION RATE SHALL NOT EXCEED 0.1% BY WEIGHT AND SHALL BE RESISTANT TO PROLONGED SALT EXPOSURE, REPETITIVE FROST CYCLES AND CHEMICALLY RESISTANT TO DILUTE ACIDS AND ALKALIS.
 9. THE SYSTEM SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURER'S INSTRUCTIONS AND RECOMMENDATIONS.

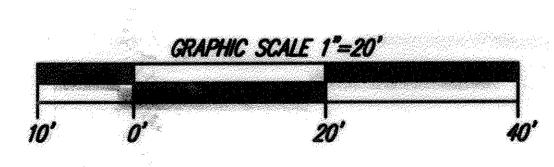


1 TRENCH DRAIN DETAIL
6 SCALE: NOT TO SCALE

I hereby certify that these documents were prepared or approved by me, and that I am a duly licensed professional engineer under the laws of the State of Maryland License No. 21774 Expiration Date: 11-10-2019



APPROVED
PLANNING BOARD
OF HOWARD COUNTY
DATE 6-08-06



6-23-06 4 SIDEWALK & DOOR REVISIONS	
APPROVED: HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.	
<i>Richard A. ...</i>	8/24/06 DATE
DIRECTOR	
<i>Cindy ...</i>	8/3/06 DATE
CHIEF, DIVISION OF LAND DEVELOPMENT	
11/27/08 2 REVISE 2 DOORS AT BUILDING REAR	
6/19/10 1 ADDED 2 DOORS AT BUILDING REAR	
DATE NO.	REVISION
OWNER / DEVELOPER	
HRD LAND HOLDINGS, INC. HOWARD RESEARCH AND DEVELOPMENT CORPORATION THE ROUSE BUILDING 10275 LITTLE PATUXENT PARKWAY COLUMBIA, MARYLAND 21044 410-992-6000	
PROJECT GATEWAY OVERLOOK	
BENSON EAST PARCEL R ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F	
AREA TAX MAP 37 & 43 ZONED - NEWTOWN BENSON EAST PARCEL R PLAT NO. 17876 6th ELECTION DISTRICT HOWARD COUNTY, MARYLAND	
TITLE	
LOADING DOCK GRADING AND UTILITIES	
Patton Harris Rust & Associates, pc Engineers, Surveyors, Planners, Landscape Architects. 1 Windsor, Suite 201A Allentown, PA 18195 T 610.395.7033 F 610.395.5811	
PHRA	
DATE 06/24/06	DESIGNED BY: D.W.C.
DRAWN BY: EMR	
PROJECT NO: 11621/1-2 C801UTL	
DATE: JUNE 9, 2006	
SCALE: 1"=20'	
DRAWING NO. 6 OF 15	
DOMENICK W. COLANGELO #27200	

21.0 STANDARD 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 VEGETATIVE 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
I. THIS PRACTICE IS LIMITED TO AREAS HAVING 2:1 OR FLATTER SLOPES WHERE:
--a. THE TEXTURE OF THE EXPOSED SUBSOIL/PARENT MATERIAL IS NOT ADEQUATE TO PRODUCE VEGETATIVE GROWTH.
--b. 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.
--c. THE ORIGINAL SOIL TO BE VEGETATED CONTAINS MATERIAL TOXIC TO PLANT GROWTH.
--d. THE SOIL IS SO ACIDIC THAT TREATMENT WITH LIMESTONE IS NOT FEASIBLE.

II. 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
I. 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 EXPERIMENTATION STATION.

II. TOPSOIL SPECIFICATIONS -- SOIL TO BE USED AS TOPSOIL MUST MEET THE FOLLOWING:
--I. 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 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 1-1/2" IN DIAMETER.
--II. TOPSOIL MUST BE FREE OF PLANTS OR PLANT PARTS SUCH AS BERMUDA GRASS, QUACKGRASS, JOHNSONGRASS, NUTSEDGE, POISON IVY, THISTLE, OR OTHERS AS SPECIFIED.
--III. WHERE 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.

III. FOR SITES HAVING DISTURBED AREAS UNDER 5 ACRES:
--I. PLACE TOPSOIL (IF REQUIRED) AND APPLY SOIL AMENDMENTS AS SPECIFIED IN 20.0 VEGETATIVE STABILIZATION -- SECTION I -- VEGETATIVE STABILIZATION METHODS AND MATERIALS.

III. FOR SITES HAVING DISTURBED AREAS OVER 5 ACRES:
--I. ON SOIL MEETING TOPSOIL SPECIFICATIONS, OBTAIN TEST RESULTS DICTATING 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 SOLUBLE SALT CONTENT GREATER THAN 500 PARTS PER MILLION SHALL NOT BE USED.
--d. 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 PHYTO-TOXIC MATERIALS.

NOTE: TOPSOIL SUBSTITUTES TO 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.

--II. PLACE TOPSOIL (IF REQUIRED) AND APPLY SOIL AMENDMENTS AS SPECIFIED IN 20.0 VEGETATIVE STABILIZATION -- SECTION I -- VEGETATIVE STABILIZATION METHODS AND MATERIALS.

V. TOPSOIL APPLICATION
--I. 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.
--II. GRADES ON THE AREAS TO BE TOPSOILED, WHICH HAVE BEEN PREVIOUSLY ESTABLISHED, SHALL BE MAINTAINED, ALBEIT 4" - 8" HIGHER IN ELEVATION.
--III. 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.
--IV. 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.

VI. ALTERNATIVE FOR PERMANENT SEEDING -- INSTEAD OF APPLYING THE FULL AMOUNTS OF LIME AND COMMERCIAL FERTILIZER, COMPOSTED SLUDGE AND AMENDMENTS MAY BE APPLIED AS SPECIFIED BELOW:
--I. COMPOSTED SLUDGE MATERIAL FOR USE AS A SOIL CONDITIONER FOR SITES HAVING DISTURBED AREAS OVER 5 ACRES SHALL BE TESTED TO PRESCRIBE AMENDMENTS AND FOR SITES HAVING DISTURBED AREAS UNDER 5 ACRES SHALL CONFORM TO THE FOLLOWING REQUIREMENTS:
--a. COMPOSTED SLUDGE SHALL BE SUPPLIED BY, OR ORIGINATE FROM, A PERSON OR PERSONS THAT ARE PERMITTED (AT THE TIME OF ACQUISITION OF THE COMPOST) BY THE MARYLAND DEPARTMENT OF THE ENVIRONMENT UNDER COMAR 26.04.06.
--b. COMPOSTED SLUDGE SHALL CONTAIN AT LEAST 1 PERCENT NITROGEN, 1.5 PERCENT PHOSPHORUS, AND 0.2 PERCENT POTASSIUM AND HAVE A PH OF 7.0 TO 8.0. IF COMPOST DOES NOT MEET THESE REQUIREMENTS, THE APPROPRIATE CONSTITUENTS MUST BE ADDED TO MEET THE REQUIREMENTS PRIOR TO USE.
--c. COMPOSTED SLUDGE SHALL BE APPLIED AT A RATE OF 1 TON/1,000 SQUARE FEET.
--d. COMPOSTED SLUDGE SHALL BE AMENDED WITH A POTASSIUM FERTILIZER APPLIED AT THE RATE OF 4 LB/1,000 SQUARE FEET, AND 1/3 THE NORMAL LIME APPLICATION RATE. REFERENCES: GUIDELINE SPECIFICATIONS, SOIL PREPARATION AND SODDING, MD-VI, PUB. #1, COOPERATIVE EXTENSION SERVICE, UNIVERSITY OF MARYLAND AND VIRGINIA POLYTECHNIC INSTITUTES, REVISED 1973.

STANDARD SEDIMENT CONTROL NOTES

1. 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).
2. 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 SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL AND REVISIONS THERETO.
3. FOLLOWING INITIAL SOIL DISTURBANCE OR RE-DISTURBANCE, PERMANENT OR TEMPORARY STABILIZATION SHALL BE COMPLETED WITHIN 7 CALENDAR DAYS FOR ALL PERIMETER SEDIMENT CONTROL STRUCTURES, DIKES, PERIMETER SLOPES, AND ALL SLOPES STEEPER THAN 3:1. (B) 14 DAYS AS TO ALL OTHER DISTURBED OR GRADED AREAS ON THE PROJECT SITE.
4. ALL SEDIMENT TRAPS/BASINS SHOWN MUST BE FENCED AND WARNING SIGNS POSTED AROUND THE PERIMETER IN ACCORDANCE WITH VOL. 1, CHAPTER 7, OF THE HOWARD COUNTY DESIGN MANUAL, STORM DRAINAGE.
5. ALL DISTURBED AREAS MUST BE STABILIZED WITHIN THE TIME PERIOD SPECIFIED ABOVE IN ACCORDANCE WITH THE 1994 MARYLAND STANDARDS AND SPECIFICATIONS FOR SOIL EROSION AND SEDIMENT CONTROL FOR PERMANENT SEEDING, SOD, TEMPORARY SEEDING, AND MULCHING (SEC. 6). TEMPORARY STABILIZATION WITH MULCH ALONE SHALL ONLY BE DONE WHEN RECOMMENDED SEEDING DATES DO NOT ALLOW FOR PROPER GERMINATION AND ESTABLISHED OF GRASSES.
6. ALL SEDIMENT CONTROL STRUCTURES ARE TO REMAIN IN PLACE AND ARE TO BE MAINTAINED IN OPERATIVE CONDITION UNTIL PERMISSION FOR THEIR REMOVAL HAS BEEN OBTAINED FROM THE HOWARD COUNTY SEDIMENT CONTROL INSPECTOR.
7. SITE ANALYSIS:
TOTAL AREA OF SITE 11.78 ACRES
AREA DISTURBED 12.07 ACRES
AREA TO BE ROOFED OR PAVED 10.3 ACRES
AREA TO BE VEGETATIVELY STABILIZED 1.48 ACRES
TOTAL CUT 800 CU. YARDS
TOTAL FILL 500 CU. YARDS
OFFSITE WASTE AREA LOCATION TO HAVE ACTIVE GRADING PERMIT
8. ANY SEDIMENT CONTROL PRACTICE WHICH IS DISTURBED BY GRADING ACTIVITY FOR PLACEMENT OF UTILITIES MUST BE REPAIRED ON THE SAME DAY OF DISTURBANCE.
9. ADDITIONAL SEDIMENT CONTROLS MUST BE PROVIDED, IF DEEMED NECESSARY BY THE HOWARD COUNTY SEDIMENT CONTROL INSPECTOR.
10. ON ALL SITES WITH DISTURBED AREAS IN EXCESS OF 2 ACRES, APPROVAL OF THE INSPECTION AGENCY SHALL BE REQUESTED UPON COMPLETION OF INSTALLATION OF PERIMETER EROSION AND SEDIMENT CONTROL, BUT BEFORE PROCEEDING WITH ANY OTHER EARTH DISTURBANCE OR GRADING. OTHER BUILDING OR GRADING INSPECTION APPROVALS MAY NOT BE AUTHORIZED UNTIL THIS INITIAL APPROVAL BY THE INSPECTION AGENCY IS MADE.
11. TRENCHES FOR THE CONSTRUCTION OF UTILITIES IS LIMITED TO THREE PIPE LENGTHS OR THAT WHICH SHALL BE BACK-FILLED AND STABILIZED WITHIN ONE WORKING DAY, WHICHEVER IS SHORTER.
12. SITE GRADING WILL BEGIN ONLY AFTER ALL PERIMETER SEDIMENT CONTROL MEASURES HAVE BEEN INSTALLED AND ARE IN A FUNCTIONING CONDITION.
13. SEDIMENT WILL BE REMOVED FROM TRAPS WHEN ITS DEPTH REACHES CLEAN OUT ELEVATION SHOWN ON THE PLANS.
14. CUT AND FILL QUANTITIES PROVIDED UNDER SITE ANALYSIS DO NOT REPRESENT BID QUANTITIES. THESE QUANTITIES DO NOT DISTINGUISH BETWEEN TOPSOIL, STRUCTURAL FILL OR EMBANKMENT MATERIAL, NOR DO THEY REFLECT CONSIDERATION OF UNDERCUTTING OR REMOVAL OF UNSUITABLE MATERIAL. THE CONTRACTOR SHALL FAMILIARIZE HIMSELF WITH SITE CONDITIONS WHICH MAY AFFECT THE WORK.

TEMPORARY SEEDING NOTES

APPLY TO GRADED OR CLEARED AREAS LIKELY TO BE REDISTURBED WHERE A SHORT-TERM VEGETATIVE COVER IS NEEDED.

SEEDBED PREPARATION : LOOSEN UPPER THREE INCHES OF SOIL BY RAKING, DISCING OR OTHER ACCEPTABLE MEANS BEFORE SEEDING, IF NOT PREVIOUSLY LOOSENED.

SOIL AMENDMENTS : APPLY 600 LBS. PER ACRE 10-10-10 FERTILIZER (14 LBS. PER 1000 SQ.FT.).

SEEDING : FOR PERIODS MARCH 1 THRU APRIL 30 AND FROM AUGUST 15 THRU NOVEMBER 15, SEED WITH 2-1/2 BUSHELS PER ACRE OF ANNUAL RYE (3.2 LBS. PER 1000 SQ.FT.). FOR THE PERIOD MAY 1 THRU AUGUST 14, SEED WITH 3 LBS. PER ACRE OF WEEPING LOVEGRASS (0.07 LBS. PER 1000 SQ.FT.). FOR THE PERIOD NOVEMBER 16 THRU FEBRUARY 28, PROTECT SITE BY APPLYING 2 TONS PER ACRE OF WELL ANCHORED STRAW MULCH AND SEED AS SOON AS POSSIBLE IN THE SPRING, OR USE SOD.

MULCHING : APPLY 1-1/2 TO 2 TONS PER ACRE (70 TO 90 LBS. PER 1000 SQ.FT.) OF UNROTTED SMALL GRAIN STRAW IMMEDIATELY AFTER SEEDING. ANCHOR MULCH IMMEDIATELY AFTER APPLICATION USING MULCH ANCHORING TOOL OR 218 GAL. PER ACRE (5 GAL. PER 1000 SQ.FT.) OF EMULSIFIED ASPHALT ON FLAT AREAS. ON SLOPES, 8 FT. OR HIGHER, USE 347 GAL. PER ACRE (8 GAL. PER 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.

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 :

- 1) PREFERRED -- APPLY 2 TONS PER ACRE DOLOMITIC LIMESTONE (92 LBS. PER 1000 SQ.FT.) AND 600 LBS. PER ACRE 10-10-10 FERTILIZER (14 LBS. PER 1000 SQ.FT.) BEFORE SEEDING. HARROW OR DISC INTO UPPER THREE INCHES OF SOIL. AT TIME OF SEEDING, APPLY 400 LBS. PER ACRE 30-0-0 UREA-FORM FERTILIZER (9 LBS. PER 1000 SQ.FT.).
- 2) ACCEPTABLE -- APPLY 2 TONS PER ACRE DOLOMITIC LIMESTONE (92 LBS. PER 1000 SQ.FT.) AND 1000 LBS. PER ACRE 10-10-10 FERTILIZER (23 LBS. PER 1000 SQ.FT.) BEFORE SEEDING. HARROW OR DISC INTO UPPER THREE INCHES OF SOIL.

SEEDING : FOR THE PERIOD MARCH 1 THRU APRIL 30 AND FROM AUGUST 1 THRU OCTOBER 15, SEED WITH 60 LBS. PER ACRE (1.4 LBS. PER 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 (0.05 LBS. PER 1000 SQ.FT.) OF WEEPING LOVEGRASS. DURING THE PERIOD OCTOBER 16 THRU FEBRUARY 28, PROTECT SITE BY ONE OF THE FOLLOWING OPTIONS :

- 1) 2 TONS PER ACRE OF WELL-ANCHORED MULCH STRAW AND SEED AS SOON AS POSSIBLE IN THE SPRING.
- 2) USE SOD.
- 3) SEED WITH 60 LBS. PER ACRE KENTUCKY 31 TALL FESCUE AND MULCH WITH 2 TONS PER ACRE WELL ANCHORED STRAW.

MULCHING : APPLY 1-1/2 TO 2 TONS PER ACRE (70 TO 90 LBS. PER 1000 SQ.FT.) OF UNROTTED SMALL GRAIN STRAW IMMEDIATELY AFTER SEEDING. ANCHOR MULCH IMMEDIATELY AFTER APPLICATION USING MULCH ANCHORING TOOL OR 218 GAL. PER ACRE (5 GAL. PER 1000 SQ.FT.) OF EMULSIFIED ASPHALT ON FLAT AREAS. ON SLOPES, 8 FT. OR HIGHER, USE 347 GAL. PER ACRE (8 GAL. PER 1000 SQ.FT.) FOR ANCHORING.

MAINTENANCE : INSPECT ALL SEEDBED AREAS AND MAKE NEEDED REPAIRS, REPLACEMENTS AND RESEEDINGS.

SEQUENCE OF CONSTRUCTION

1. OBTAIN GRADING PERMIT.
2. INSTALL STABILIZED CONSTRUCTION ENTRANCE, SUPER SILT FENCE. (1 WEEK)
3. BEGIN ROUGH GRADING AND BUILDING CONSTRUCTION.
4. AS SUBGRADE ELEVATIONS ARE ESTABLISHED, INSTALL STORM INLETS, INLET PROTECTION, AND WATER AND SEWER. (6 WEEKS)
5. INSTALL CURB AND GUTTER THEN PROCEED ASPHALT PAVING. (6 WEEKS)
6. APPLY TOPSOIL AND STABILIZE DISTURBED AREAS IN ACCORDANCE WITH PERMANENT SEEDING NOTES. (2 DAYS)
7. PERFORM FINE GRADING, LANDSCAPING, LIGHTING, SIDEWALK, AND COMPLETE BUILDING CONSTRUCTION. (6 MONTHS)
8. UPON PERMISSION OF COUNTY SEDIMENT CONTROL INSPECTOR, REMOVE ALL REMAINING SEDIMENT CONTROL DEVICES AND STABILIZE DISTURBED AREAS IN ACCORDANCE WITH PERMANENT SEEDING NOTES. (2 DAY)

APPROVED
PLANNING BOARD
OF HOWARD COUNTY
DATE 6-08-06

BY THE DEVELOPER :

I/WE CERTIFY THAT ALL DEVELOPMENT AND CONSTRUCTION WILL BE DONE ACCORDING TO THIS PLAN, AND THAT ANY 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 INSPECTIONS BY THE HOWARD SOIL CONSERVATION DISTRICT.

Paul G. Cannizzaro 8/31/06
DEVELOPER DATE

BY THE ENGINEER :

I 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.

D. W. Colangelo 06/26/06
ENGINEER DATE

THESE PLANS HAVE BEEN REVIEWED FOR THE HOWARD SOIL CONSERVATION DISTRICT AND MEET THE TECHNICAL REQUIREMENTS FOR SOIL EROSION AND SEDIMENT CONTROL.

Jim Meyers 8/24/06
NATURAL RESOURCES CONSERVATION SERVICE DATE

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

John K. Rohatzen 8/24/06
HOWARD SOIL CONSERVATION DISTRICT DATE

APPROVED : HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.

Thomas M. Coughlin 6/23/06
DIRECTOR DATE

[Signature] 7/24/06
CHIEF, DEVELOPMENT ENGINEERING DIVISION DATE

Candice Blumert 8/13/06
CHIEF, DIVISION OF LAND DEVELOPMENT DATE

DATE	NO.	REVISION

OWNER / DEVELOPER
HRD LAND HOLDINGS, INC.
HOWARD RESEARCH AND DEVELOPMENT CORPORATION
THE ROUSE BUILDING
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044
410-992-6000

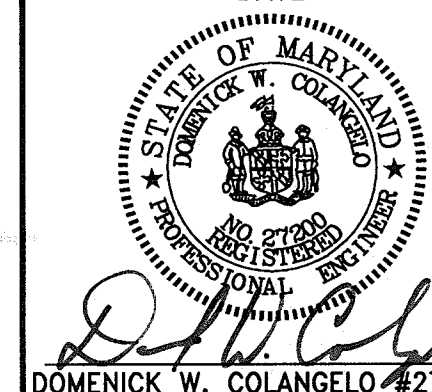
PROJECT **GATEWAY OVERLOOK**
BENSON EAST PARCEL R
ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F

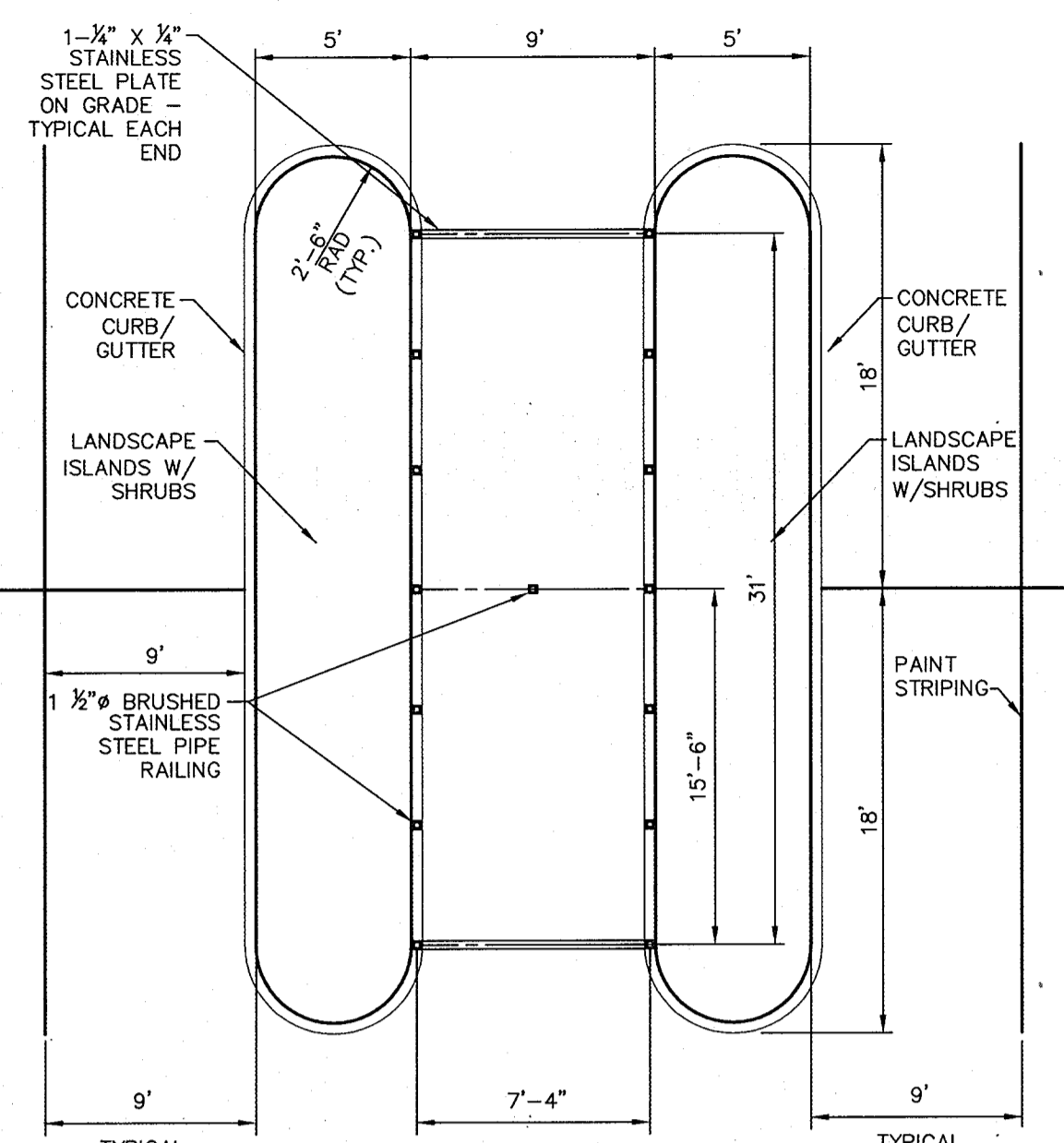
AREA TAX MAP 37 & 43 ZONED -- NEWTOWN
BENSON EAST PARCEL R PLAT NO. 17876
6th ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

TITLE **SEDIMENT CONTROL NOTES AND DETAILS**

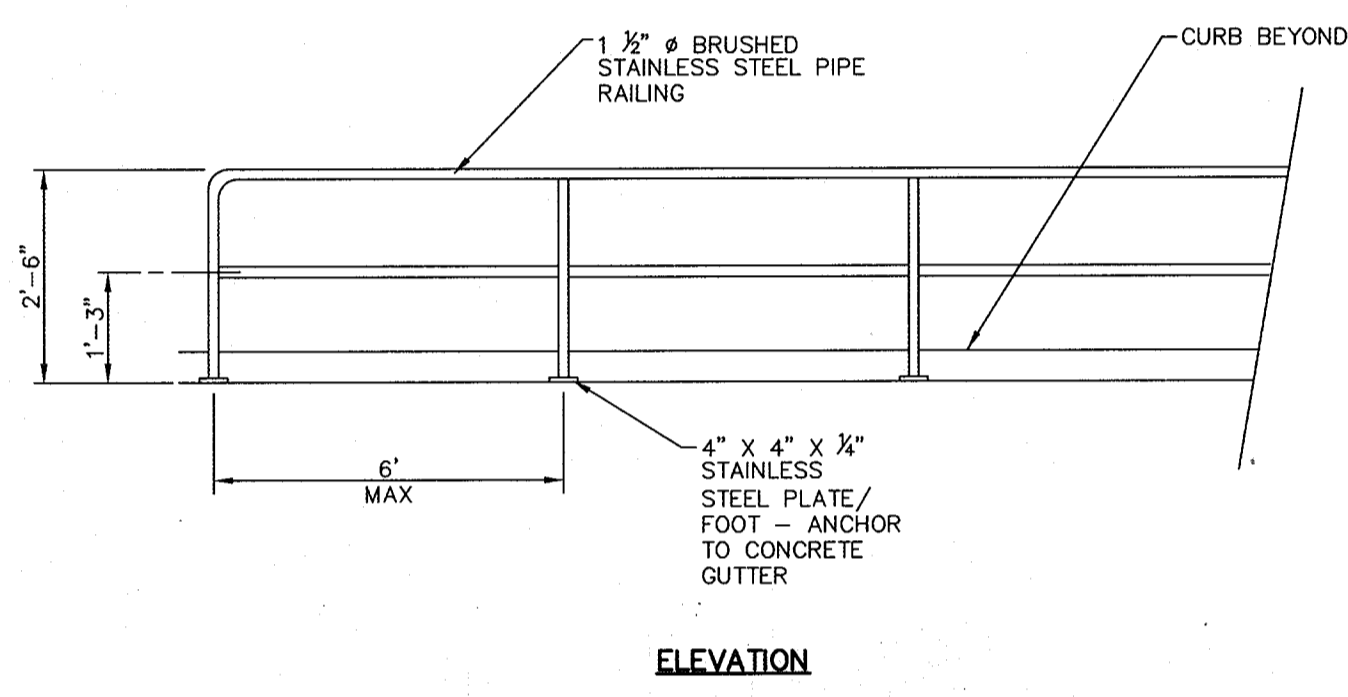
Patton Harris Rust & Associates, pc
Engineers, Surveyors, Planners, Landscape Architects.
1 Windsor, Suite 201A
7535 Windsor Drive
Allentown, PA 18195
T 610.395.7033
F 610.395.5811

D. W. Colangelo 06/26/06
DATE
DESIGNED BY : D.W.C.
DRAWN BY: EMR
PROJECT NO : 11621/1-2
CS00DET
DATE : JUNE 9, 2006
SCALE : AS SHOWN
DRAWING NO. 8 OF 15



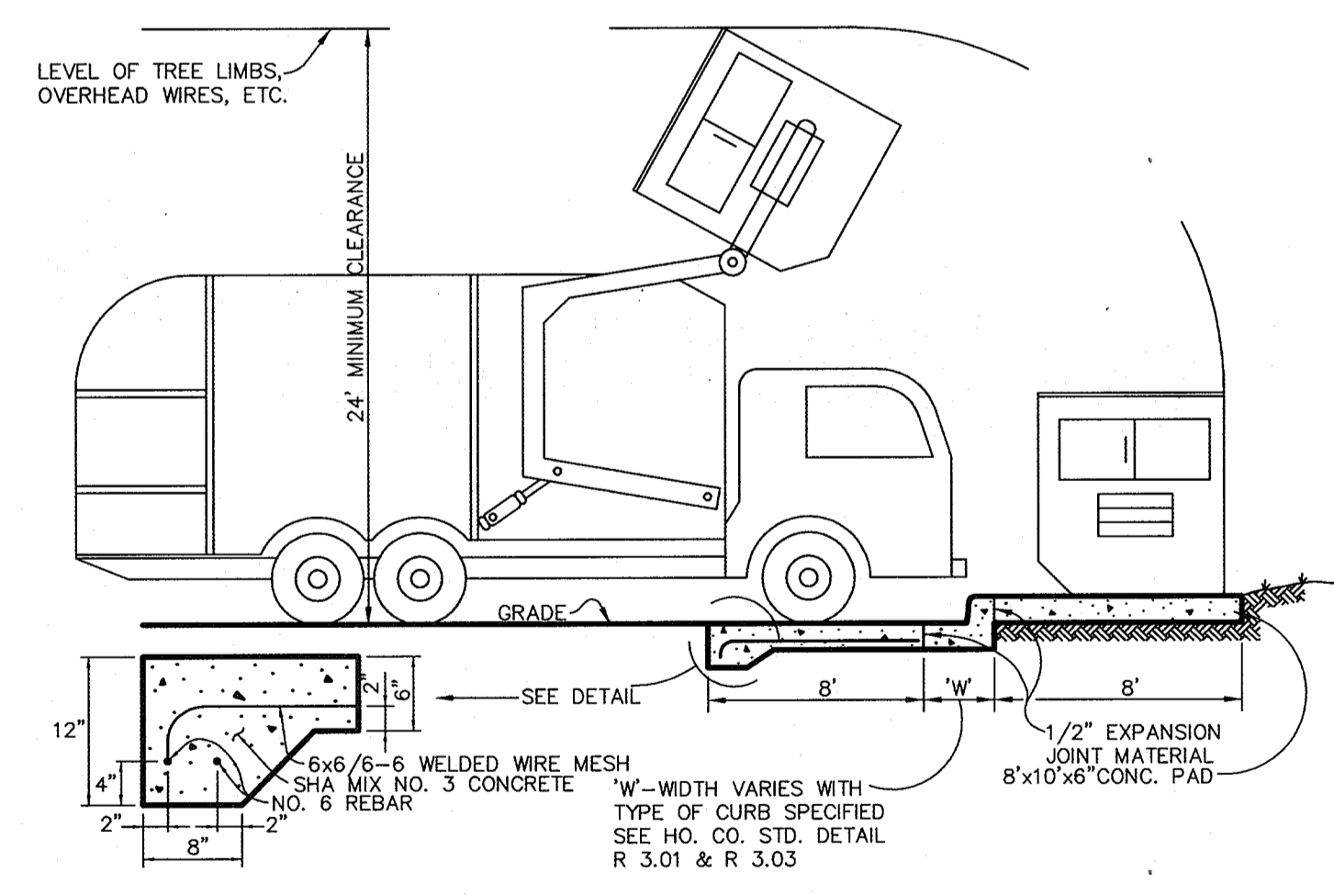


1 CART CORRAL DETAIL
SCALE: NOT TO SCALE

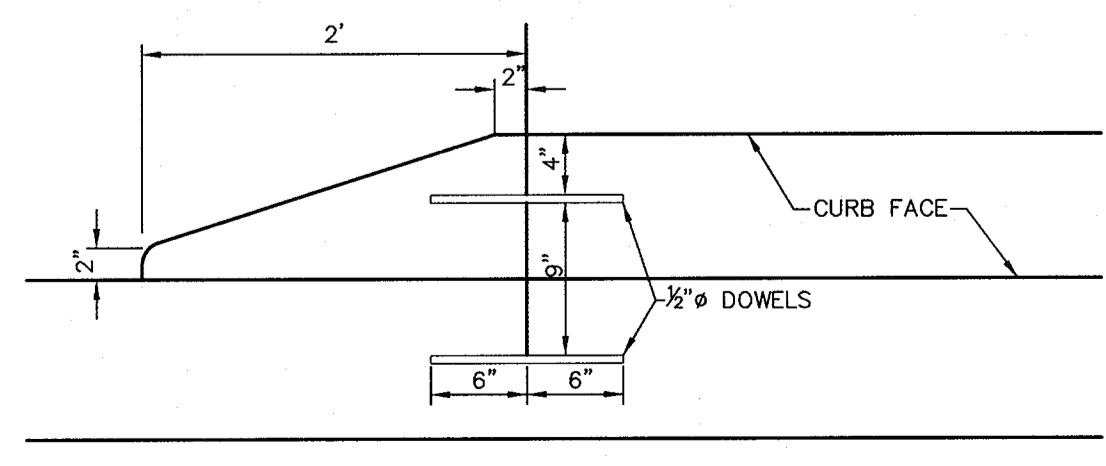


ELEVATION

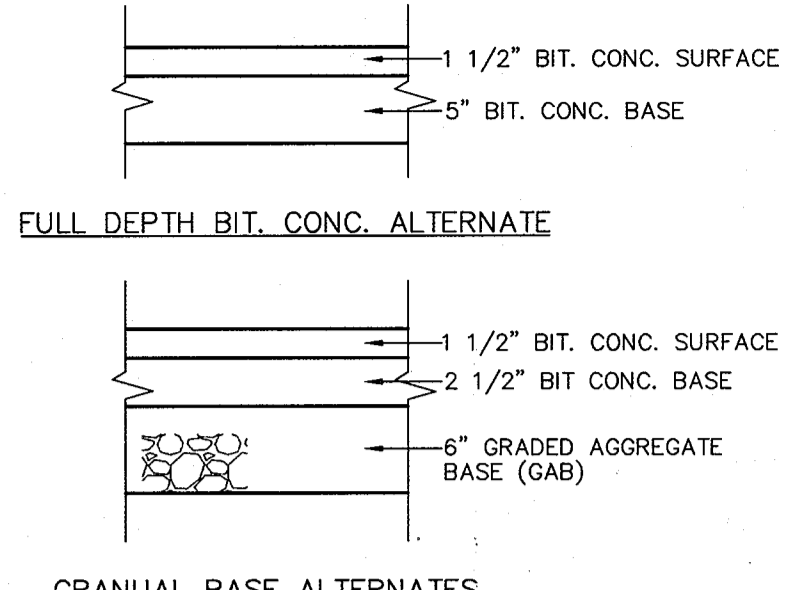
1 CART CORRAL DETAIL
SCALE: NOT TO SCALE



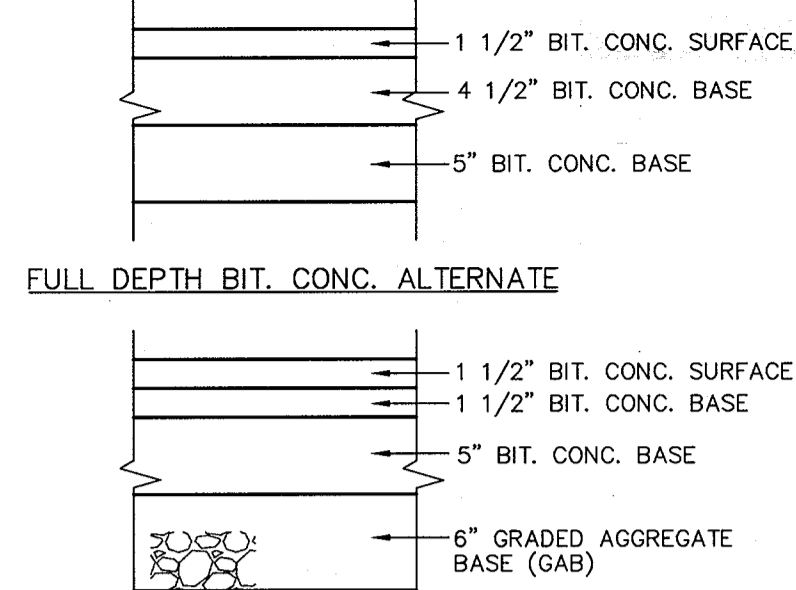
2 DUMPSTER PAD
SCALE: NOT TO SCALE



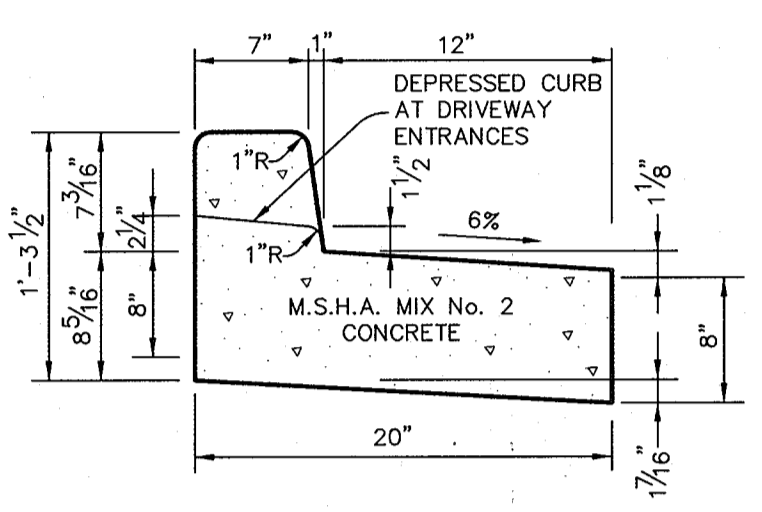
10 NOSE DOWN CURB DETAIL
SCALE: NOT TO SCALE



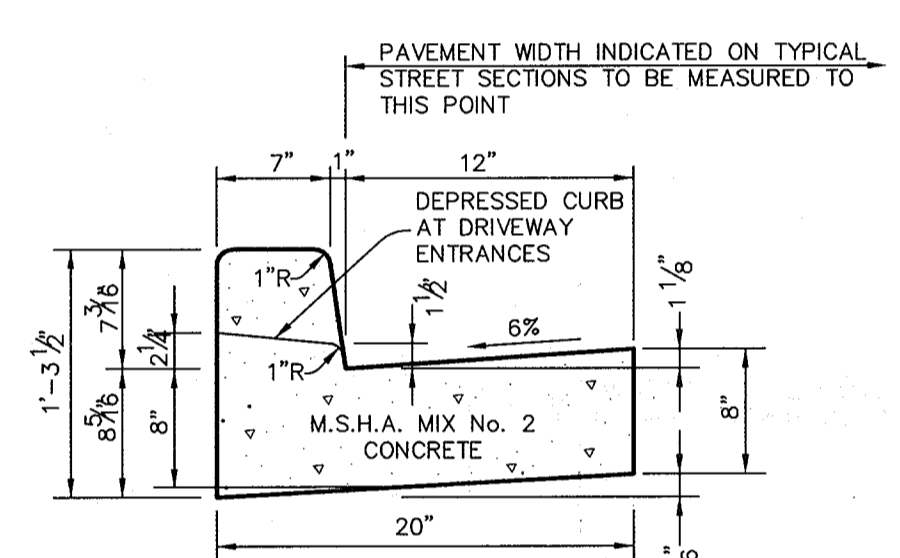
3 P-2 PAVING DETAIL
SCALE: NOT TO SCALE



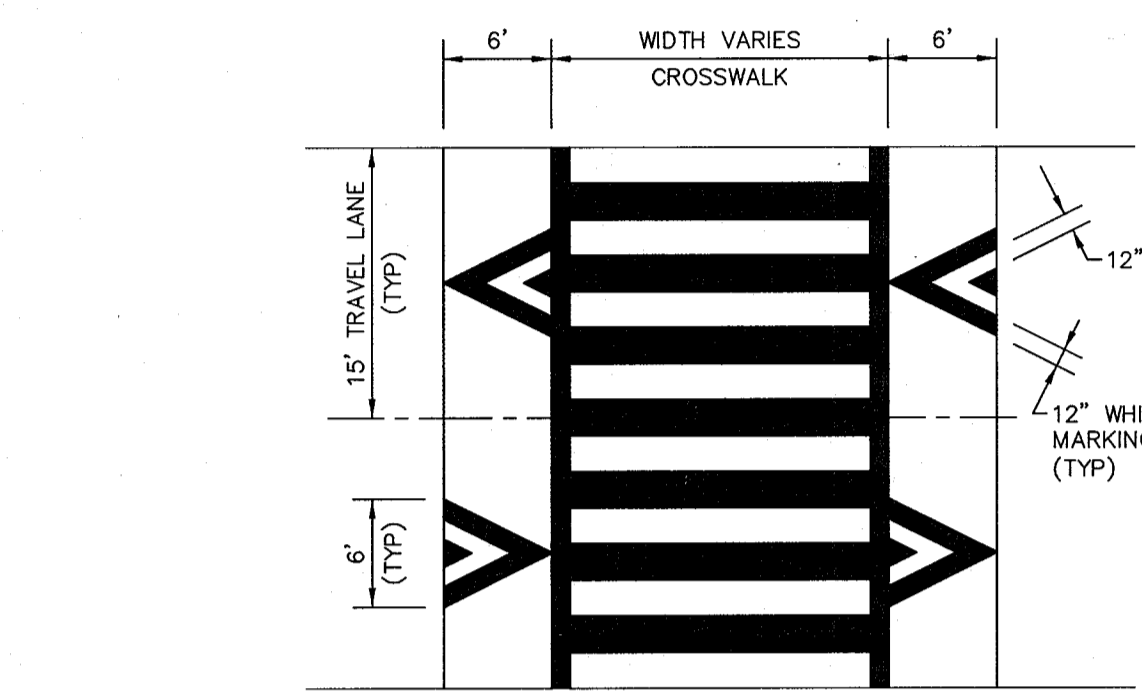
4 P-5 PAVING DETAIL
SCALE: NOT TO SCALE



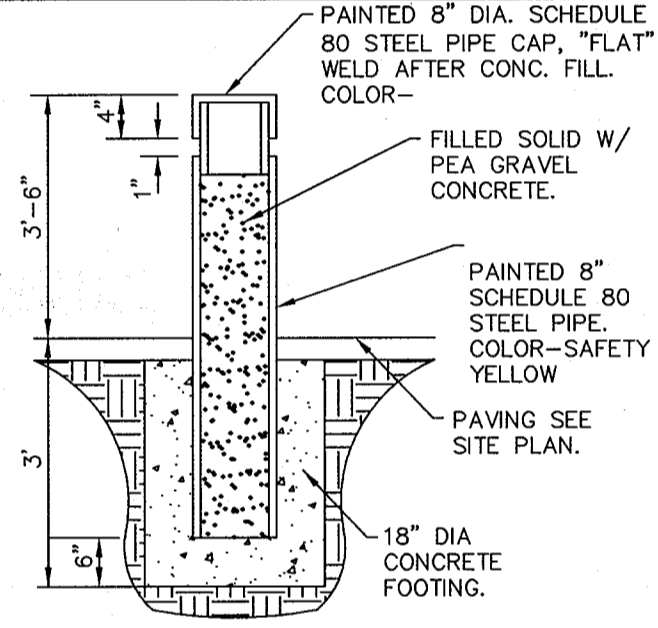
5 REVERSE 7" COMBINATION CURB AND GUTTER
SCALE: NO SCALE



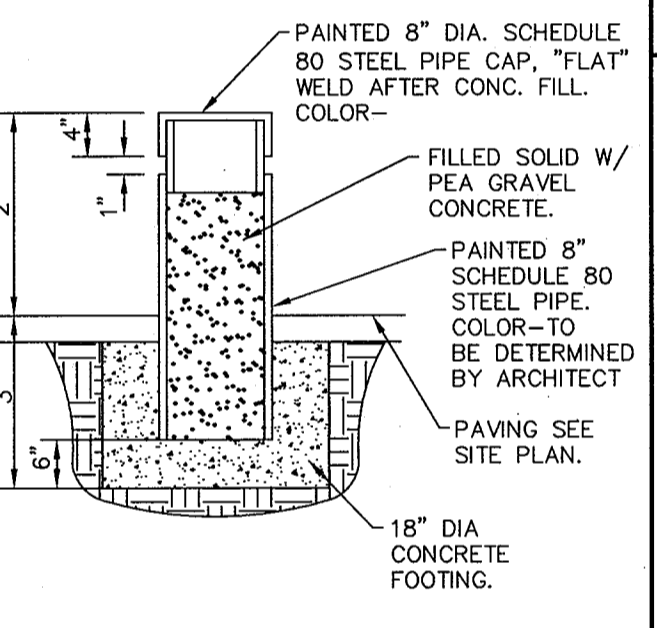
7 STANDARD 7" COMBINATION CURB AND GUTTER
SCALE: NO SCALE



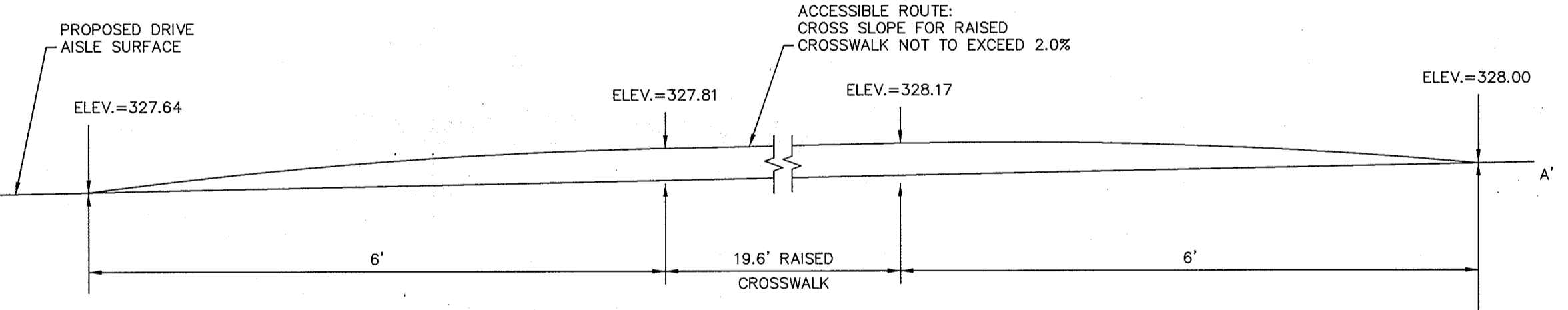
6 SPEED HUMP MARKINGS
SCALE: NOT TO SCALE



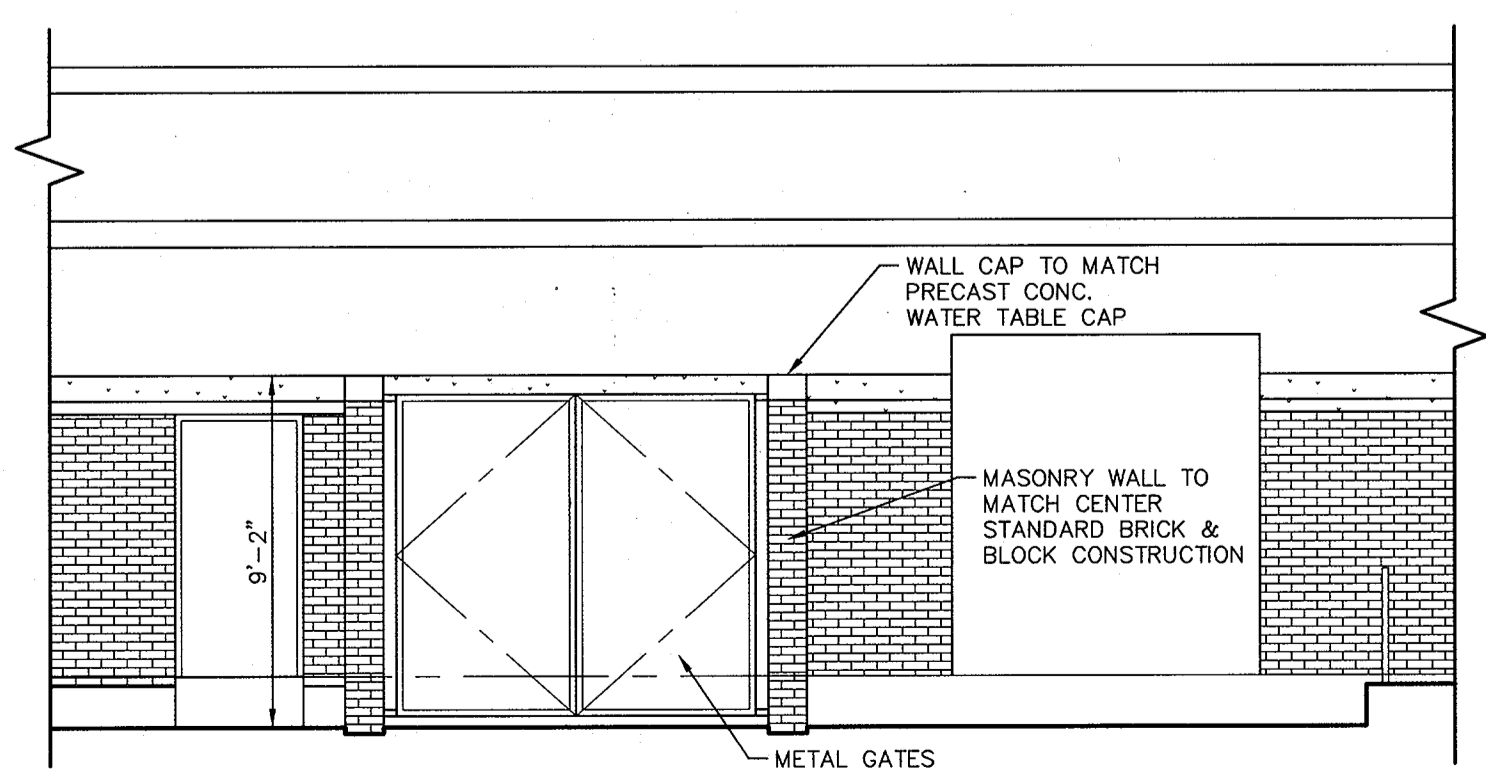
8 SERVICE AREA BOLLARD DETAIL
SCALE: NOT TO SCALE



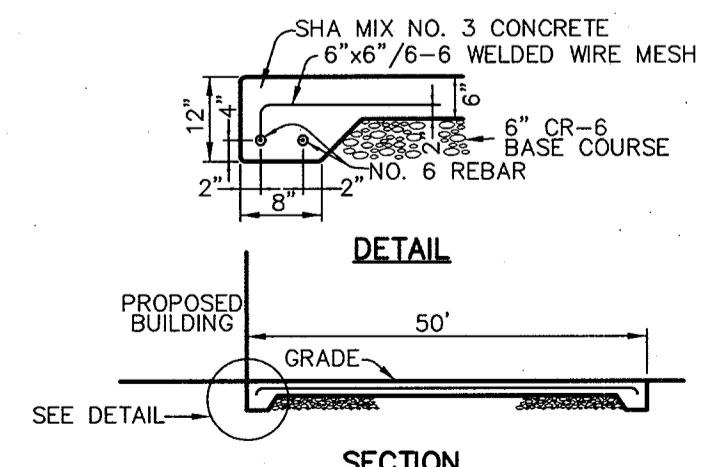
9 PEDESTRIAN BOLLARD DETAIL
SCALE: NOT TO SCALE



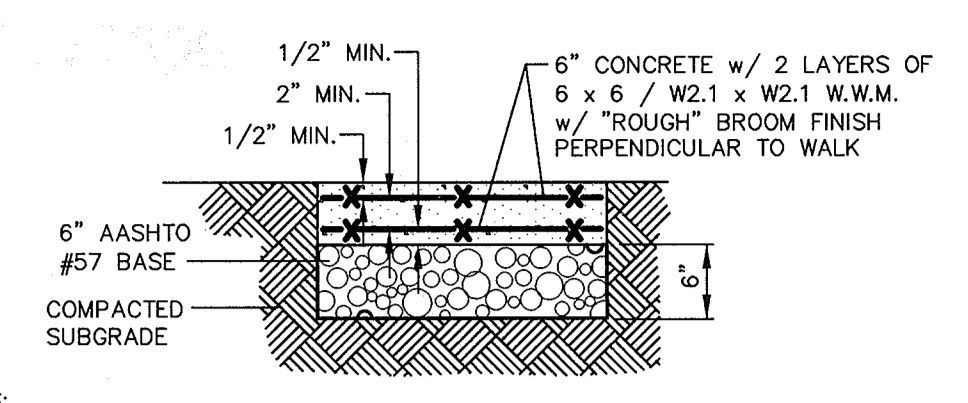
11 SPEED HUMP #1 DETAIL - SECTION A-A'
SCALE: NOT TO SCALE



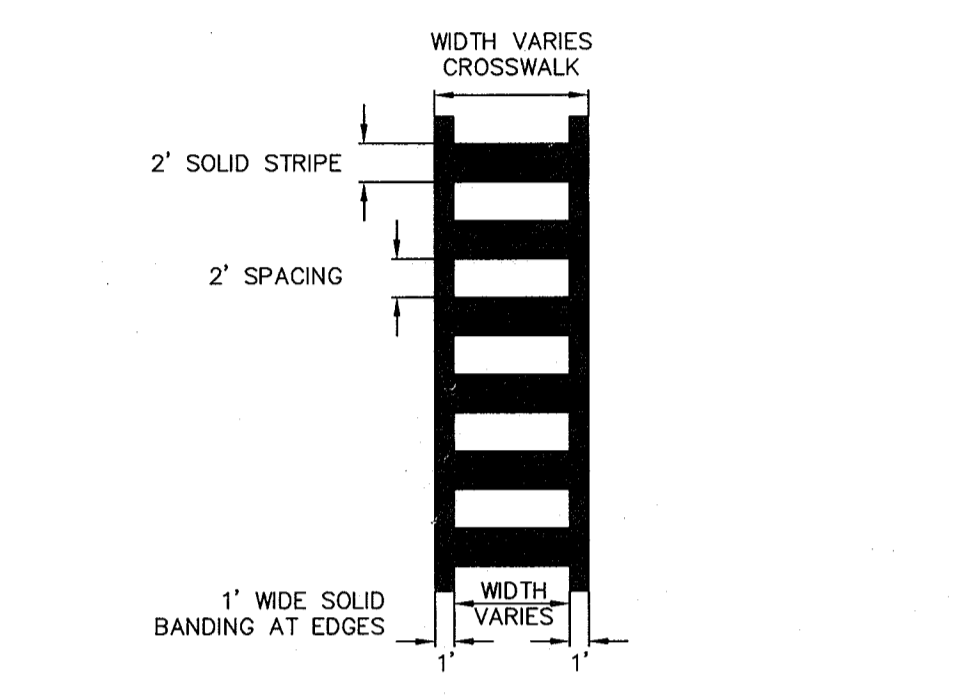
12 DUMPSTER ENCLOSURE DETAIL
SCALE: NOT TO SCALE



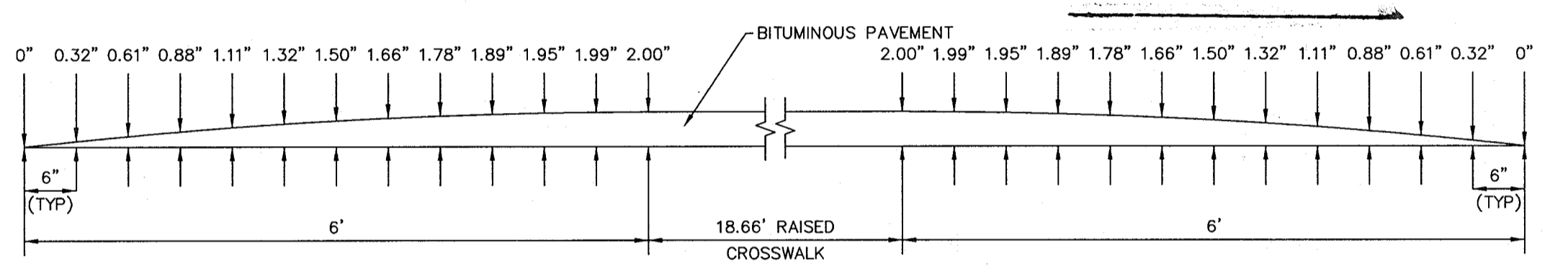
13 TRAILER DOLLY SETDOWN PAD DETAIL
SCALE: 1" = 10'



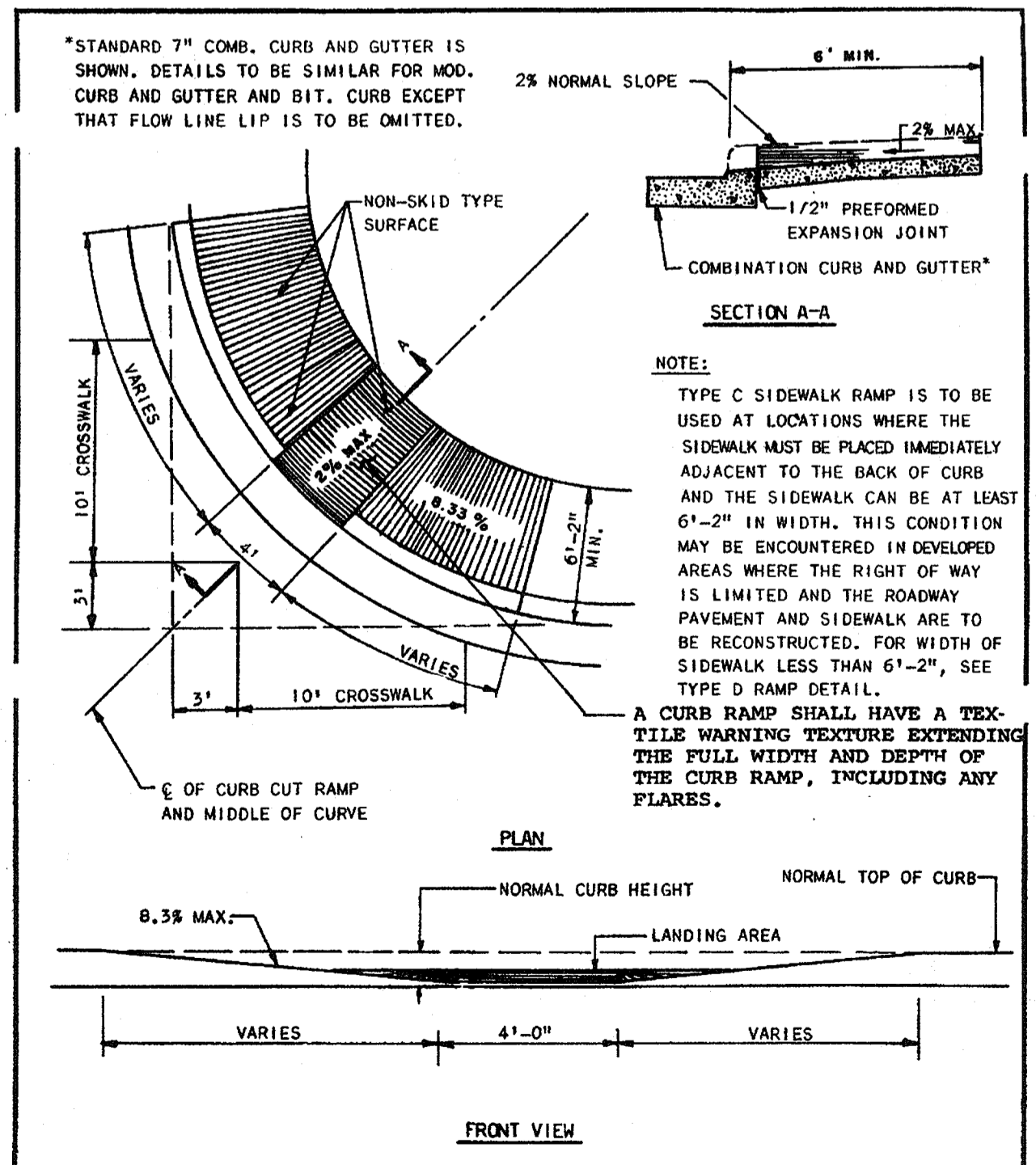
14 CONCRETE DRIVEWAY DETAIL
SCALE: NOT TO SCALE



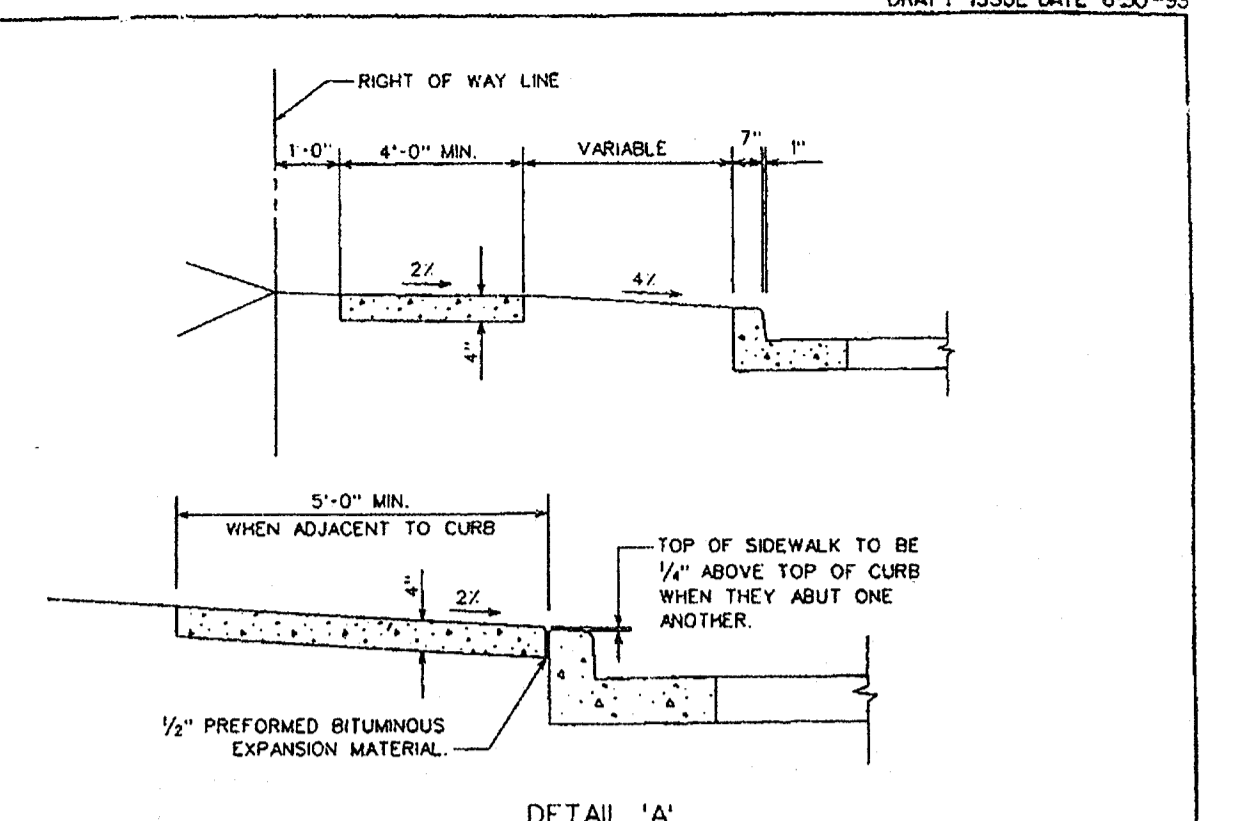
15 TYPICAL HOWARD COUNTY CROSS WALK DETAIL
SCALE: 1" = 10'



16 SPEED HUMP #2 DETAIL
SCALE: NOT TO SCALE



HOWARD COUNTY, MARYLAND DEPARTMENT OF PUBLIC WORKS
APPROVED: [Signature] Chief - Bureau of Engineering
DRAWN BY: [Signature] CHECKED BY: [Signature] NO SCALE R-4.03



- NOTES:
- SIDEWALK TO BE SCRIBED IN 5'-0" MAXIMUM SQUARES.
 - EXPANSION JOINTS ACROSS THE SIDEWALK NOT TO MORE THAN 15' APART.
 - 1/2" PREFORMED BITUMINOUS EXPANSION MATERIAL IN EXPANSION JOINTS TO BE KEPT 1/4" BELOW SURFACE OF SIDEWALK.
 - CONCRETE TO BE MIX NO. 2
 - WHEN SIDEWALK ABUTS CURB, WALK SHALL BE 1/4" ABOVE CURB WITH 1/2" PREFORMED BITUMINOUS EXPANSION MATERIAL BETWEEN SIDEWALK AND CURB.
 - ON LONGITUDINAL SIDEWALK GRADES OF 5% OR GREATER, A CONCRETE HEADER, 6" THICK AND 8" DEEP BELOW THE NORMAL 4" SIDEWALK THICKNESS SHALL BE CONSTRUCTED FOR THE FULL WIDTH OF THE SIDEWALK AT INTERVALS OF 48 FEET. THE HEADERS SHALL BE PLACED AT EXPANSION JOINT LOCATIONS AND SHALL BE MONOLITHIC WITH THE SIDEWALK.
 - SIDEWALK ADJACENT TO CURB SHALL BE 5'-0" MIN. EXCEPT SIDEWALK ADJACENT TO CURB IN CURB-DE-SAC BULBS MAY BE 4'-0" WIDE.
 - SIDEWALK LOCATED 2' OR MORE FROM CURB MAY BE 4'-0" IN WIDTH WITH A 5'-0" PAVED SECTION PLACED 200' APART.

HOWARD COUNTY, MARYLAND DEPARTMENT OF PUBLIC WORKS
APPROVED: [Signature] Chief - Bureau of Engineering
DATE: 6-08-06
CONCRETE SIDEWALK
APPROVED PLANNING BOARD OF HOWARD COUNTY
DATE: 6-08-06

APPROVED: HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.
DIRECTOR: [Signature] DATE: 6/21/06
CHIEF, DEVELOPMENT ENGINEERING DIVISION: [Signature] DATE: 6/21/06
CHIEF, DIVISION OF LAND DEVELOPMENT: [Signature] DATE: 6/21/06

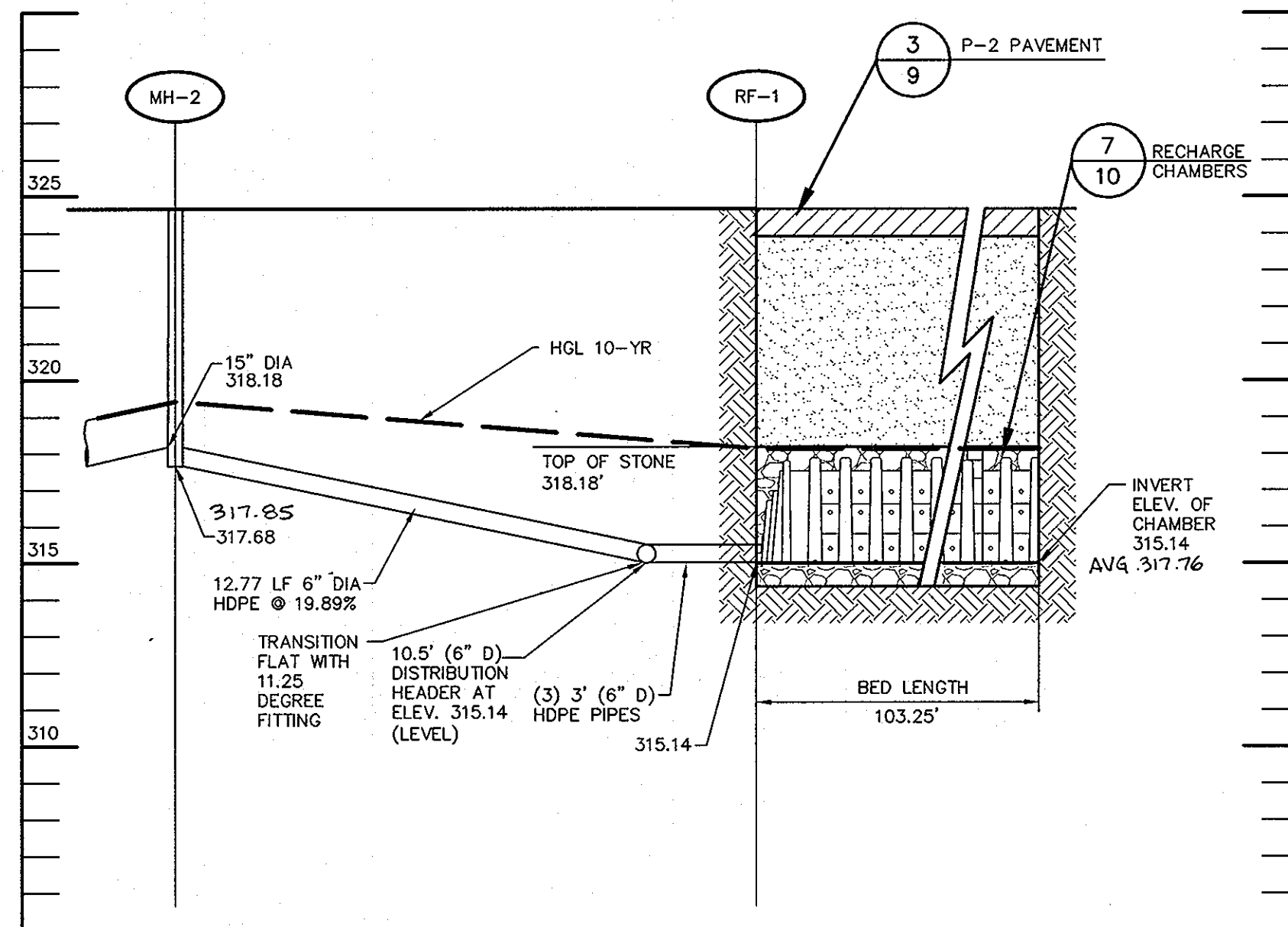
OWNER / DEVELOPER
HRD LAND HOLDINGS, INC.
HOWARD RESEARCH AND DEVELOPMENT CORPORATION
THE ROUSE BUILDING
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044
410-992-6000

PROJECT: GATEWAY OVERLOOK
ONE STORY RETAIL BUILDING NO. 1, STORES THRU F
AREA: TAX MAP 37 & 43 ZONED - NEWTOWN
BENSON EAST PARCEL R PLAT NO. 17876
6TH ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

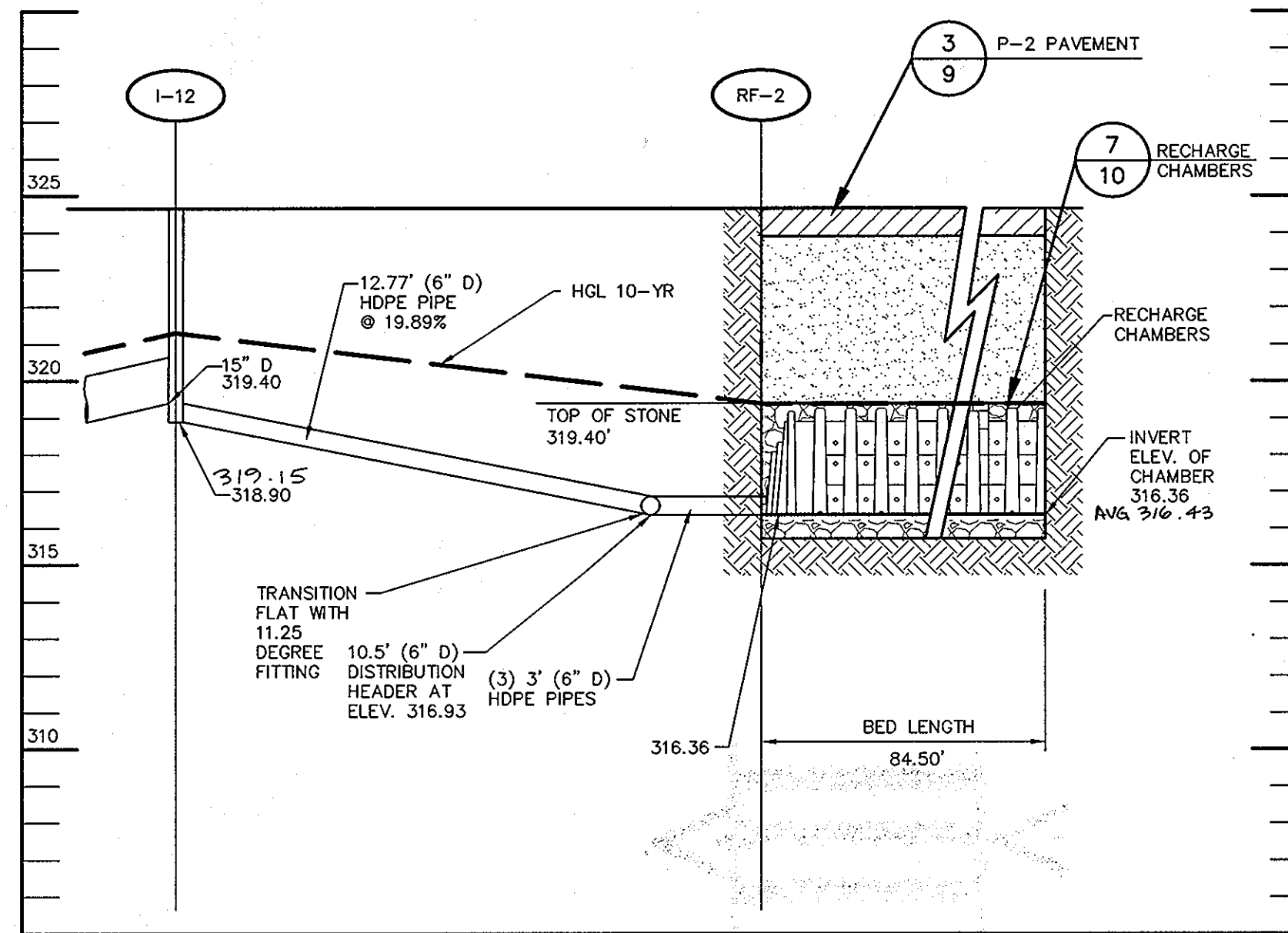
TITLE: CONSTRUCTION DETAILS

Patton Harris Rust & Associates, p.c.
Engineers, Surveyors, Planners, Landscape Architects.
PHRA
1 Windsor, Suite 201A
7535 Windsor Drive
Allentown, PA 18195
T 610.395.7033
F 610.395.5811

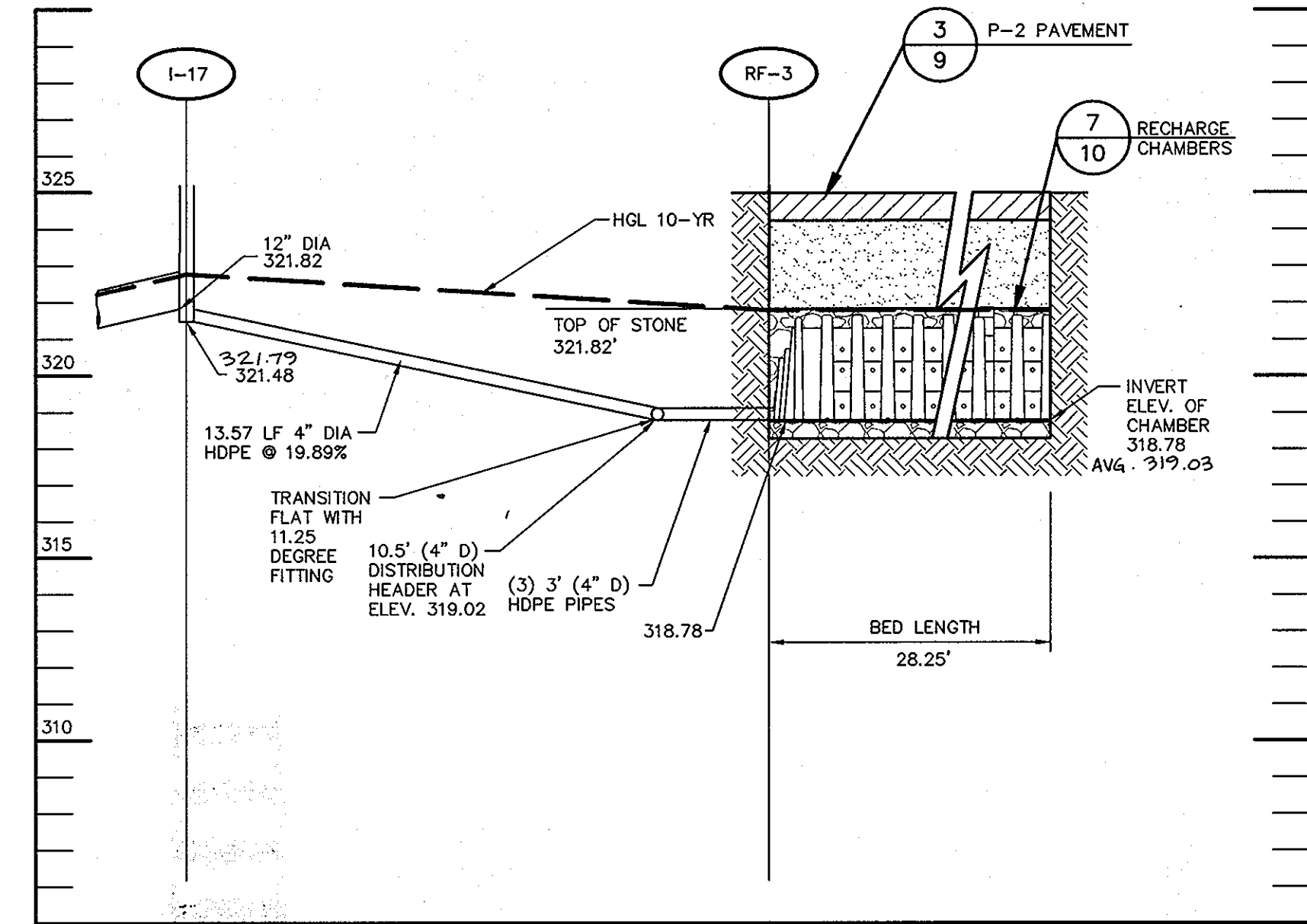
DATE: 06/26/06
DESIGNED BY: D.W.C.
DRAWN BY: EMR
PROJECT NO.: 11621/1-2
DATE: JUNE 9, 2006
SCALE: AS SHOWN
DRAWING NO.: 9 OF 15



1 RECHARGE FACILITY 1 PROFILE
10 SCALE: 1"=4'

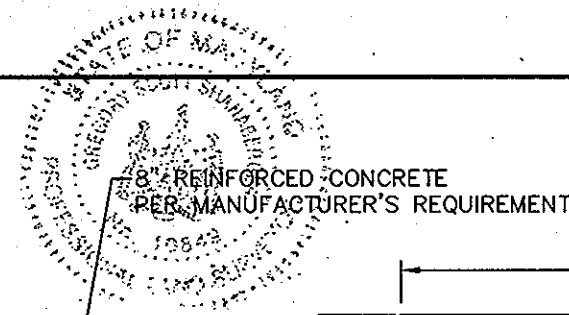
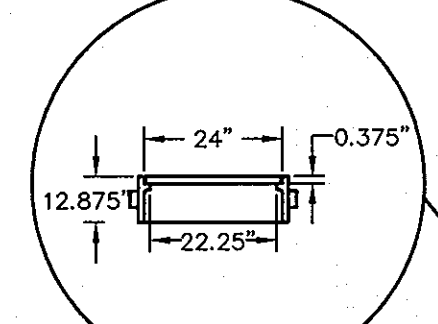


2 RECHARGE FACILITY 2 PROFILE
10 SCALE: 1"=4'

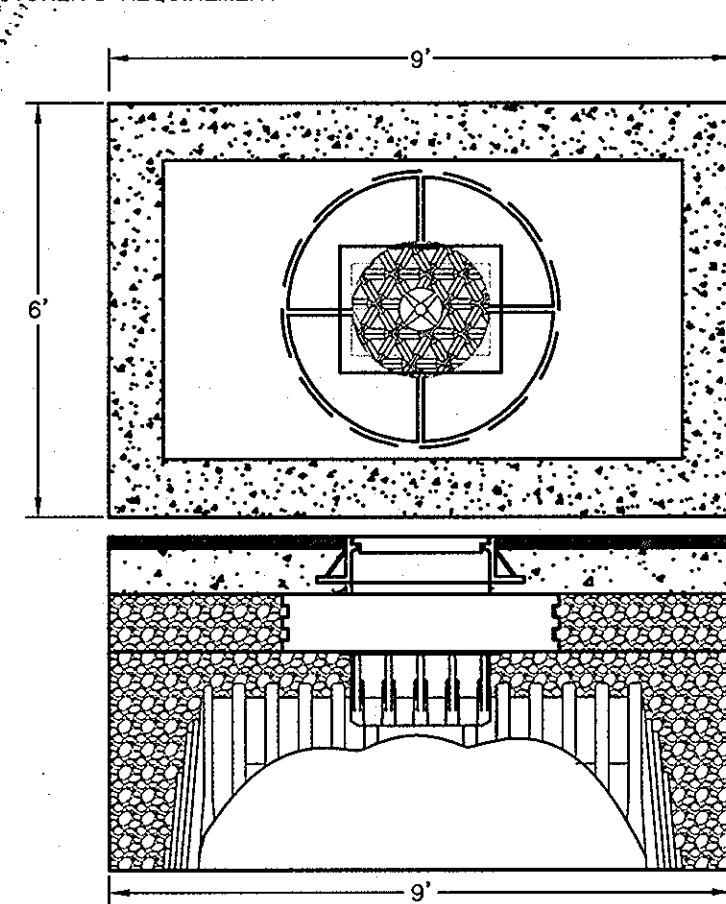


3 RECHARGE FACILITY 3 PROFILE
10 SCALE: 1"=4'

240 HD CAST IRON MANHOLE FRAME AND COVER BY FAIRFIELD INDUSTRIES, INC. OR APPROVED EQUAL.



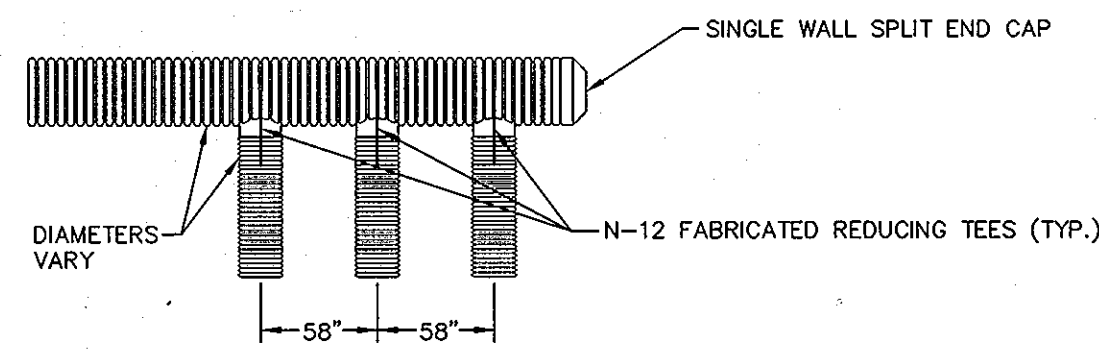
REINFORCED CONCRETE PER MANUFACTURER'S REQUIREMENT



4 STORMFILTER RISER DETAIL SECTION VIEW
10 SCALE: NO SCALE

MAINTENANCE OF RECHARGE FACILITIES:

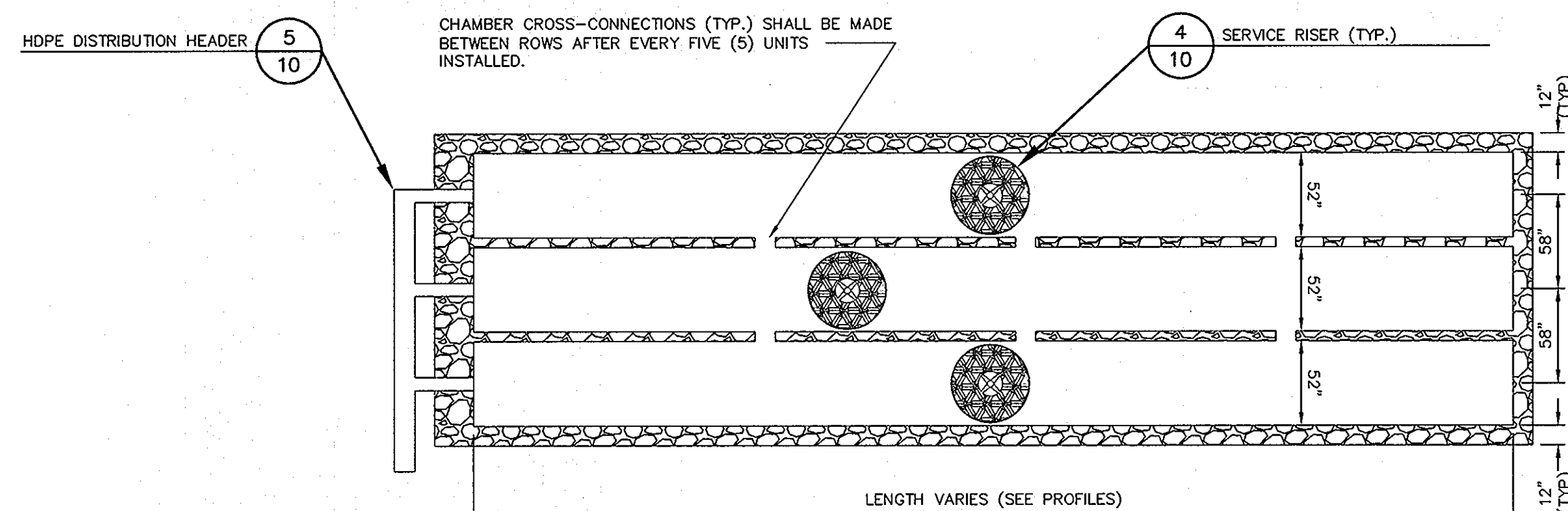
IN ACCORDANCE WITH THE MANUFACTURER'S RECOMMENDATION, INSPECTIONS SHALL BE MADE EVERY THREE MONTHS OR WHENEVER AN EXTREME STORM SITUATION OCCURS. IF IT IS ASSESSED FROM THE INSPECTION THAT SEDIMENTATION IS IMPAIRING THE FUNCTIONALITY OF THE FACILITIES, THEN A CLEAN OUT OF THE FACILITIES SHALL BE CONDUCTED.



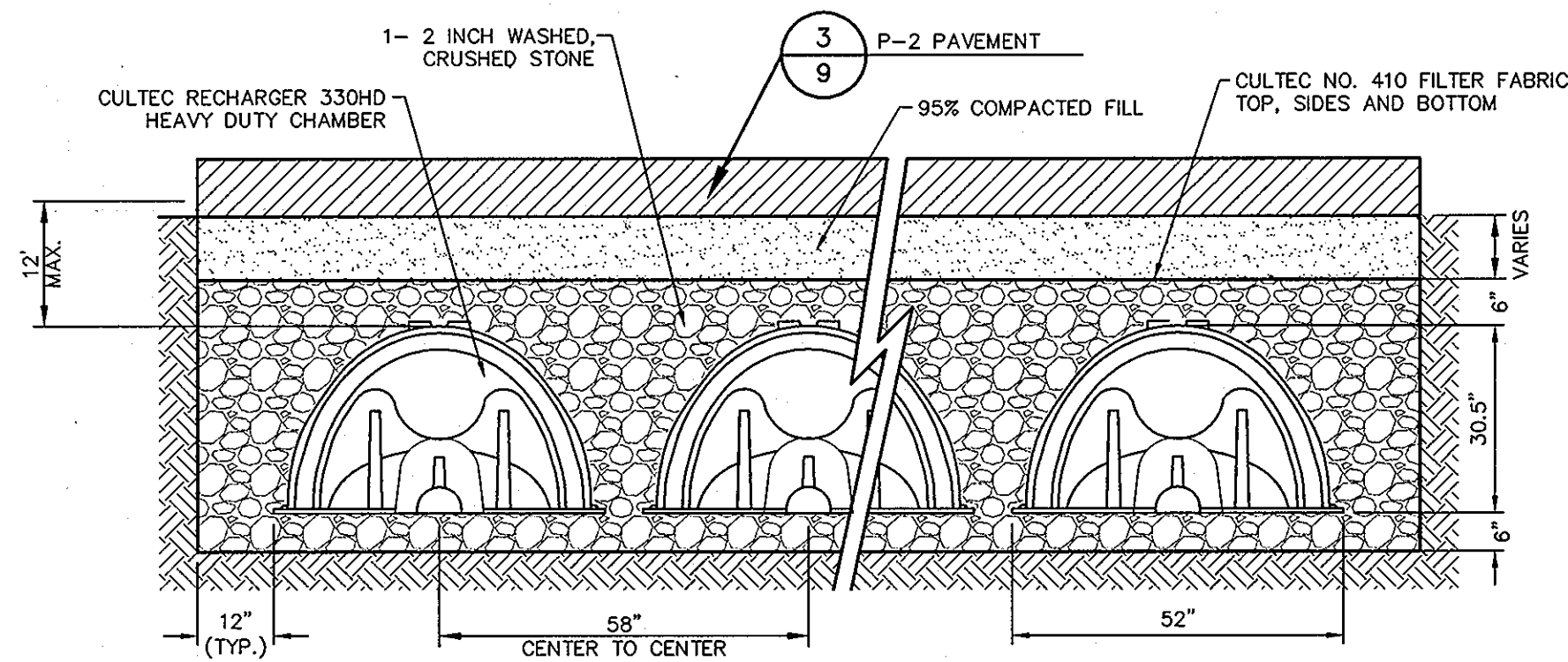
5 DETAIL OF DISTRIBUTION HEADER
10 SCALE: NO SCALE

DESIGN NOTES: RECHARGER 330HD

1. RECHARGER 330HD IS 6.25' X 52" X 30.5"
2. DESIGN UNIT BASED ON RECOMMENDED METHOD OF INSTALLATION.
3. CAPACITY OF VOID PROVIDED BY STONE IS CALCULATED @ 40% OF TOTAL VOLUME.
4. DESIGN UNIT CAPACITY IS: 10.35 CUBIC FEET PER LINEAR FOOT.
5. TOTAL STONE REQUIRED PER UNIT: 45.33 CUBIC FEET.
6. TOTAL AREA PER UNIT 30.19 SF
7. 1" STONE BORDER IS REQUIRED AROUND THE CHAMBER BED.
8. MANUFACTURED BY CULTEC INC. OF 878 FEDERAL ROAD BROOKFIELD, CT 06804 USA 203-775-4416 OR APPROVED EQUAL



6 RECHARGE FACILITY PLAN VIEW
10 SCALE: NO SCALE



GENERAL NOTES
RECHARGER 330HD BY CULTEC, INC. OF BROOKFIELD, CT.
ALL RECHARGER 330 HD CHAMBERS MUST BE INSTALLED IN ACCORDANCE WITH ALL APPLICABLE LOCAL, STATE AND FEDERAL REGULATIONS.

REFER TO CULTEC, INC.'S CURRENT RECOMMENDED INSTALLATION GUIDELINES.
ALL RECHARGER 330HD HEAVY DUTY UNITS ARE MARKED WITH A COLOR STRIPE FORMED INTO THE PART ALONG THE LENGTH OF THE CHAMBER.

7 CULTEC RECHARGER 330HD TYPICAL CROSS SECTION DETAIL
10 SCALE: NO SCALE

AS-BUILT

SHANABARGER & LANE
8726 TOWN & COUNTRY BLVD.
SUITE 201
ELLICOTT CITY, MARYLAND 21043

APPROVED
PLANNING BOARD
HOWARD COUNTY
DATE 6-08-06

APPROVED: HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.

Director: *Mark A. Wright* DATE: 6/3/06
Chief, Development Engineering Division: *[Signature]* DATE: 8/1/06
Chief, Division of Land Development: *[Signature]* DATE: 8/5/06

DATE	NO.	REVISION

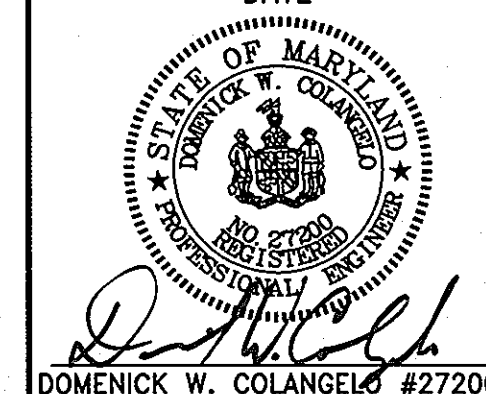
OWNER / DEVELOPER
HRD LAND HOLDINGS, INC.
HOWARD RESEARCH AND DEVELOPMENT CORPORATION
THE ROUSE BUILDING
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044
410-992-6000

PROJECT: **GATEWAY OVERLOOK**
BENSON EAST PARCEL R
ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F
AREA: TAX MAP 37 & 43 ZONED - NEWTOWN
BENSON EAST PARCEL R. PLAT NO. 17876
6th ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

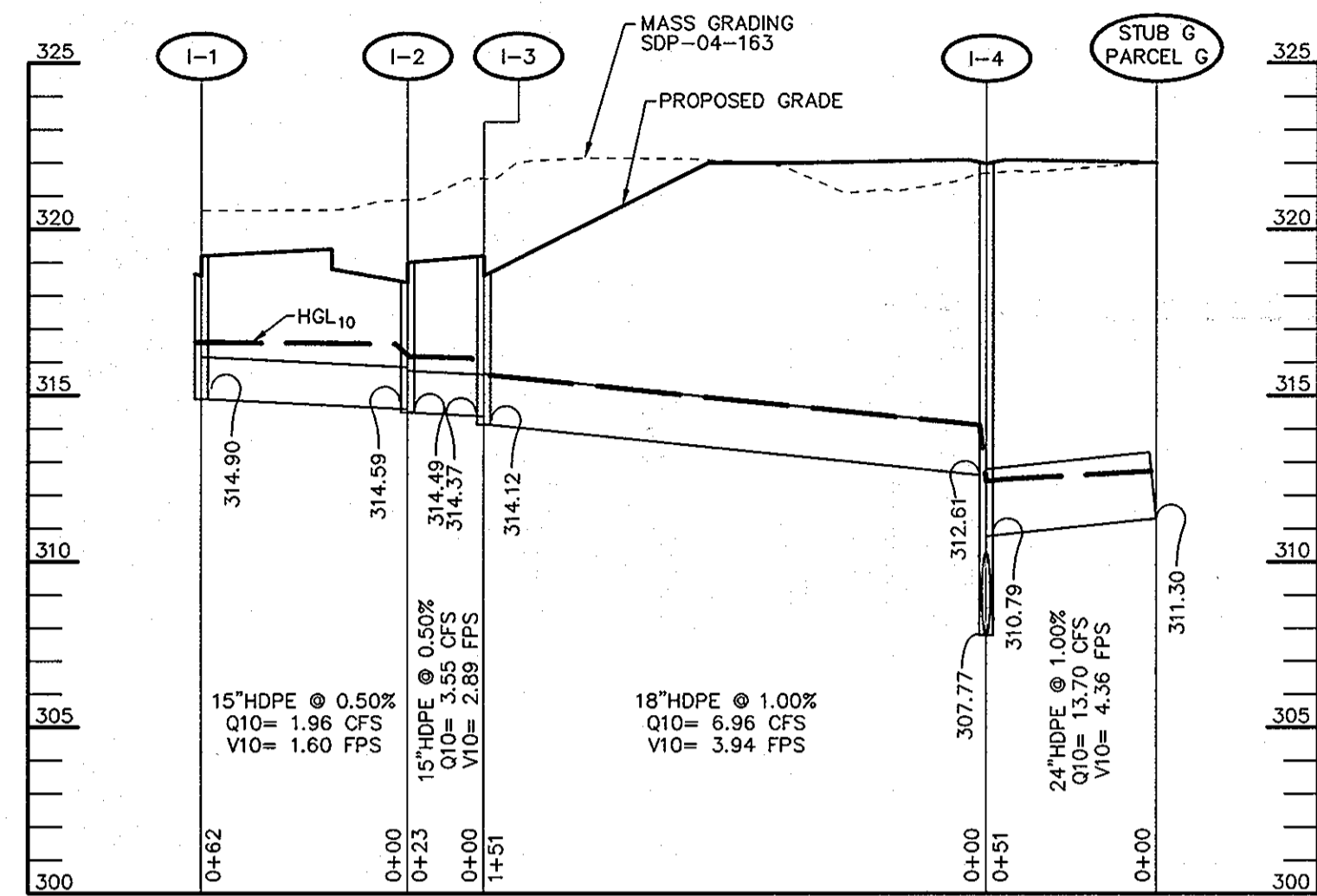
TITLE: **RECHARGE SYSTEM DETAILS**

Patton Harris Rust & Associates, pc
Engineers, Surveyors, Planners, Landscape Architects.
PHRA
1 Windsor, Suite 201A
7535 Windsor Drive
Allentown, PA 18195
T 610.395.7033
F 610.395.5811

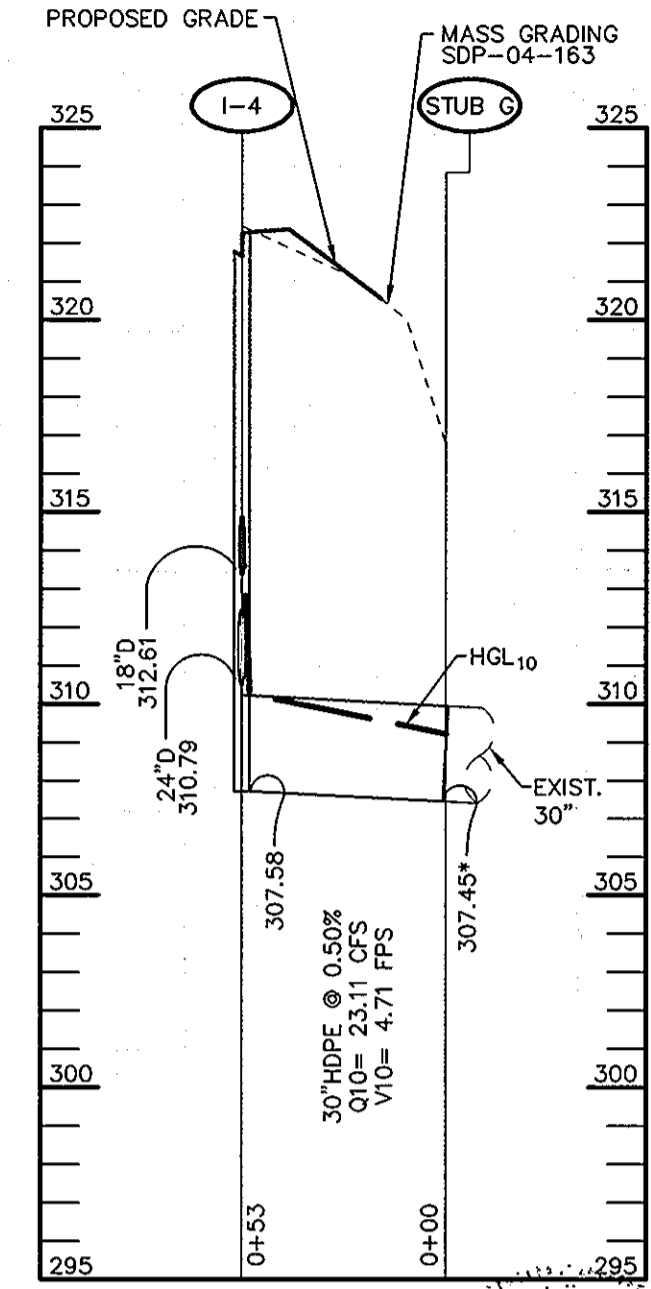
DATE: 6/26/06
DESIGNED BY: D.W.C.
DRAWN BY: EMR
PROJECT NO.: 11621/1-2
C902DET
DATE: JUNE 9, 2006
SCALE: AS SHOWN
DRAWING NO.: 10 OF 15



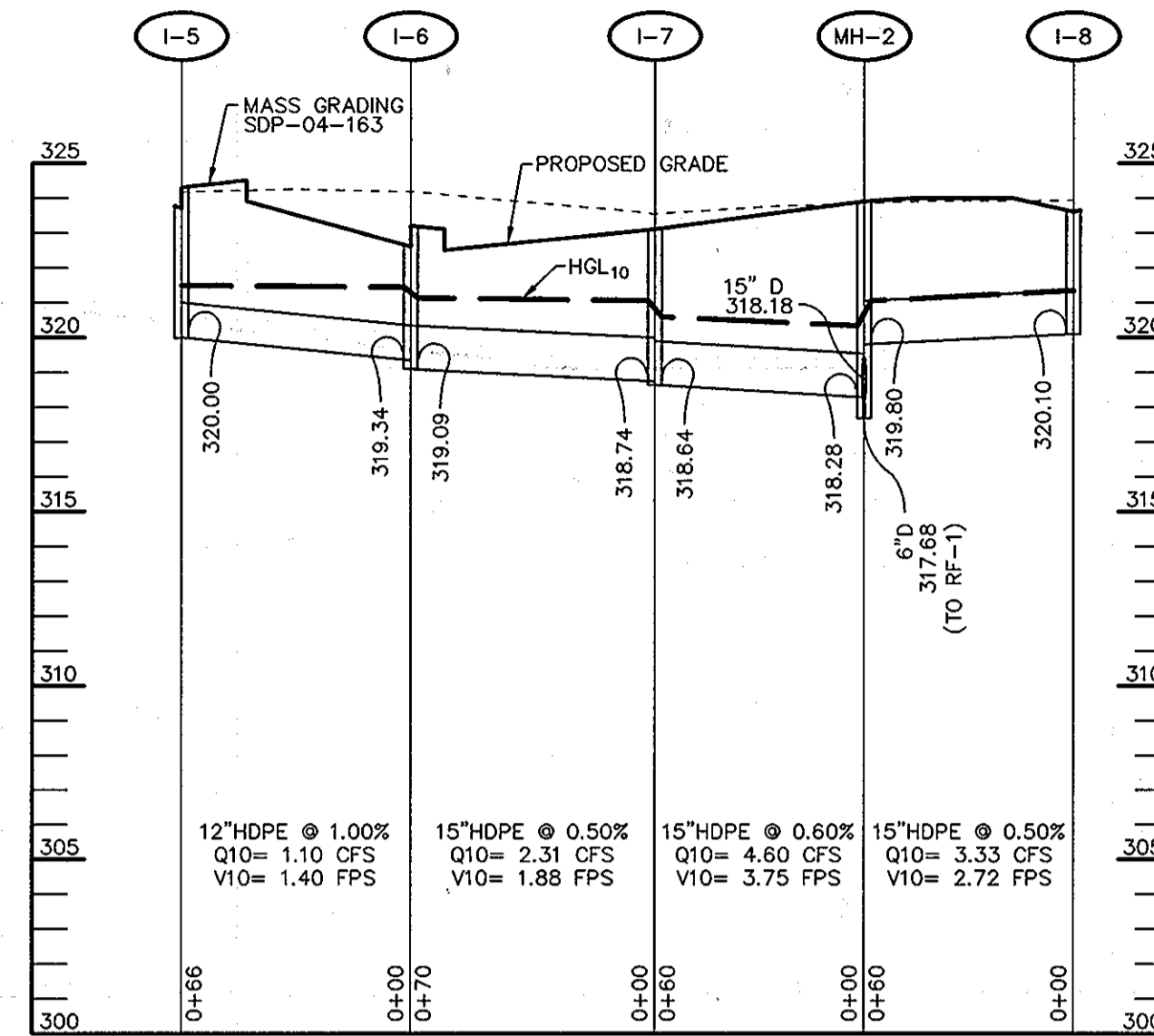
SDP-06-054



PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'



PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'



PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'

AS-BUILT
Shanabarger & Lane
SHANABARGER & LANE
8726 TOWN & COUNTRY BLVD.
SUITE 201
ELLCOTT CITY, MARYLAND 21043

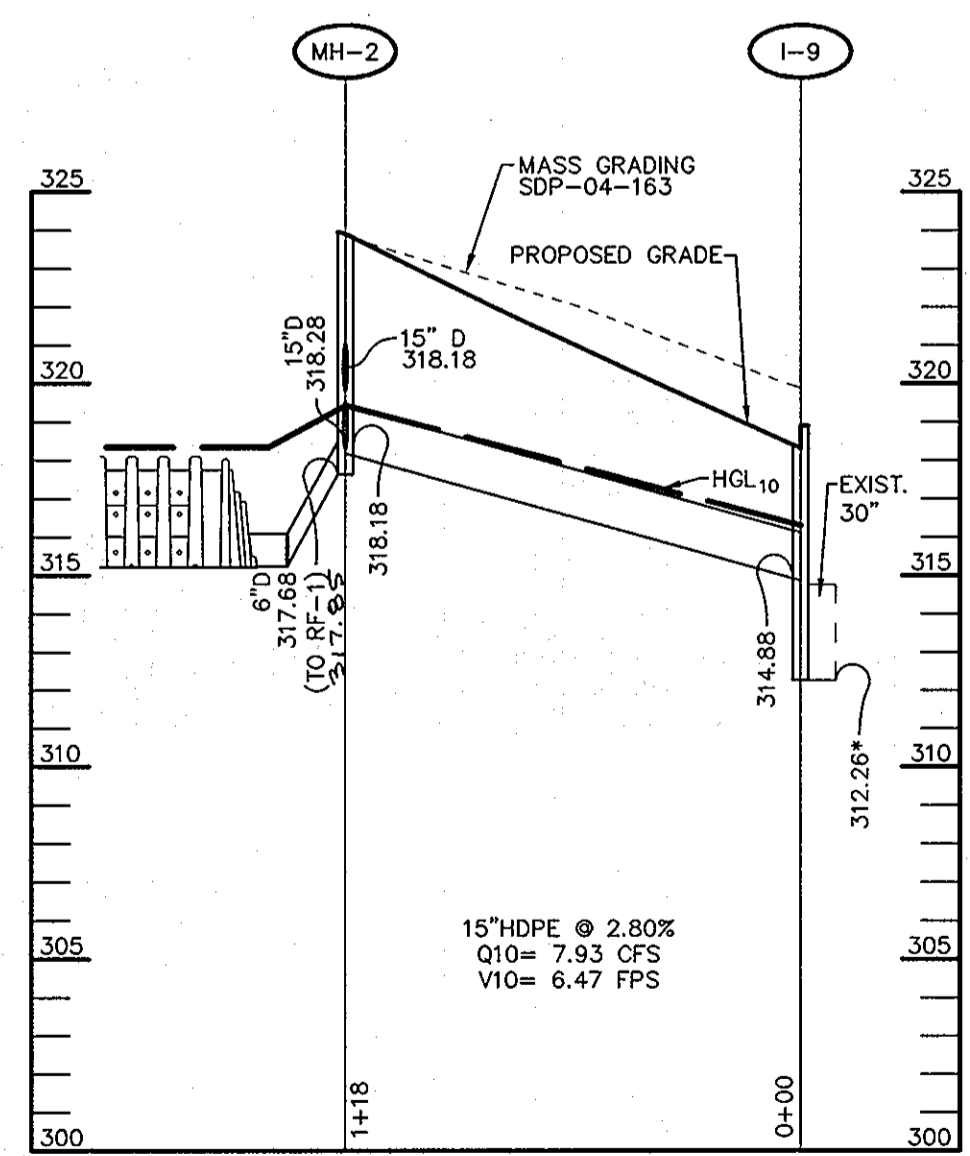


* CONNECT MH-1 TO EXIST. 30" STUB (STUB G) 25' FROM NEW MANHOLE AT ELEV. 307.45'

STRUCTURE SCHEDULE						
STRUCTURE	TYPE	LOCATION	INV. IN	INV. OUT	TOP	REMARKS
I-1	A-5	N 553191.0377 E 1370320.4061	-	314.90	318.6	HOCO STD. DETAIL SD- 4.40
I-2	A-5	N 553252.7414 E 553252.7414	314.59	314.49	318.4	HOCO STD. DETAIL SD- 4.40
I-3	A-5	N 553273.0320 E 1370312.3196	314.37	314.12	318.6	HOCO STD. DETAIL SD- 4.40
I-4	A-5	N 553423.7080 E 1370337.2589	312.61	307.72	321.0	HOCO STD. DETAIL SD- 4.40
I-5	A-5	N 553110.6359 E 1370418.7952	-	320.00	323.7	HOCO STD. DETAIL SD- 4.40
I-6	A-5	N 553045.7541 E 1370429.7398	319.34	319.09	322.6	HOCO STD. DETAIL SD- 4.40
I-7	A-5	N 552975.8595 E 1370433.1900	318.74	318.64	323.1	HOCO STD. DETAIL SD- 4.40
I-8	A-5	N 552876.1427 E 1370499.9476	-	320.1	323.6	HOCO STD. DETAIL SD- 4.40
I-9	A-5	N 552866.3891 E 1370364.4751	314.88	312.26 (EX.)	318.3	HOCO STD. DETAIL SD- 4.40
I-10	A-5	N 553047.9103 E 1370329.6105	-	315.00	318.2	HOCO STD. DETAIL SD- 4.40
I-11	A-5	N 552660.0898 E 1370644.5889	-	320.10	323.6	HOCO STD. DETAIL SD- 4.40
I-12	A-5	N 552759.7997 E 1370577.8359	319.5	319.40	323.6	HOCO STD. DETAIL SD- 4.40
I-13	A-5	N 552699.9852 E 1370475.8802	314.89 (I-12) 314.87 (I-14) 314.83 (I-15)	313.44	318.3	HOCO STD. DETAIL SD- 4.40
I-14	A-5	N 552768.8357 E 1370443.0207	-	315.90	319.2	HOCO STD. DETAIL SD- 4.40
I-15	A-5	N 552637.2156 E 1370507.0624	-	315.60	319.0	HOCO STD. DETAIL SD- 4.40
I-16	A-5	N 552507.4602 E 1370528.9508	-	315.35	318.5	HOCO STD. DETAIL SD- 4.40
I-17	A-5	N 552560.3730 E 1370711.3465	-	321.30	324.0	HOCO STD. DETAIL SD- 4.40
I-18	A-5	N 552452.5932 E 1370554.8543	316.85	315.75	319.7	HOCO STD. DETAIL SD- 4.40
I-21	DBL S	N 553125.2684 E 1370842.5087	322.00 (TD-2) 321.25 (TD-1)	320.75	325.0	HOCO STD. DETAIL SD- 4.23
I-22	DBL S	N 553013.7206 E 1370928.8646	323.20 (TD-3) 320.33 (I-21)	320.23	327.6	HOCO STD. DETAIL SD- 4.23
I-23	A-5	N 552783.5318 E 1371122.3165	325.56 (ROOF) 323.30 (TD-5)	323.20	328.1	HOCO STD. DETAIL SD- 4.40
I-24	S	N 552946.7990 E 1371006.2615	323.38 (ROOF) 320.95 (MH-5)	320.86	326.6	HOCO STD. DETAIL SD- 4.22
I-25	S	N 552896.2075 E 1371047.2854	323.74 (ROOF) 322.34 (I-23)	321.59	326.5	HOCO STD. DETAIL SD-4.23
M-2	4'-0" DIA.	N 552926.7163 E 1370467.6463	319.80 (I-8) 318.28 (I-7)	318.18	323.9	HOCO STD. DETAIL G-5.01
M-3(B)	5'-0" DIA.	N 552354.3956 E 1370563.0828	312.24	311.64 (EX.)	320.0	HOCO STD. DETAIL G-5.02
M-4	5'-0" DIA.	N 552982.6951 E 1370976.2368	320.39 (I-24) 319.75 (I-22)	319.65	328.1	HOCO STD. DETAIL G-5.02

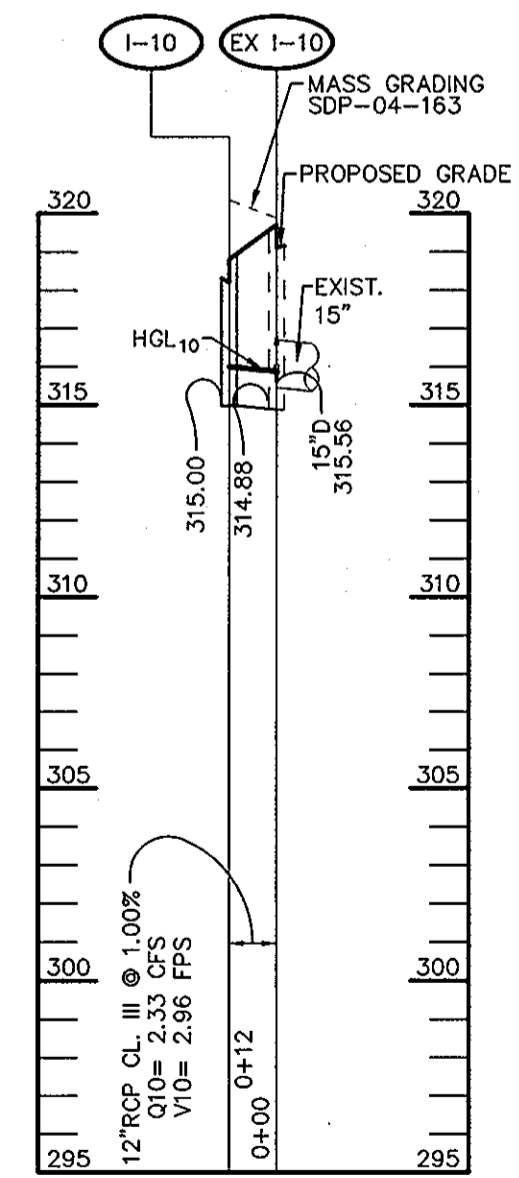
NOTES:
FOR END SECTIONS AND HEADWALLS THE LOCATION IS CENTER OF THROAT OPENING AT FACE OF STRUCTURE.
LOCATION OF INLETS AND MANHOLES IS AT CENTER OF TOP COVER; FOR "A" INLETS LOCATION IS GIVEN FOR CENTER OF THROAT OPENING AT FACE OF CURB.

APPROVED
PLANNING BOARD
of HOWARD COUNTY
DATE 6-08-06

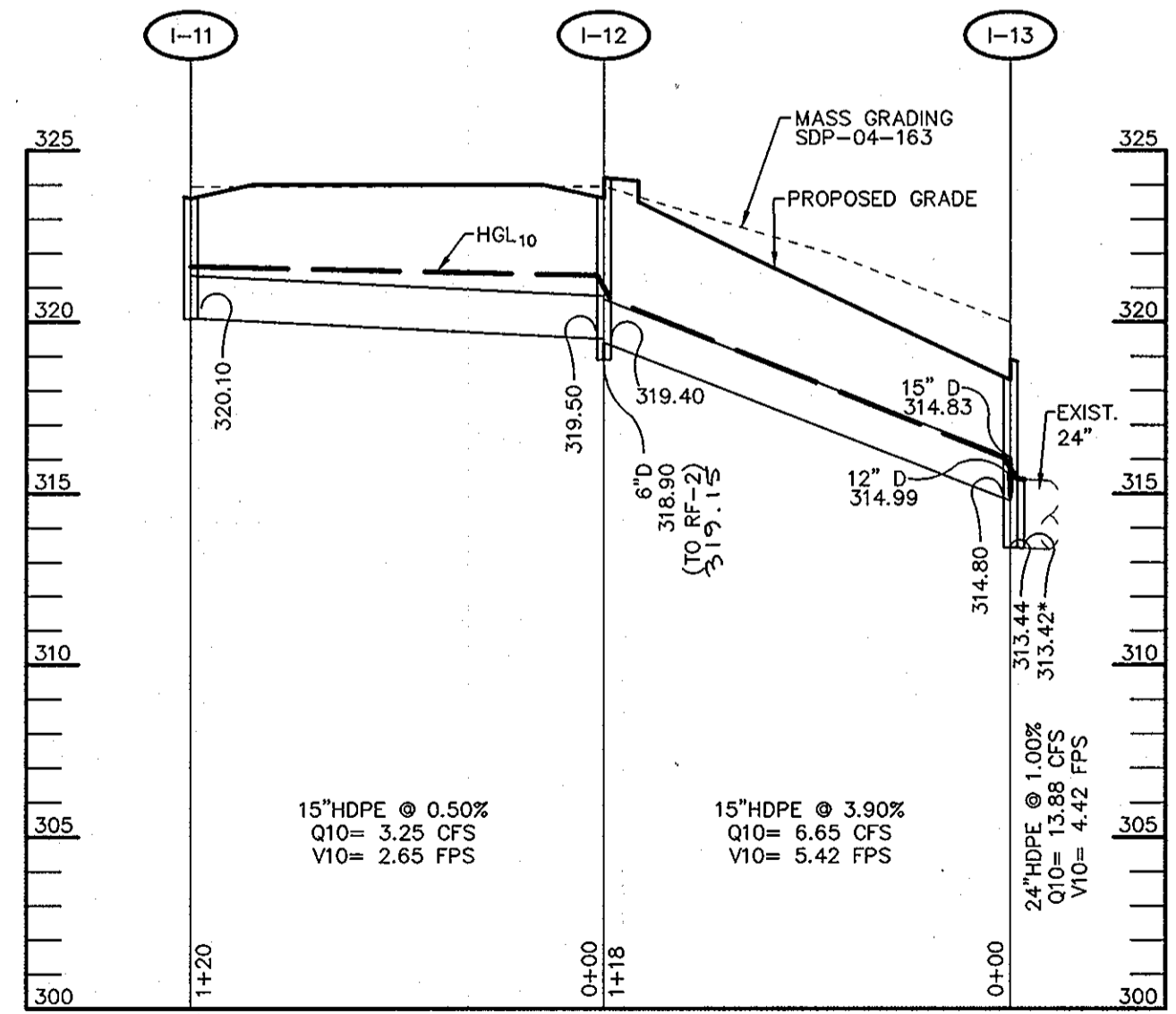


PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'

* I-9 SHALL BE CONSTRUCTED ON THE EXIST. 30" STUB. INV. = 312.26



PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'



PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'

* CONNECT I-13 TO EXIST. 24" STUB, 2' FROM NEW INLET AT ELEV. 313.42

PIPE SCHEDULE

PIPE LENGTH (FT)	SIZE	TYPE
918	6" PERF.	PVC
792	6"	PVC
75	8"	PVC
594	12"	HDPE
887	15"	HDPE
165	18"	HDPE
274	24"	HDPE
375	30"	HDPE
12	12"	RCP CL. III

APPROVED : HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.
Frank DeLuca 6/8/06
DIRECTOR DATE
Chris Klauter 6/8/06
CHIEF, DEVELOPMENT ENGINEERING DIVISION DATE
Chris Klauter 6/8/06
CHIEF, DIVISION OF LAND DEVELOPMENT DATE

DATE	NO.	REVISION

OWNER / DEVELOPER
HRD LAND HOLDINGS, INC.
HOWARD RESEARCH AND DEVELOPMENT CORPORATION
THE ROUSE BUILDING
10275 LITTLE PATUXENT PARKWAY
COLUMBIA, MARYLAND 21044
410-992-6000

PROJECT **GATEWAY OVERLOOK**
BENSON EAST PARCEL R
ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F

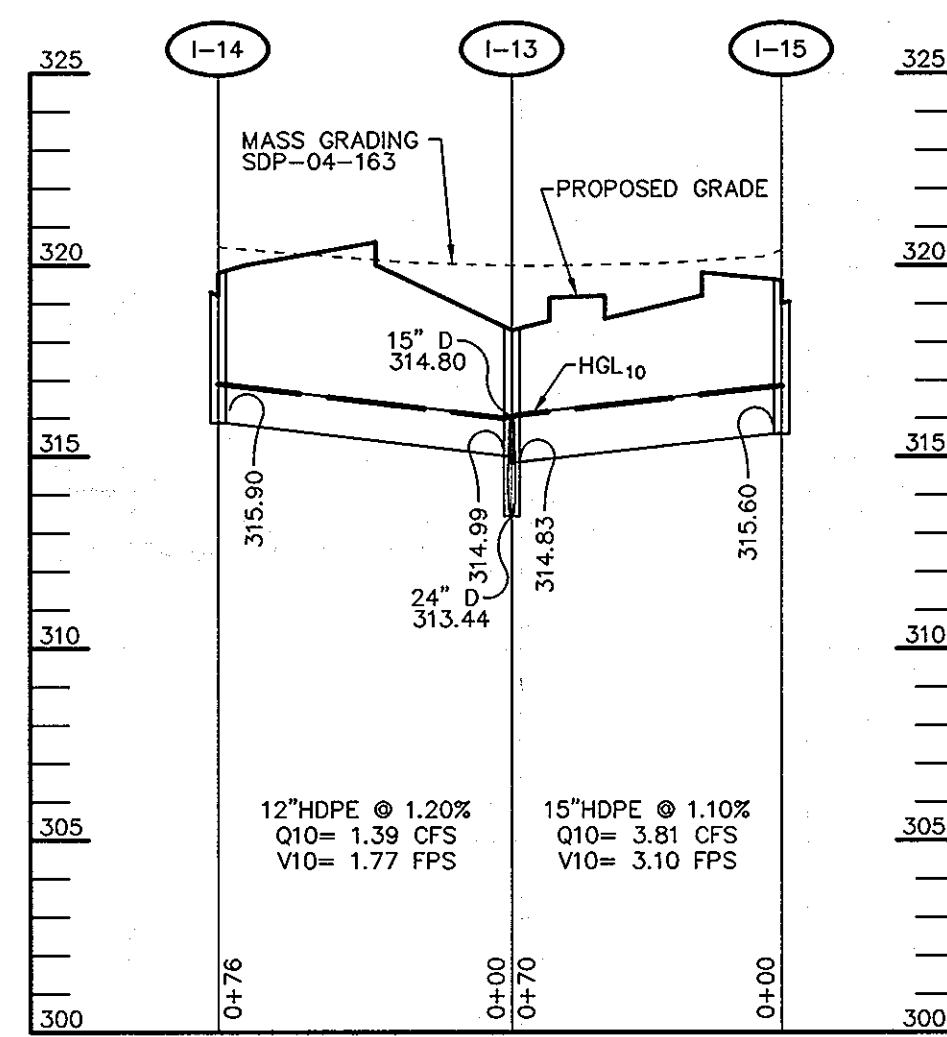
AREA TAX MAP 37 & 43 ZONED - NEWTOWN
BENSON EAST PARCEL R PLAT NO. 17876
6th ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

TITLE **STORM SEWER PROFILES**

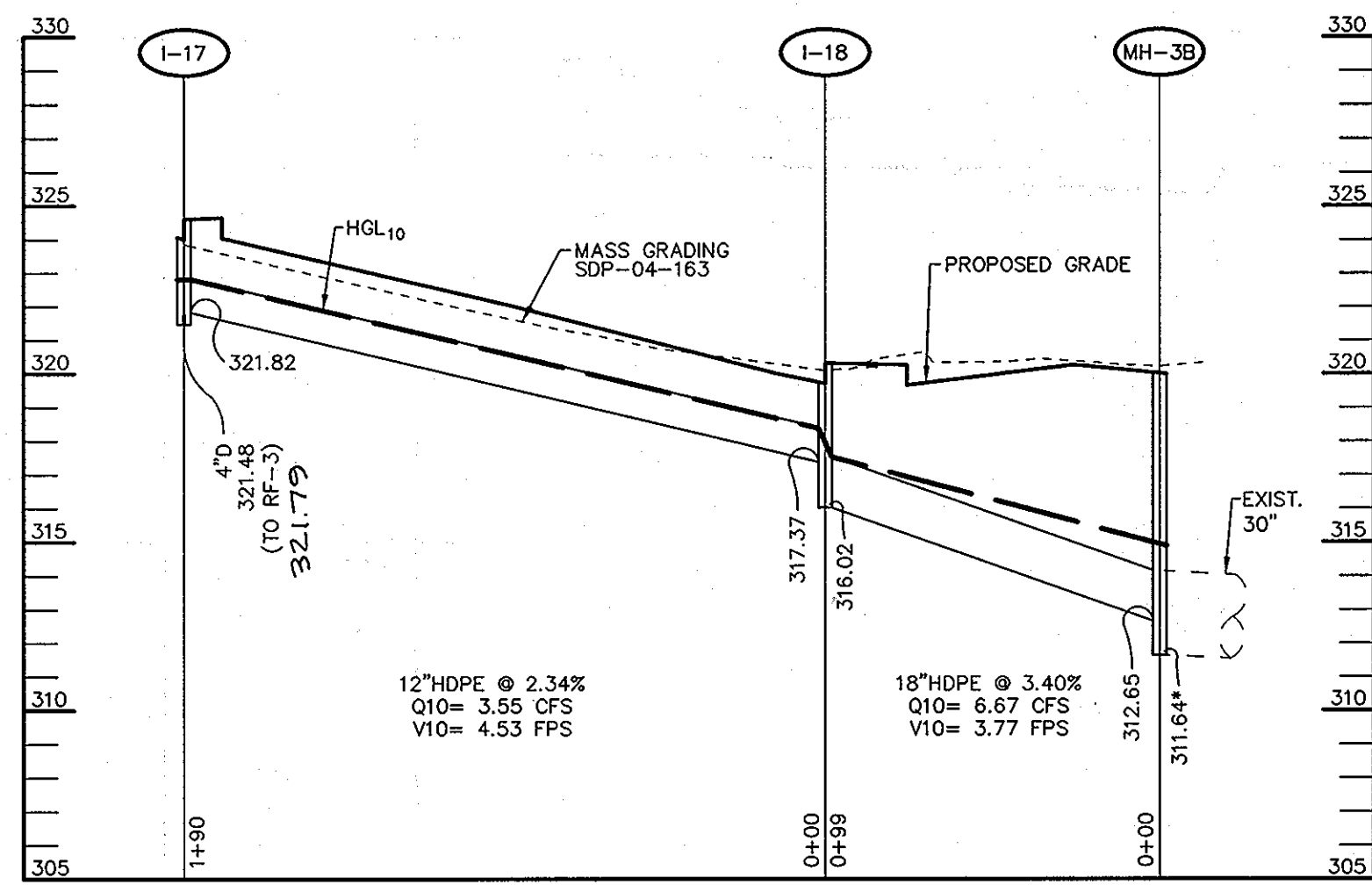
Patton Harris Rust & Associates,pc
Engineers, Surveyors, Planners, Landscape Architects.
1 Windsor, Suite 201A
Allentown, PA 18195
T 610.395.7033
F 610.395.5811

DESIGNED BY : D.W.C.
DRAWN BY: EMR
PROJECT NO : 11621/1-2
DATE : JUNE 9, 2006
SCALE : AS SHOWN
DRAWING NO. 11 OF 15

DOMENICK W. COLANGELO #27200

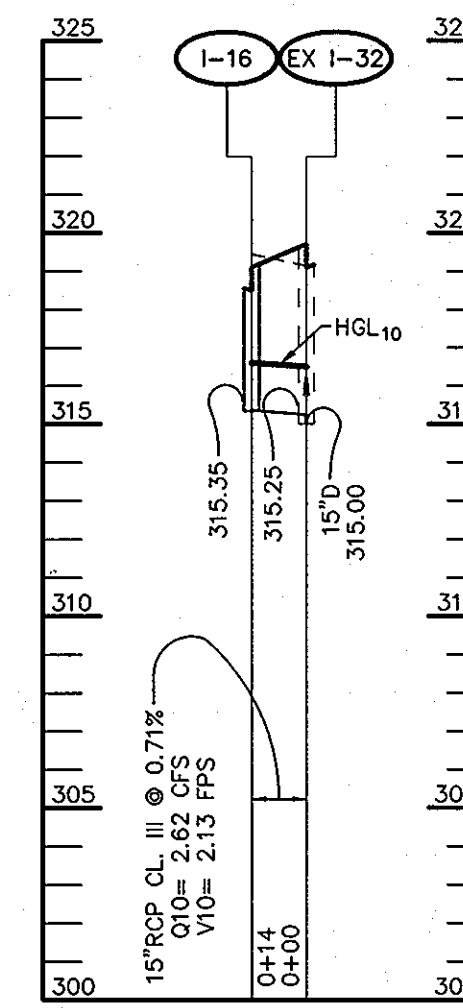


PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'



PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'

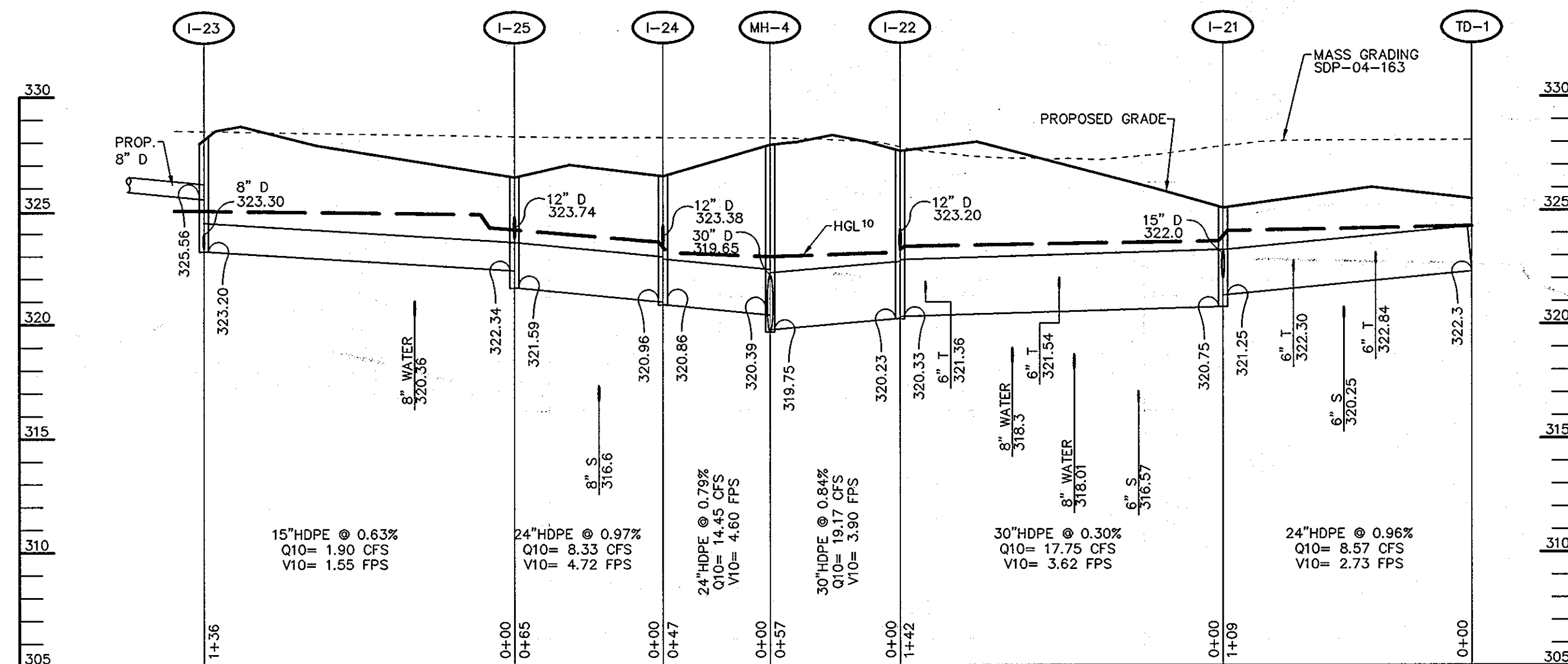
* CONSTRUCT MH-3B ON 30" STUB PROVIDED
LOWE'S HOME CENTER, INC. INV = 311.64



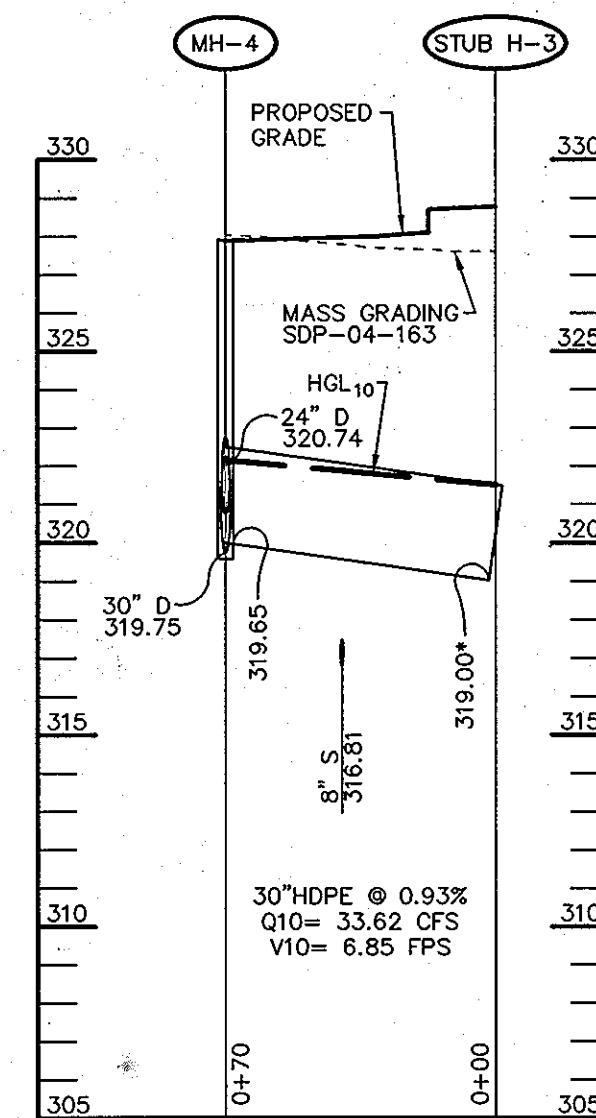
PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'

AS-BUILT
Gregory Scott Shuman
SHANABERGER & LANG
8726 TOWN & COUNTRY BLVD.
SUITE 201
ELLCOTT CITY, MARYLAND 21043

APPROVED
PLANNING BOARD
of HOWARD COUNTY
DATE 6-08-06



PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'

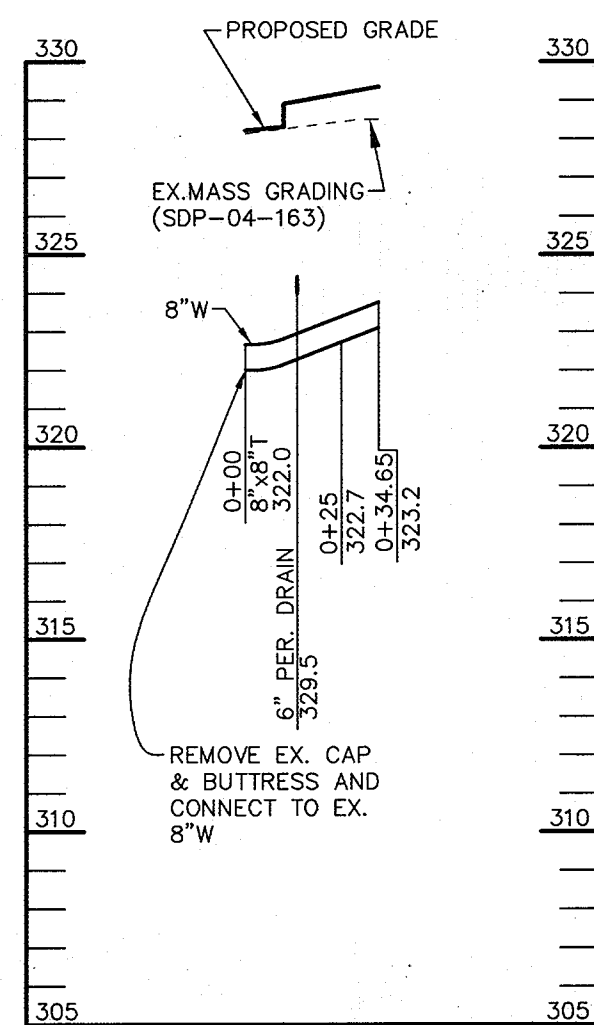


PROFILE
SCALE:
HOR.-1"=50'
VERT.-1"=5'

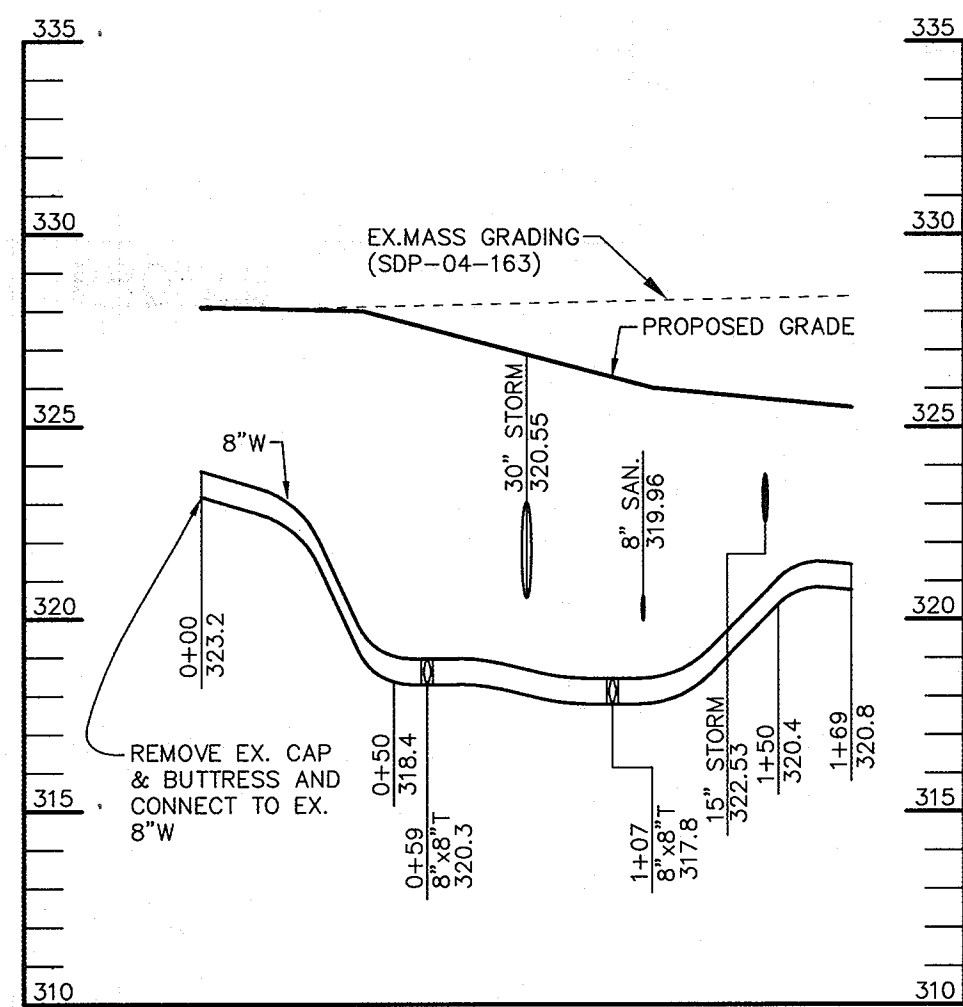
* CONNECT MH-4 TO THE EXISTING 30" STUB H-3,
INV = 319.00, AS SHOWN ON F-05-058

APPROVED : HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.	
<i>Paula de Luyck</i> DIRECTOR	5/2/06 DATE
<i>Gregory Scott Shuman</i> CHIEF, DEVELOPMENT ENGINEERING DIVISION	5/2/06 DATE
<i>Gregory Scott Shuman</i> CHIEF, DIVISION OF LAND DEVELOPMENT	5/2/06 DATE
DATE	NO. REVISION
OWNER / DEVELOPER HRD LAND HOLDINGS, INC. HOWARD RESEARCH AND DEVELOPMENT CORPORATION THE ROUSE BUILDING 10275 LITTLE PATUXENT PARKWAY COLUMBIA, MARYLAND 21044 410-992-6000	
PROJECT GATEWAY OVERLOOK BENSON EAST PARCEL R ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F	
AREA TAX MAP 37 & 43 ZONED - NEWTOWN BENSON EAST PARCEL R PLAT NO. 17876 6th ELECTION DISTRICT HOWARD COUNTY, MARYLAND	
TITLE STORM SEWER PROFILES	
Patton Harris Rust & Associates,pc Engineers. Surveyors. Planners. Landscape Architects. PHRA 1 Windsor, Suite 201A 7535 Windsor Drive Allentown, PA 18195 T 610.395.7033 F 610.395.5811	
<i>Gregory Scott Shuman</i> DATE	DESIGNED BY : D.W.C.
<i>Gregory Scott Shuman</i> DATE	DRAWN BY: EMR
<i>Gregory Scott Shuman</i> DATE	PROJECT NO : 11621/1-2 C700PRO
<i>Gregory Scott Shuman</i> DATE	DATE : JUNE 9, 2006
<i>Gregory Scott Shuman</i> DATE	SCALE : AS SHOWN
<i>Gregory Scott Shuman</i> DATE	DRAWING NO. 12 OF 15

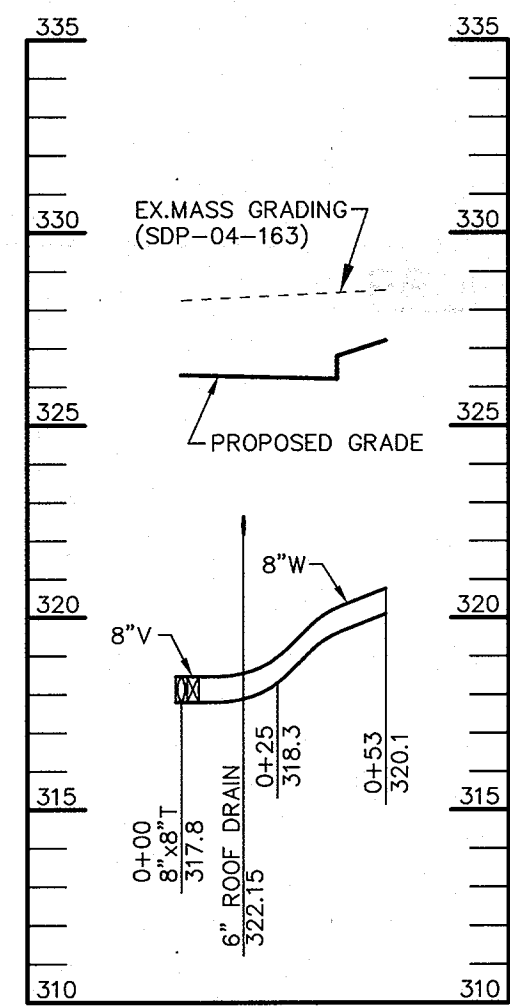
SDP-06-054



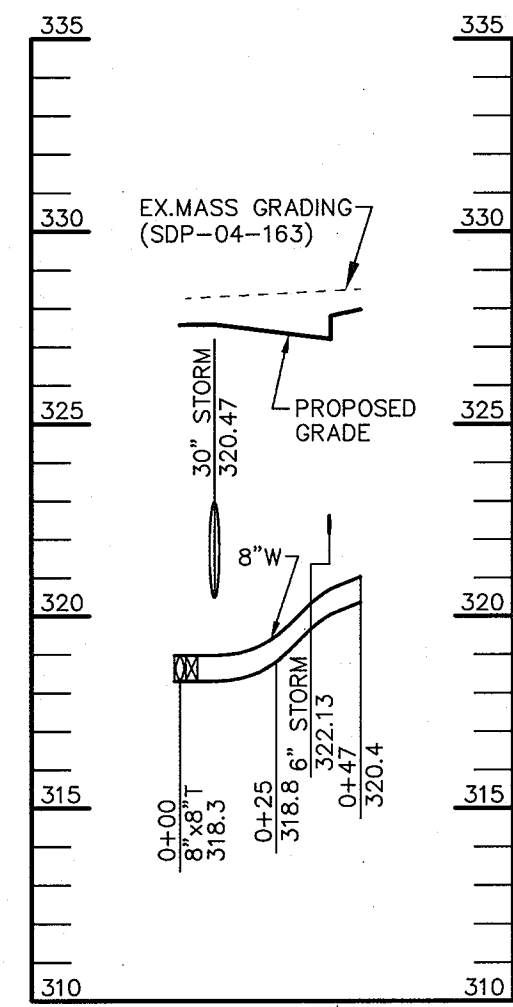
PROFILE #1
SCALE:
HOR.-1"=50'
VERT.-1"=5'



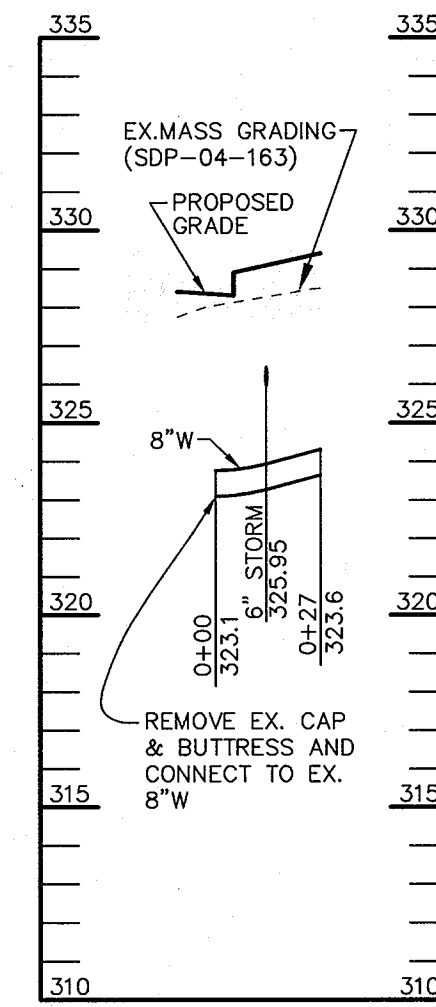
PROFILE #2
SCALE:
HOR.-1"=50'
VERT.-1"=5'



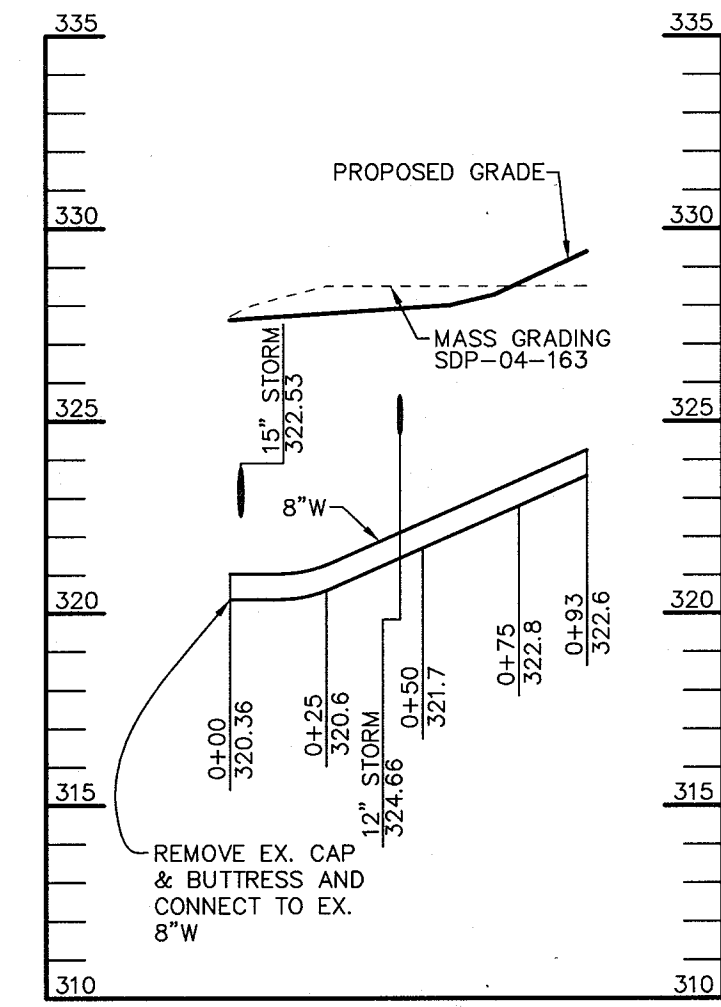
PROFILE #3
SCALE:
HOR.-1"=50'
VERT.-1"=5'



PROFILE #4
SCALE:
HOR.-1"=50'
VERT.-1"=5'



PROFILE #5
SCALE:
HOR.-1"=50'
VERT.-1"=5'



PROFILE #6
SCALE:
HOR.-1"=50'
VERT.-1"=5'

APPROVED
PLANNING BOARD
of HOWARD COUNTY
DATE 6-08-06

APPROVED : HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.
Frank DiGreggio 6/8/06
DIRECTOR DATE
[Signature] 6/8/06
CHIEF, DEVELOPMENT ENGINEERING DIVISION DATE
[Signature] 6/8/06
CHIEF, DIVISION OF LAND DEVELOPMENT DATE

DATE	NO.	REVISION
OWNER / DEVELOPER HRD LAND HOLDINGS, INC. HOWARD RESEARCH AND DEVELOPMENT CORPORATION THE ROUSE BUILDING 10275 LITTLE PATUXENT PARKWAY COLUMBIA, MARYLAND 21044 410-992-6000		
PROJECT GATEWAY OVERLOOK BENSON EAST PARCEL R ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F		
AREA TAX MAP 37 & 43 ZONED - NEWTOWN BENSON EAST PARCEL R PLAT NO. 17876 6th ELECTION DISTRICT HOWARD COUNTY, MARYLAND		
TITLE WATER PROFILES		

Patton Harris Rust & Associates, pc
Engineers. Surveyors. Planners. Landscape Architects.
PHRA
1 Windsor, Suite 201A
7535 Windsor Drive
Allentown, PA 18195
T 610.395.7033
F 610.395.5811

alpe/bc
DATE
DESIGNED BY : D.W.C.
DRAWN BY: EMR
PROJECT NO : 11621/1-2
C700PRO
DATE : JUNE 9, 2006
SCALE : AS SHOWN
DRAWING NO. 13 OF 15
DOMENIC W. COLANGELO #27200

P:\Project\11621\1-2\Draw\Plan\SDP06-054.dwg, 6/8/2006 11:46:55 AM



RETAIL CENTER/ PARCEL R - LANDSCAPE TABLE

CATEGORY	QUANTITIES
Commercial Area	11.8 Acres
Trees Required @ 20 Trees / Acre**	236
Number of Site Trees Provided	
Shade Trees	118
24 Evergreen Trees @ 2:1*	12
24 Ornamental Trees @ 2:1*	12
940 Shrubs @ 10:1*	94
Total Site Trees Provided	236

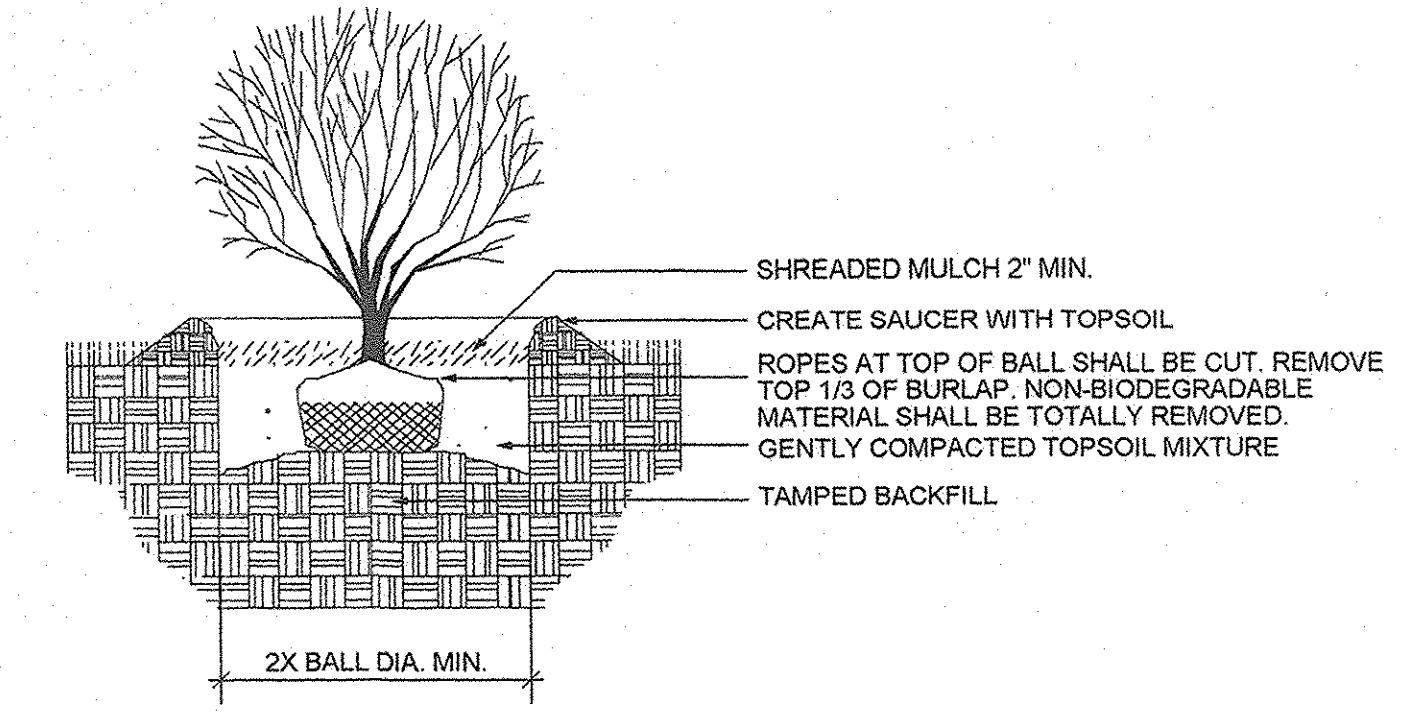
*Two evergreen or ornamental trees may be substituted for one shade tree, or ten shrubs may be substituted for one shade tree.
 **Plant requirements are in accordance with the 'Columbia Office and Commercial Design Guidelines, part V Landscape Design'.

LEGEND

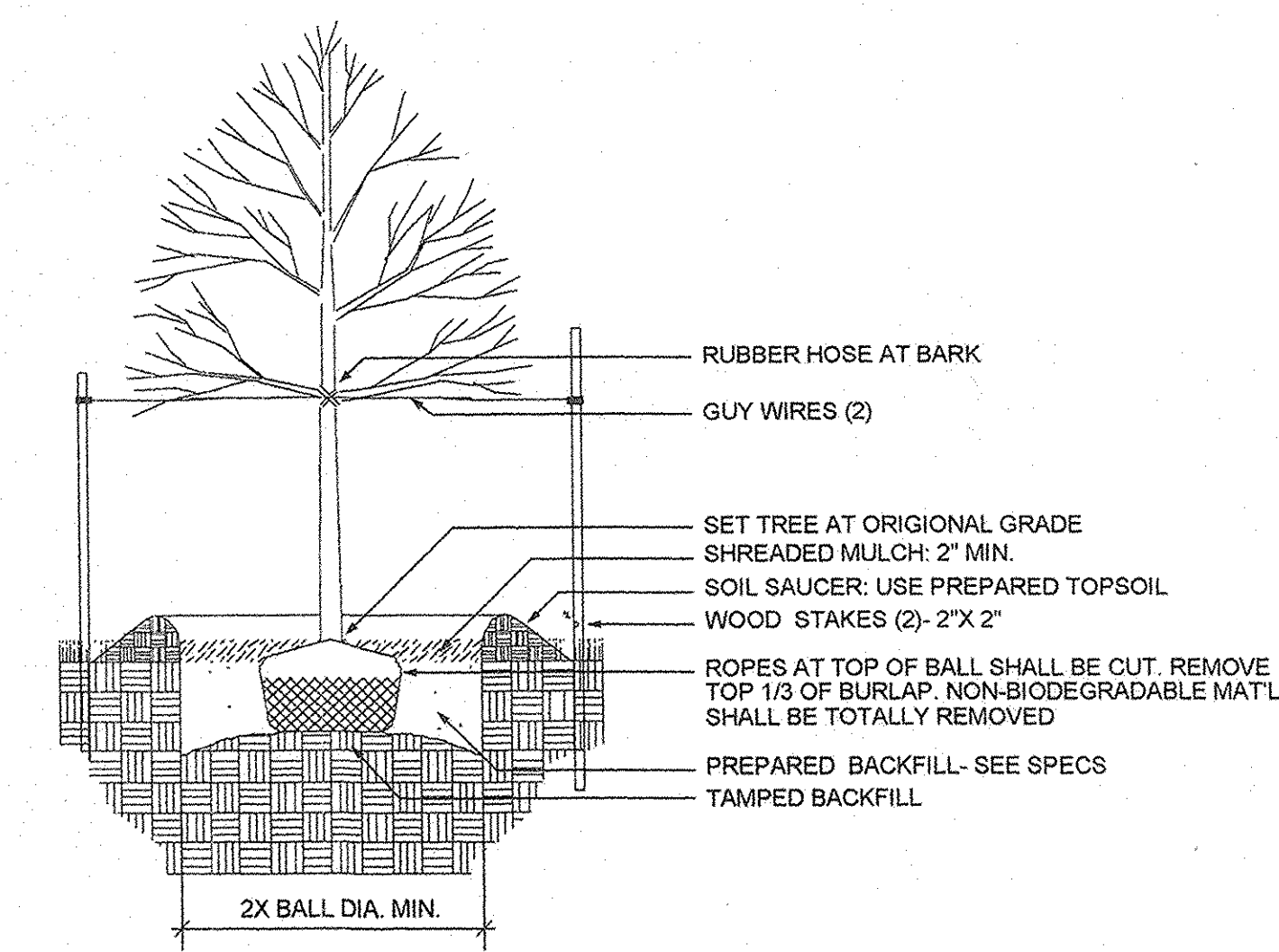
	Public Utility Easement
	Private Utility Easement

PLANT LIST

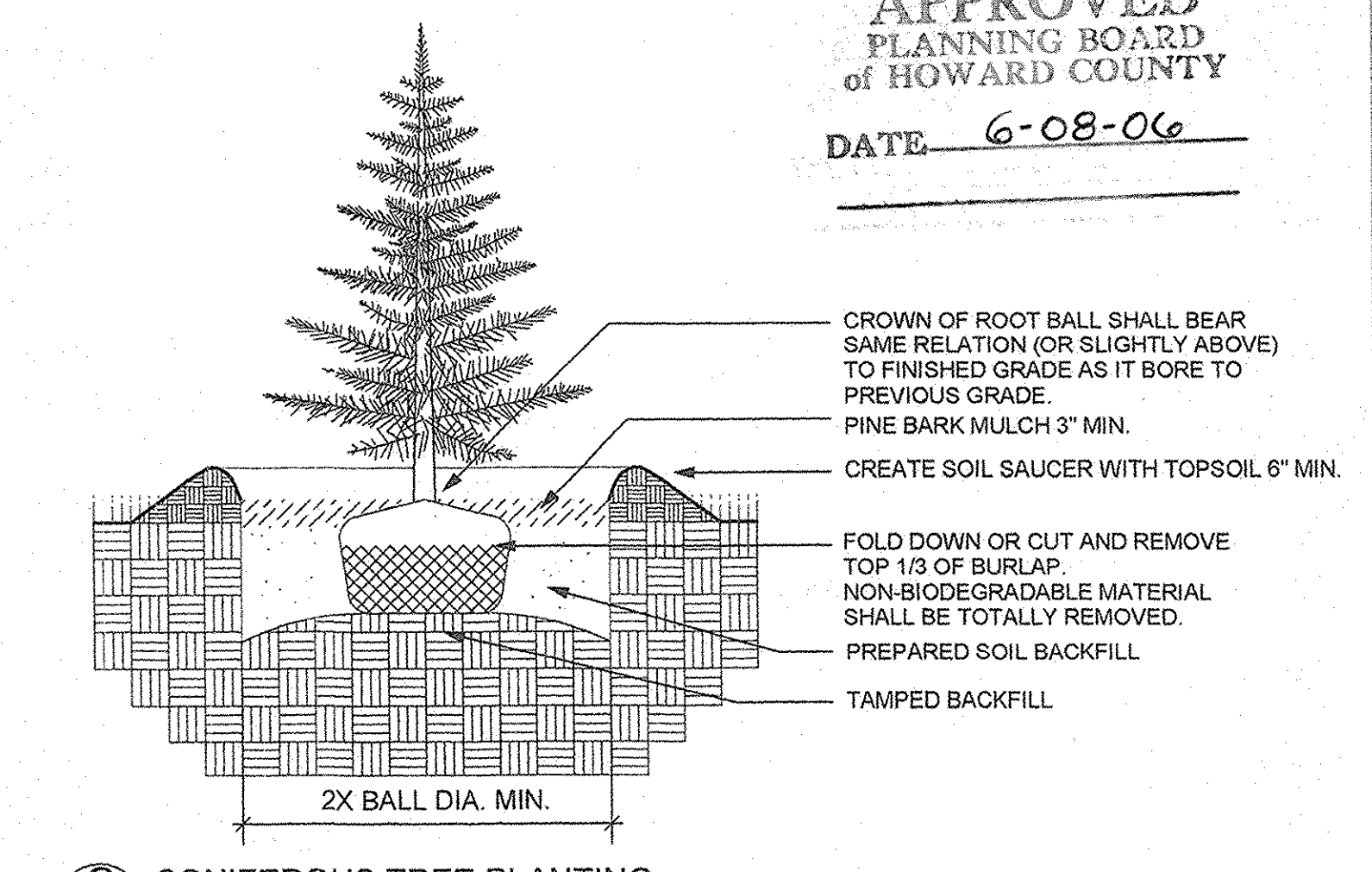
Quan.	Symbol	Botanical Name	Common Name	Size
Trees				
8	HLS	Gleditsia triacanthos inermis 'Skyline'	Skyline Honeylocust	2 - 2 1/2" cal.
44	PCC	Pyrus callervana 'Cleveland Select'	Cleveland Select	2 - 2 1/2" cal.
7	QPA	Quercus palustris	Pin Oak	2 - 2 1/2" cal.
59	ZVG	Zelkova serrata 'Village Green'	Japanese Zelkova	2 - 2 1/2" cal.
Ornamentals				
24	WCH	Prunus cerasifera 'Thundercloud'	Purpleleaf Plum	2 - 2 1/2" cal.
Evergreen				
6	LC	Cyprinoscopis leylandii	Leyland Cypress	6-7' hgt.
18	NS	Picea abies	Norway Spruce	6-7' hgt.
Shrubs				
104	EAC	Euonymus alatus 'Compacta'	Dwarf Winged Euonymus	18-24"
410	GVB	Buxus x 'Green Velvet'	Green Velvet Boxwood	18-24"
348	JCF	Juniperus conferta	Shore Juniper	15-18"
78	TMD	Taxus media densiformis	Densiformis Yew	24-30"



A SHRUB PLANTING
not to scale



B DECIDUOUS TREE PLANTING
not to scale



C CONIFEROUS TREE PLANTING
not to scale

APPROVED
PLANNING BOARD
of HOWARD COUNTY
DATE: 6-08-06

GENERAL NOTES:
 THIS PLAN HAS BEEN PREPARED IN ACCORDANCE WITH THE PROVISIONS OF SECTION 16.124 OF THE HOWARD COUNTY CODE AND THE LANDSCAPE MANUAL.

FINANCIAL SURETY FOR THE REQUIRED LANDSCAPING HAS BEEN POSTED AS PART OF THE DPW DEVELOPER'S AGREEMENT IN THE AMOUNT OF \$300 X 118 SHADE TREES, \$150 X 24 EVERGREEN TREES AND \$30 X 940 SHRUBS FOR A TOTAL OF: \$67,200.00 SURETY POSTED WITH THE DEVELOPER'S AGREEMENT.

BY THE DEVELOPER:
 I/WE CERTIFY THAT ALL DEVELOPMENT AND CONSTRUCTION WILL BE DONE ACCORDING TO THIS PLAN, AND THAT ANY 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 INSPECTIONS BY THE HOWARD SOIL CONSERVATION DISTRICT.
 DEVELOPER: *Paul G. Casper* DATE: 6/2/06

BY THE ENGINEER:
 I 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.
 ENGINEER: *Paul W. C. C. C.* DATE: 6/2/06

THESE PLANS HAVE BEEN REVIEWED FOR THE HOWARD SOIL CONSERVATION DISTRICT AND MEET THE TECHNICAL REQUIREMENTS FOR SOIL EROSION AND SEDIMENT CONTROL.
 NATURAL RESOURCES CONSERVATION SERVICE DATE: 6/2/06

THIS DEVELOPMENT PLAN IS APPROVED FOR SOIL EROSION AND SEDIMENT CONTROL BY THE HOWARD SOIL CONSERVATION DISTRICT.
 HOWARD SOIL CONSERVATION DISTRICT DATE: 6/2/06

APPROVED: HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.
 DIRECTOR: *Janice M. Layle* DATE: 6/8/06
 CHIEF, DEVELOPMENT ENGINEERING DIVISION: *[Signature]* DATE: 6/8/06
 CHIEF, DIVISION OF LAND DEVELOPMENT: *[Signature]* DATE: 6/8/06

2/22/07 1 REV. RETAIL 'A' SF
 DATE NO. REVISION
 OWNER / DEVELOPER: HRD LAND HOLDINGS, INC., HOWARD RESEARCH AND DEVELOPMENT CORPORATION, THE ROUSE BUILDING, 10275 LITTLE PATIENT PARKWAY, COLUMBIA, MARYLAND 21044, 410-992-6000

PROJECT: GATEWAY OVERLOOK, BENSON EAST PARCEL R
 AREA: TAX MAP 37 & 43 ZONED - NEWTOWN, BENSON EAST PARCEL R PLAT NO. 6th ELECTION DISTRICT, HOWARD COUNTY, MARYLAND
 TITLE: LANDSCAPE PLAN

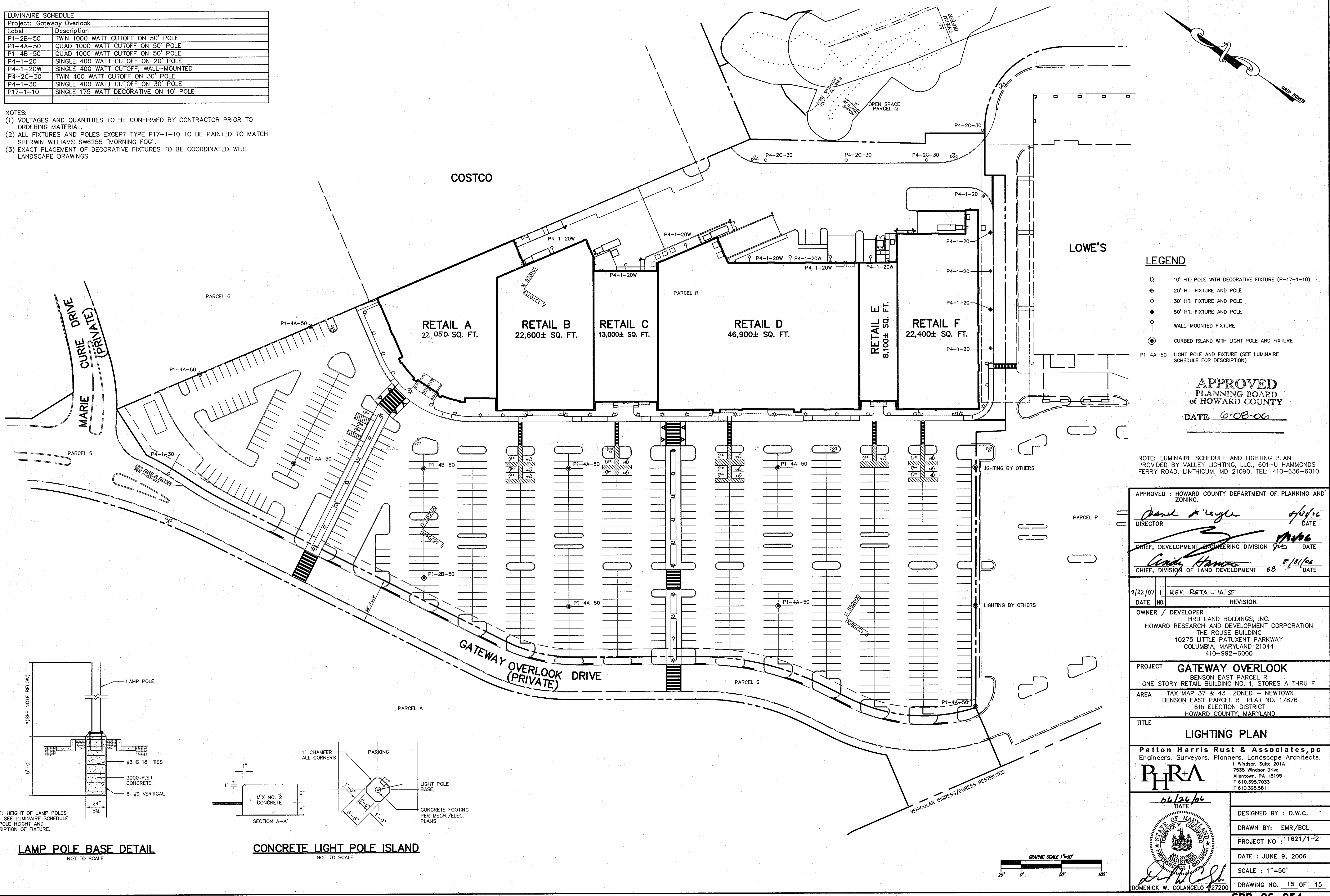
Patton Harris Rust & Associates, p.c.
 Engineers, Surveyors, Planners, Landscape Architects.
 1 Windsor, Suite 201A, 7535 Windsor Drive, Allentown, PA 18195, T 610.395.7033, F 610.395.5811

PLAN PREPARED BY:
SLATER ASSOCIATES, INC.
 5500 Stortz Place, Suite 502, Columbia, Maryland 21044, phone 410.992.0001, fax 410.992.0212, slater@slaterassoc.com, website: www.slaterassociates.com

JUNE 9, 2006
 DATE
 DESIGNED BY: NHC
 DRAWN BY: AJB
 PROJECT NO: 11621/1-2
 DATE: JUNE 9, 2006
 REV. DATE:
 SCALE: 1" = 50'-0"
 DRAWING NO. 14 OF 15

LUMINAIRE SCHEDULE	
Project: Gateway Overlook	
Label	Description
P1-2B-50	TWIN 1000 WATT CUTOFF ON 50' POLE
P1-4A-50	QUAD 1000 WATT CUTOFF ON 50' POLE
P1-4B-50	QUAD 1000 WATT CUTOFF ON 50' POLE
P4-1-20	SINGLE 400 WATT CUTOFF ON 20' POLE
P4-1-20W	SINGLE 400 WATT CUTOFF, WALL-MOUNTED
P4-2C-30	TWIN 400 WATT CUTOFF ON 30' POLE
P4-1-30	SINGLE 400 WATT CUTOFF ON 30' POLE
P17-1-10	SINGLE 175 WATT DECORATIVE ON 10' POLE

NOTES:
 (1) VOLTAGES AND QUANTITIES TO BE CONFIRMED BY CONTRACTOR PRIOR TO ORDERING MATERIAL.
 (2) ALL FIXTURES AND POLES EXCEPT TYPE P17-1-10 TO BE PAINTED TO MATCH SHERWIN WILLIAMS SW6255 "MORNING FOG".
 (3) EXACT PLACEMENT OF DECORATIVE FIXTURES TO BE COORDINATED WITH LANDSCAPE DRAWINGS.



LEGEND

- ☆ 10' HT. POLE WITH DECORATIVE FIXTURE (P-17-1-10)
- ⊕ 20' HT. FIXTURE AND POLE
- 30' HT. FIXTURE AND POLE
- 50' HT. FIXTURE AND POLE
- (with horizontal line) WALL-MOUNTED FIXTURE
- ⊙ (with vertical line) CURBED ISLAND WITH LIGHT POLE AND FIXTURE
- P1-4A-50 LIGHT POLE AND FIXTURE (SEE LUMINAIRE SCHEDULE FOR DESCRIPTION)

APPROVED
 PLANNING BOARD
 of HOWARD COUNTY
 DATE 6-08-06

NOTE: LUMINAIRE SCHEDULE AND LIGHTING PLAN PROVIDED BY VALLEY LIGHTING, LLC., 601-U HAMMONDS FERRY ROAD, LINTHICUM, MD 21090, TEL: 410-636-6010.

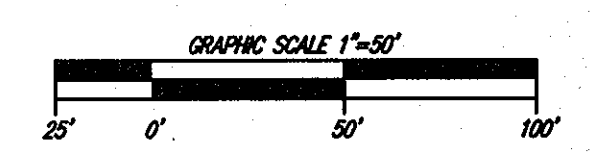
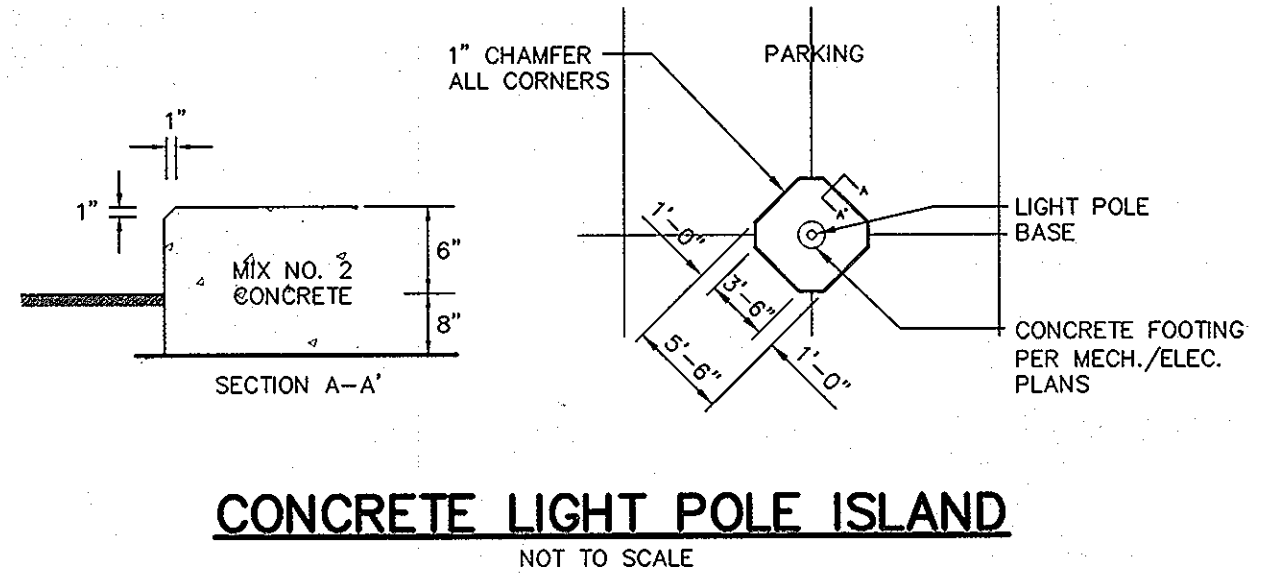
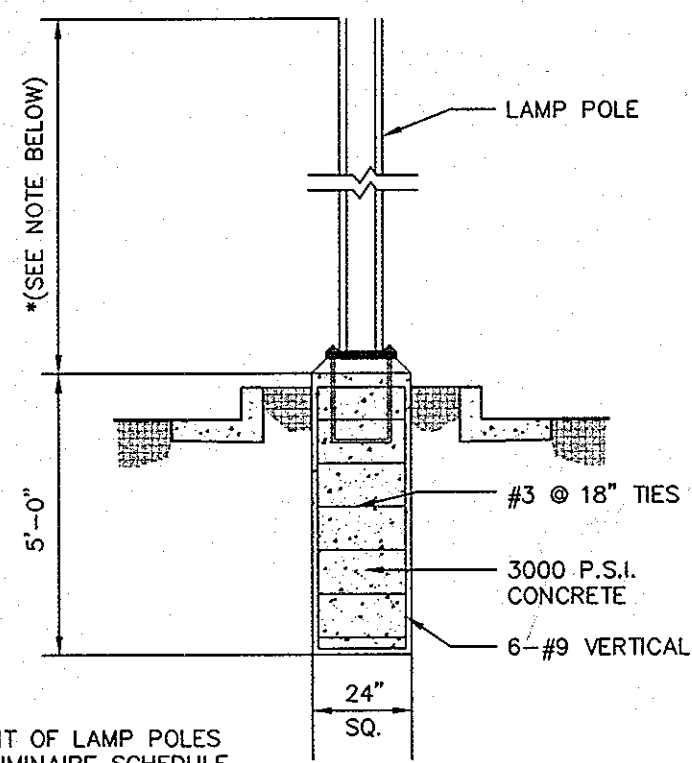
APPROVED : HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING.	
<i>Frank A. Leyle</i>	6/8/06
DIRECTOR	DATE
<i>[Signature]</i>	6/25/06
CHIEF, DEVELOPMENT ENGINEERING DIVISION	DATE
<i>[Signature]</i>	6/25/06
CHIEF, DIVISION OF LAND DEVELOPMENT	DATE

9/22/07	1	REV. RETAIL 'A' SF
DATE	NO.	REVISION
OWNER / DEVELOPER		
HRD LAND HOLDINGS, INC.		
HOWARD RESEARCH AND DEVELOPMENT CORPORATION		
THE ROUSE BUILDING		
10275 LITTLE PATUXENT PARKWAY		
COLUMBIA, MARYLAND 21044		
410-992-6000		

PROJECT	GATEWAY OVERLOOK
AREA	BENSON EAST PARCEL R ONE STORY RETAIL BUILDING NO. 1, STORES A THRU F
TITLE	TAX MAP 37 & 43 ZONED - NEWTOWN BENSON EAST PARCEL R PLAT NO. 17876 6th ELECTION DISTRICT HOWARD COUNTY, MARYLAND

Patton Harris Rust & Associates, PC
 Engineers. Surveyors. Planners. Landscape Architects.
 1 Windsor, Suite 201A
 7535 Windsor Drive
 Allentown, PA 18195
 T 610.395.7033
 F 610.395.5811

DESIGNED BY :	D.W.C.
DRAWN BY :	EMR/BCL
PROJECT NO :	11621/1-2
DATE :	JUNE 9, 2006
SCALE :	1"=50'
DRAWING NO. :	15 OF 15



P:\Project\11621-15\Eng\Plan\12010.Dwg, 6/26/2006 11:48:34 AM