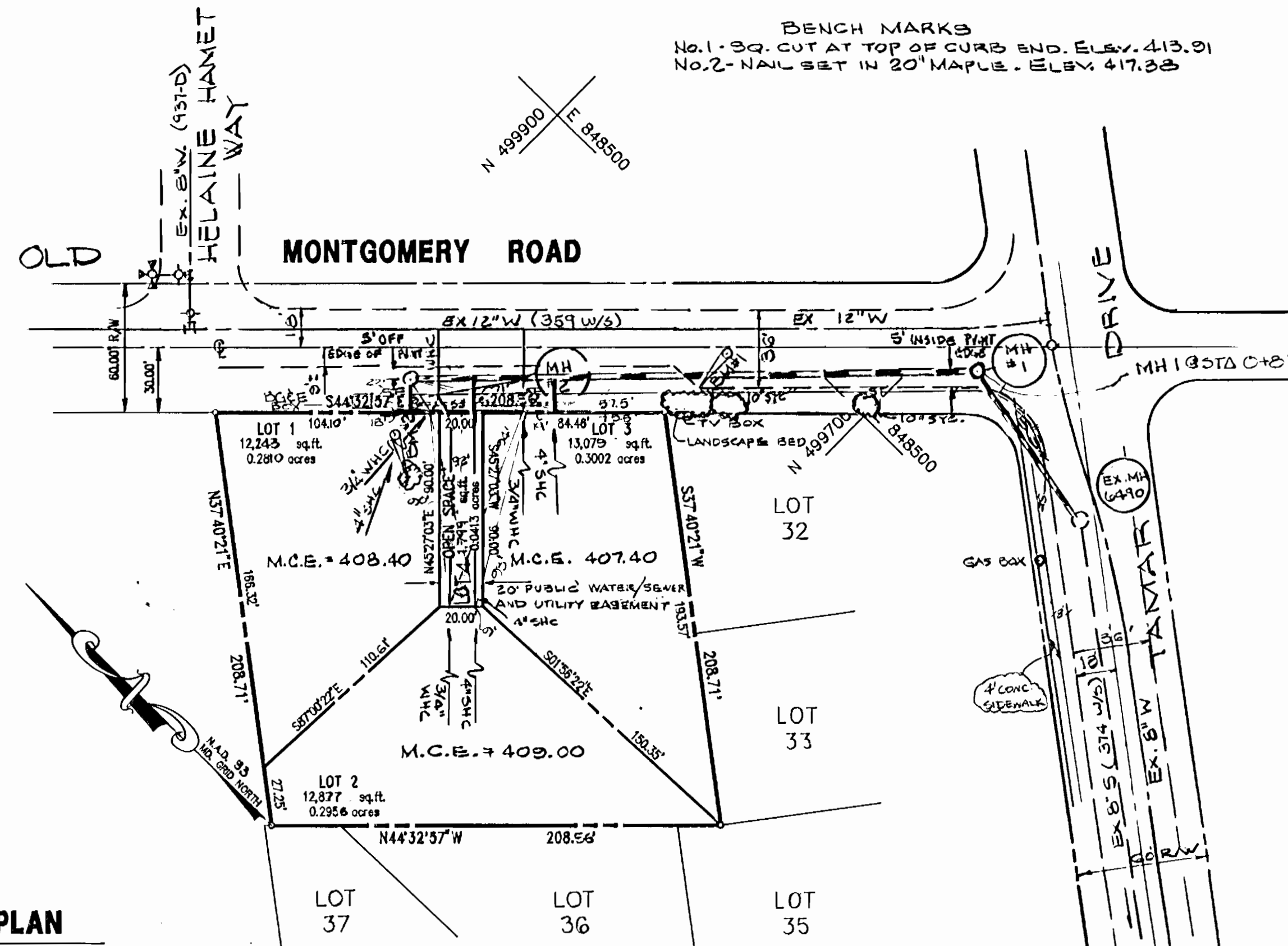


SEDIMENT CONTROL NOTES

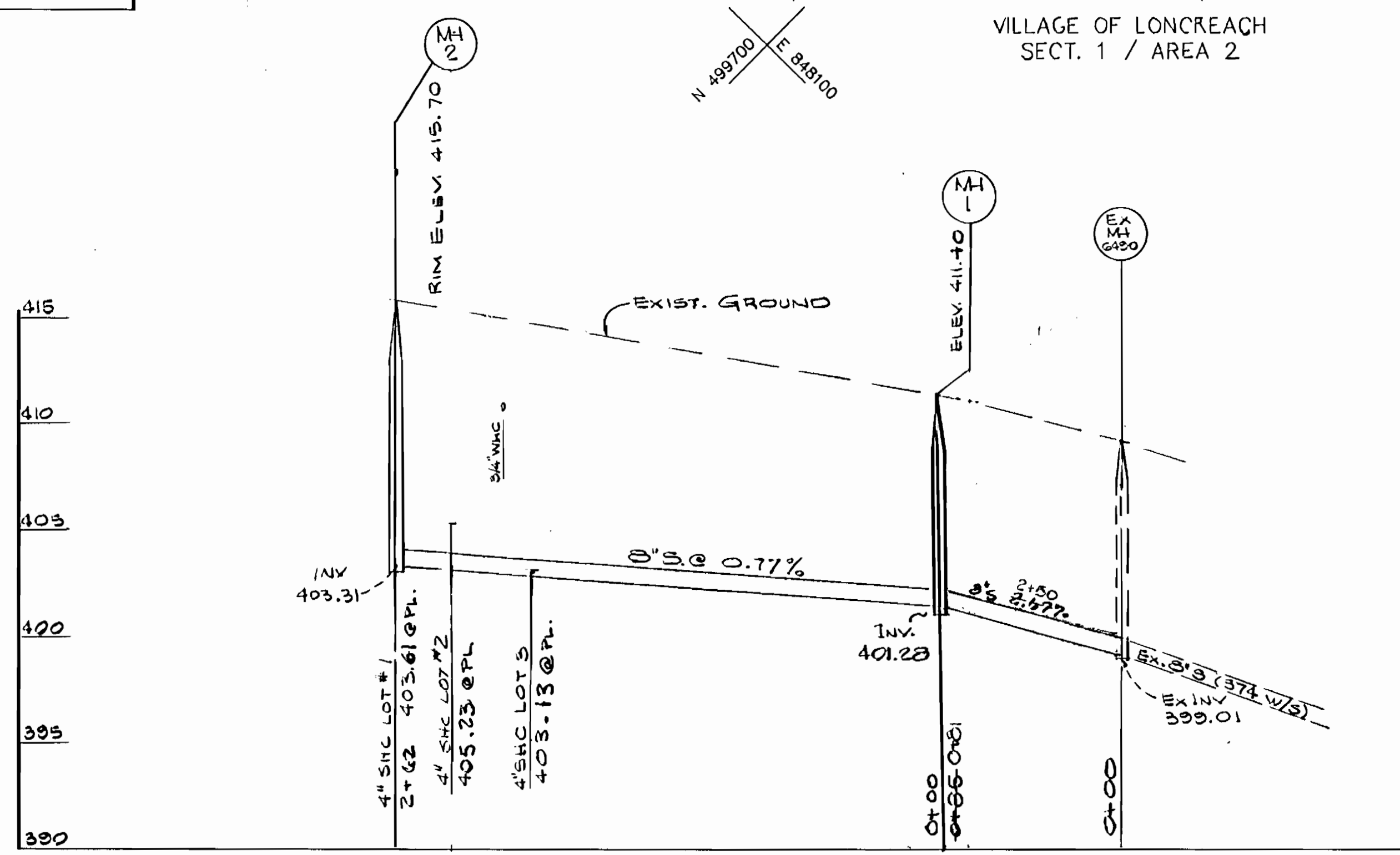
- FOR SEDIMENT CONTROL FOR THIS CONTRACT, SEE THE APPROVED ROAD CONSTRUCTION PLANS.
- MATERIALS FROM TRENCH EXCAVATION TO BE PLACED ON UPHILL SIDE TRENCH.
- CONTRACTOR TO BACKFILL, COMPACT AND STABILIZE IMMEDIATELY AFTER INSTALLATION OF PIPE. NO TRENCHES WILL BE LEFT OPEN AT THE END OF EACH DAY, EXCEPT THAT PORTION WHERE WORK HAS STOPPED.
- ANY SEDIMENT CONTROL FACILITIES ENCOUNTERED DURING PIPE CONSTRUCTION TO BE RETURNED TO ORIGINAL CONDITION IMMEDIATELY UPON COMPLETION OF THAT PORTION OF WORK.
- SEDIMENT CONTROL MEASURES FOR THIS CONTRACT WILL BE IMPLEMENTED IN ACCORDANCE WITH SECTION 219 OF THE HOWARD COUNTY STANDARD SPECIFICATION AND AS PER ROAD CONSTRUCTION PLANS.

AS-BUILT

- LOT# 1 SHC TO MH2 = 26'
- LOT# 1 SHC TO EX 12" W = 18'
- LOT# 1 WHC TO MH2 = 27'
- LOT# 1 WHC TO EX 12" W = 22'
- LOT# 2 SHC TO LOT# 1 WHC = 22'
- LOT# 2 SHC TO LOT# 1 WHC = 22'
- LOT# 2 WHC TO LOT# 1 WHC = 22'
- LOT# 2 SHC TO TV BOX = 21.5'
- LOT# 3 SHC TO MH2 = 11'
- LOT# 3 WHC TO TV BOX = 15.0'
- LOT# 3 WHC TO MH2 = 23'

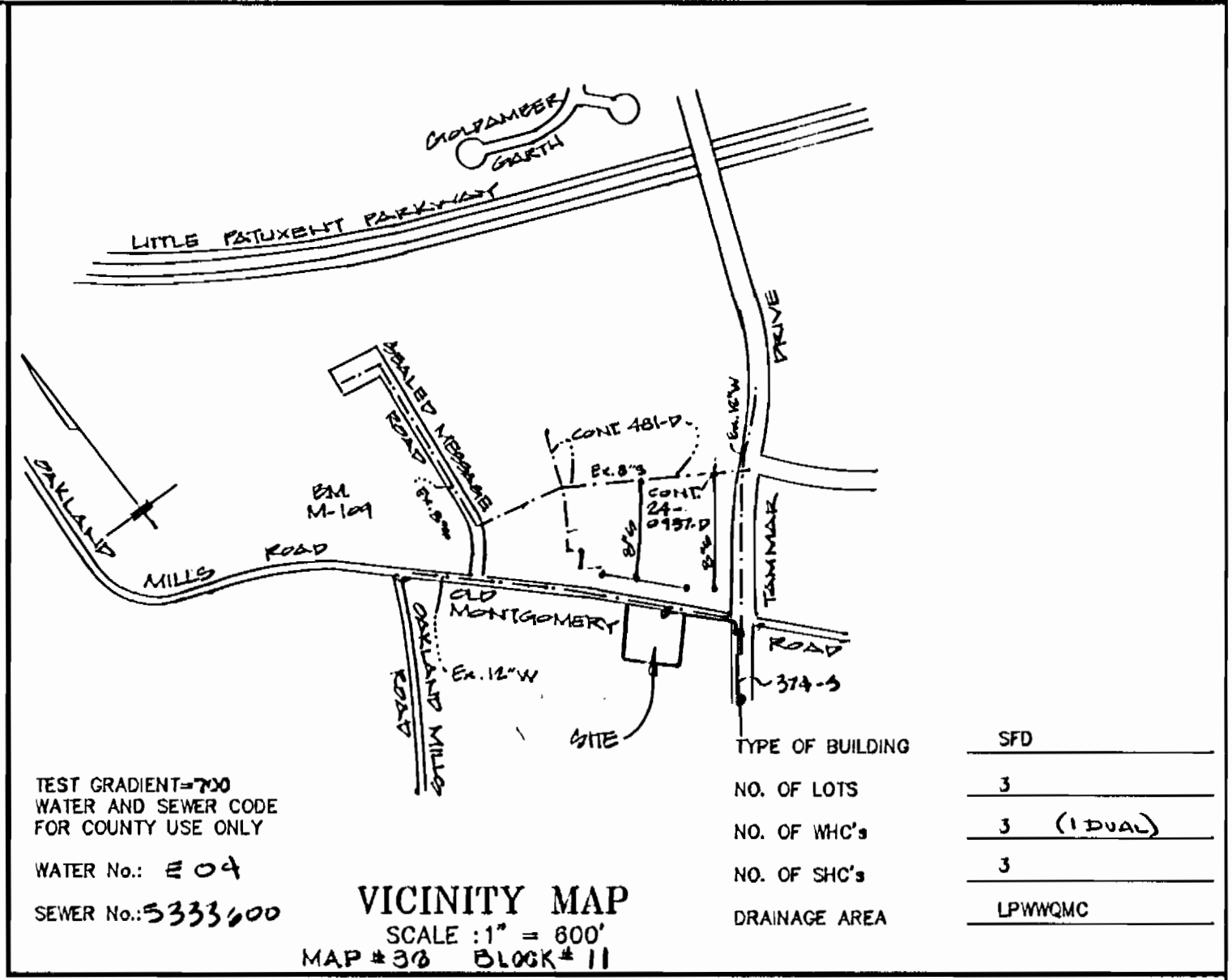


PLAN
SCALE: 1" = 50'



GENERAL NOTES (CONT.)

25. THE CONTRACTOR SHALL NOTIFY THE BUREAU OF HIGHWAYS, HOWARD COUNTY, AT (410) 313-2450 AT LEAST FIVE (5) WORKING DAYS BEFORE OPEN CUT OF ANY COUNTY ROAD OR BORING/ JACKING OPERATION IN COUNTY ROADS FOR LAYING WATER/SEWER MAINS OR HOUSE CONNECTIONS. THE APPROVAL OF THESE DRAWINGS WILL CONSTITUTE COMPLIANCE WITH DPW REQUIREMENTS PER 18.114(a) OF THE HOWARD COUNTY CODE.



GENERAL NOTES

- APPROXIMATE LOCATION OF EXISTING MAINS ARE SHOWN. THE CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS TO PROTECT EXISTING MAINS AND SERVICES AND MAINTAIN UNINTERRUPTED SUPPLY. ANY DAMAGE INCURRED SHALL BE REPAIRED IMMEDIATELY TO THE SATISFACTION OF THE ENGINEER AT THE CONTRACTOR'S EXPENSE.
- ALL HORIZONTAL CONTROLS ARE BASED ON NAD '83, MARYLAND COORDINATE SYSTEM.
- ALL VERTICAL CONTROLS ARE BASED ON U.S.G.S. DATUM.
- ALL PIPE ELEVATIONS SHOWN ARE INVERT ELEVATIONS.
- CLEAR ALL UTILITIES BY A MINIMUM OF 8". CLEAR ALL POLES BY 2'-0" MINIMUM OR TUNNEL AS REQUIRED. THE OWNER HAS CONTRACTED THE UTILITY COMPANIES AND HAS MADE ARRANGEMENTS FOR BRACING OF POLES AS SHOWN ON THE DRAWINGS. IN THE EVENT THE CONTRACTOR'S WORK REQUIRES THE BRACING OF ADDITIONAL POLES, ANY COST INCURRED BY THE OWNER FOR BRACING OF ADDITIONAL POLES OR DAMAGES SHALL BE DEDUCTED FROM MONEY OWED THE CONTRACTOR. THE CONTRACTOR SHALL COORDINATE WITH THE UTILITY COMPANIES TO SCHEDULE BRACING OF THE POLES.
- FOR DETAILS NOT SHOWN ON THE DRAWINGS, AND FOR MATERIALS AND CONSTRUCTION METHODS, USE HOWARD COUNTY DESIGN MANUAL, VOLUME FOUR, STANDARD SPECIFICATIONS AND DETAILS FOR CONSTRUCTION. THE CONTRACTOR SHALL HAVE A COPY OF VOLUME FOUR ON THE JOB.
- WHERE TEST PITS HAVE BEEN MADE ON EXISTING UTILITIES, THEY ARE NOTED BY THE SYMBOL AT THE LOCATION OF THE TEST PIT. A NOTE OR NOTES CONTAINING THE RESULTS OF THE TEST PIT OR PITS IS INCLUDED ON THE DRAWINGS. EXISTING UTILITIES IN THE VICINITY OF THE PROPOSED WORK FOR WHICH TEST PITS HAVE NOT BEEN DUG SHALL BE LOCATED BY THE CONTRACTOR TWO WEEKS IN ADVANCE OF CONSTRUCTION OPERATIONS AT HIS OWN EXPENSE.
- CONTRACTOR SHALL NOTIFY THE FOLLOWING UTILITIES OR AGENCIES AT LEAST FIVE WORKING DAYS BEFORE STARTING WORK SHOWN ON THIS PLANS.
 - STATE HIGHWAY ADMINISTRATION : 531-5333
 - BALTIMORE GAS & ELECTRIC CO. - CONTRACTOR SERVICES : 850-4820
 - UNDERGROUND DAMAGE CONTROL : 787-9088
 - TROUBLE SHOOTING : 298-9001
 - MISS UTILITY : 1-800-287-7777
 - COLONIAL PIPELINE COMPANY : 795-1390
 - BUREAU OF UTILITIES, HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS : 313-4900
- TREES AND SHRUBS ARE TO BE PROTECTED FROM DAMAGE TO MAXIMUM EXTENT. TREES AND SHRUBS LOCATED WITHIN THE CONSTRUCTION STRIP ARE NOT TO BE REMOVED OR DAMAGE BY THE CONTRACTOR.
- CONTRACTOR SHALL REMOVE TREES, STUMPS AND ROOTS ALONG LINE OF EXCAVATION. PAYMENT FOR SUCH REMOVAL SHALL BE INCLUDED IN THE UNIT PRICE BID FOR CONSTRUCTION OF THE MAIN.
- ALL WATER MAINS TO BE D.I.P. CLASS 52 UNLESS OTHERWISE NOTED.
- TOPS OF ALL WATER MAINS TO HAVE A MINIMUM OF 3-1/2" COVER UNLESS OTHERWISE NOTED.
- VALVES ADJACENT TO TEES SHALL BE STRAPPED TO TEES.
- ALL FITTINGS SHALL BE BUTTRESSED OR ANCHORED WITH CONCRETE IN ACCORDANCE WITH THE STANDARD DETAILS UNLESS OTHERWISE PROVIDED FOR ON THE DRAWINGS.
- FIRE HYDRANTS SHALL BE SET TO THE BURY LINE ELEVATIONS SHOWN ON THE DRAWINGS. ALL FIRE HYDRANTS SHALL BE RESTRAINED AND BUTTRESSED WITH CONCRETE IN ACCORDANCE WITH THE STANDARD DETAILS. SOIL AROUND THE FIRE HYDRANT SHALL BE COMPACTED IN ACCORDANCE WITH SECTION 1000 AND 1005 OF THE STANDARD SPECIFICATIONS.
- THE CONTRACTOR SHALL NOT OPERATE ANY WATER MAIN VALVES ON THE EXISTING WATER SYSTEM.
- ALL WATER HOUSE CONNECTIONS SHALL BE FOR INSIDE METER SETTING, UNLESS OTHERWISE NOTED ON THE PLANS OR IN THE SPECIFICATIONS.
- WATER MAINS OR WATER HOUSE CONNECTION LINES MUST BE PLACED SO AS TO HAVE AT LEAST ONE (1) FOOT SEPARATION FROM THE SEWER MAIN OR SEWER HOUSE CONNECTION AS THEY PASS ABOUT IT.
- MANHOLES DESIGNATED W.T. IN PLAN AND PROFILE SHALL HAVE WATERTIGHT FRAME AND COVERS STANDARD DETAIL G.5.2. WHERE WATERTIGHT MANHOLE FRAME AND COVER IS USED, SET TOP OF FRAME 1'-0" ABOVE FINISHED GRADE UNLESS OTHERWISE NOTED ON THE DRAWINGS.
- ALL SEWER MAINS SHALL BE D.I.P., R.C.P., V.C.P.X., C.S.P.X., R.C.C.P., AND P.V.C. UNLESS OTHERWISE NOTED.
- THE CONTRACTOR SHALL PROVIDE A JOINT IN ALL SEWER MAINS WITHIN 2'-0" OF EXTERIOR MANHOLE WALL.
- ALL MANHOLES SHALL BE 4'-0" INSIDE DIAMETER UNLESS OTHERWISE NOTED.
- MANHOLES SHOWN WITH 12" AND 18" WALLS ARE FOR BRICK MANHOLES ONLY.
- MANHOLES LOCATED WITHIN PROPOSED ROADWAY SHALL HAVE STANDARD HEAVY TRAFFIC MANHOLE FRAME AND COVER, STANDARD DETAIL G.5.1
- ALL D.I.P. FITTINGS SHALL BE IN ACCORDANCE WITH AWWA SPECIFICATION C-153 : DUCTILE IRON COMPACT FITTINGS, 3" THROUGH 12" FOR WATER & OTHER LIQUIDS.
- ALL EXISTING STRUCTURES TO BE REMOVED.
- FORCE MAINS SHALL BE D.I.P. ONLY.
- HOUSE(S) WITH THE SYMBOL "C.N.S." INDICATES THAT THE CANNOT BE SERVED.

QUANTITIES				
ITEMS	QUANTITIES ESTIMATED	AS-BUILT		
		QUANTITIES	TYPE	MANUFACTURER / SUPPLIER
1" W.H.C.	36 LF	37 LF	COPPER	CAMBRIDGE LEE/WATER FRC
3/4" W.H.C.	140 LF	148 LF	COPPER	CAMBRIDGE LEE/WATER FRC
8" SEWER	347 LF	343 LF	P.V.C.	JM / WATER FRC
MAN HOLE	2	2	PRE-CAST	ATLANTIC/ATLANTIC
S.H.C.	131 LF	129 LF	P.V.C.	JM / WATER FRC

NAME OF UTILITY CONTRACTOR: UTILITIES UNLIMITED
SURVEY AND DRAFTING DIVISION AS-BUILT DATE

REVIEWED FOR HOWARD COUNTY SOIL CONSERVATION DISTRICT AND MEETS TECHNICAL REQUIREMENTS.

J.C. Waples 11/13/93
U.S. SOIL CONSERVATION SERVICE DATE

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

APPROVED:
Howard Soil Conservation District 11/14/93 DATE

F-03-106 WP-93-104 SOP-93-110

OWNER/DEVELOPER
ETHAN GROSSMAN ENGINEERING
10750 HICKORY RIDGE ROAD
COLUMBIA, MARYLAND 21044

DEPARTMENT OF PUBLIC WORKS
HOWARD COUNTY, MARYLAND.

James P. Lee 12/3/93
DIRECTOR OF PUBLIC WORKS DATE
Randy Deinger 11-9-93
CHIEF, BUREAU OF UTILITIES DATE
Paul J. Eason 12/1/93
CHIEF, BUREAU OF ENGINEERING DATE
M. J. ... 2/1/93
CHIEF, LAND DEVELOPMENT DIVISION DATE

PREPARED BY:
AMERICAN ENGINEERING, INC.
CIVIL ENGINEERING CONSULTANTS
AND LAND PLANNER
871-A MAIN STREET
LAUREL, MD. 20707
BALT. (410) 830-3039
WASH. (301) 953-1221



DES :	D.C.W.	REV. :	SEWER ALIGNMENT	DATE
DRN :	W.D.F.			
CHK :	R.A.			
DATE :	9-18-92	BY :		

PLAN & PROFILE
WATER AND SEWER MAINS
800'SCALE MAP NO. 36 BLOCK NO. 11

AMERICA
CONTRACT No. 24-3292-D
8th ELECTION DISTRICT
HOWARD COUNTY, MARYLAND
SCALE AS SHOWN
SHEET 1 OF 1

W/S 3292-D AMERICA

AS-BUILT 01/28/94