

**PERMITS AND REGULATIONS**

Apply for required permits from the appropriate authority before any construction begins. Obtain all necessary permits from the appropriate authority before any construction begins. Obtain all necessary permits from the appropriate authority before any construction begins.

**GENERAL NOTES**

1. 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.

2. ALL HORIZONTAL CONTROLS ARE BASED ON MARYLAND STATE COORDINATES.

3. ALL VERTICAL CONTROLS ARE BASED ON U.S.G.S. DATA.

4. ALL PIPE ELEVATIONS SHOWN ARE INVERT ELEVATIONS.

5. CLEAR ALL UTILITIES BY A MINIMUM OF 6".

6. FOR DETAILS NOT SHOWN ON THE DRAWINGS, AND FOR MATERIALS AND CONSTRUCTION METHODS, USE HOWARD COUNTY DESIGN MANUAL, VOLUME IV, STANDARD SPECIFICATIONS AND DETAILS FOR CONSTRUCTION. THE CONTRACTOR SHALL HAVE A COPY OF VOLUME IV ON THE JOB.

7. 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 VERIFIED BY THE CONTRACTOR TO HIS OWN SATISFACTION. ANY DAMAGE TO EXISTING FACILITIES DUE TO THE CONTRACTOR'S NEGLIGENCE SHALL BE REPAIRED AT THE CONTRACTOR'S EXPENSE.

8. CONTRACTOR SHALL NOTIFY THE FOLLOWING UTILITIES OR AGENCIES AT LEAST FIVE WORKING DAYS BEFORE STARTING WORK SHOWN ON THESE PLANS:

STATE HIGHWAY ADMINISTRATION : 531-5533  
BALTIMORE GAS & ELECTRIC CO.-CONTRACTOR SERVICES: 561-2585  
BALTIMORE GAS & ELECTRIC CO. UNDERGROUND DAMAGE CONTROL: 234-5621  
BALTIMORE GAS & ELECTRIC CO. TROUBLE SHOOTING: 298-9013  
MISS UTILITY: 1-559-0100  
COLONIAL PIPELINE COMPANY: 795-1390  
BUREAU OF UTILITIES, HOWARD COUNTY DEPARTMENT OF PUBLIC WORKS: 992-2366

9. 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 DAMAGED BY THE CONTRACTOR.

10. 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.

11. ALL WATER MAINS TO BE D.I.P. CLASS 52 UNLESS OTHERWISE NOTED.

12. TOPS OF ALL WATER MAINS TO HAVE A MINIMUM OF 3-1/2' COVER UNLESS OTHERWISE NOTED.

13. VALVES ADJACENT TO TEES SHALL BE STRAPPED TO TEES.

14. ALL FITTINGS SHALL BE BUTTRESSED OR ANCHORED WITH CONCRETE IN ACCORDANCE WITH THE STANDARD DETAILS UNLESS OTHERWISE PROVIDED FOR ON THE DRAWINGS.

15. FIRE HYDRANTS SHALL BE SET TO THE BURY LINE ELEVATIONS SHOWN ON THE DRAWINGS. ALL FIRE HYDRANTS SHALL BE STRAPPED AND BUTTRESSED WITH CONCRETE IN ACCORDANCE WITH STANDARD DETAILS. SOIL AROUND THE FIRE HYDRANT SHALL BE COMPACTED IN ACCORDANCE WITH SECTION 1000.03 AND 1005.03 OF THE STANDARD SPECIFICATIONS.

16. THE CONTRACTOR SHALL NOT OPERATE ANY WATER MAIN VALVES ON THE EXISTING WATER SYSTEM.

17. FOR ALL COPPER WATER HOUSE CONNECTIONS, UTILIZE FLARED TYPED FITTINGS ONLY.

18. ALL WATER HOUSE CONNECTIONS SHALL BE FOR INSIDE METER SETTING, UNLESS OTHERWISE NOTED ON THE PLANS OR IN THE SPECIFICATIONS. (STD. DETAIL W.3.21).

19. WATER MAINS AND 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.

20. MANHOLES DESIGNATED N.T. IN PLAN AND PROFILE SHALL HAVE WATER-TIGHT FRAME AND COVERS STANDARD DETAIL GS.52 WHERE WATER-TIGHT MANHOLE FRAME AND COVER IS USED. SET TOP OF FRAME 1'-6" ABOVE FINISHED GRADE UNLESS OTHERWISE NOTED ON THE DRAWINGS.

21. ALL SEWER MAINS SHALL BE C.S.P.X., R.C.S.P., V.C.P.X., OR P.V.C. UNLESS OTHERWISE NOTED.

22. THE CONTRACTOR SHALL PROVIDE A JOINT IN ALL SEWER MAINS WITHIN 2'-0" OF EXTERIOR MANHOLE WALL.

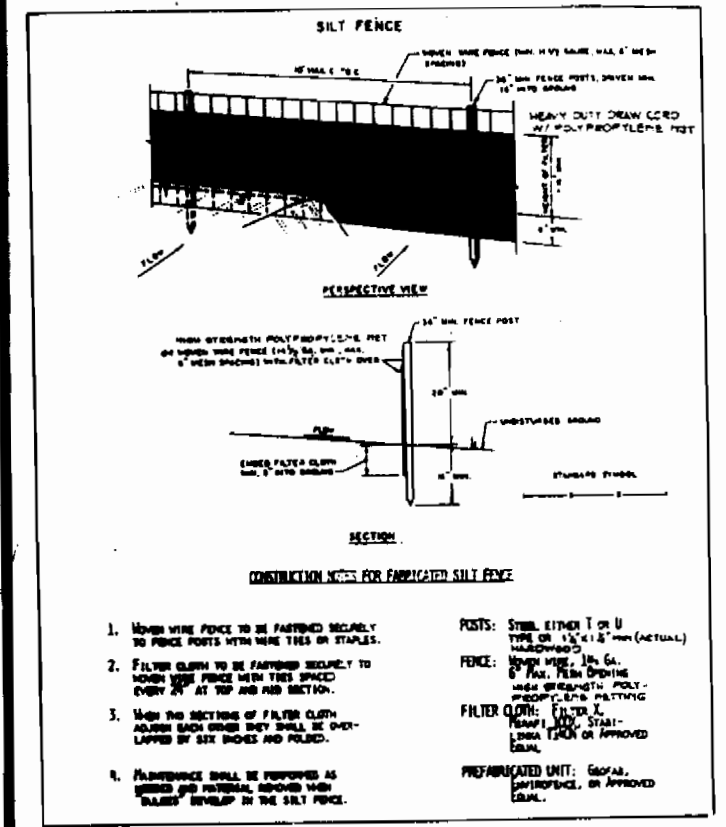
23. ALL MANHOLES SHALL BE 4'-0" INSIDE DIAMETER UNLESS OTHERWISE NOTED.

24. MANHOLES SHOWN WITH 12" AND 16" WALLS ARE FOR BRICK MANHOLES ONLY.

25. MANHOLES LOCATED WITHIN PROPOSED ROADWAY SHALL HAVE STANDARD HEAVY TRAFFIC MANHOLE FRAME AND COVER, STANDARD DETAIL GS.51.

26. ALL WATER HOUSE CONN. ARE FOR INSIDE METER SETTING.

27. ALL D.I.P. FITTINGS SHALL BE IN ACCORDANCE WITH AWWA SPECIFICATION C-155 DUCTILE IRON COMPACT FITTING, 3" THROUGH 12" FOR WATER AND OTHER LIQUIDS.



**SEDEMENT CONTROL MEASURES FROM THIS CONTRACT WILL BE IMPLEMENTED IN ACCORDANCE WITH SECTION 219 OF THE SPECIFICATIONS AND AS SHOWN ON P-90-180**

**HOWARD SOIL CONSERVATION DISTRICT REVIEWED FOR HOWARD SOIL CONSERVATION DISTRICT AND MEETS TECHNICAL REQUIREMENTS**

*John A. Haddad* 4/26/90  
U.S. SOIL CONSERVATION SERVICE DATE

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

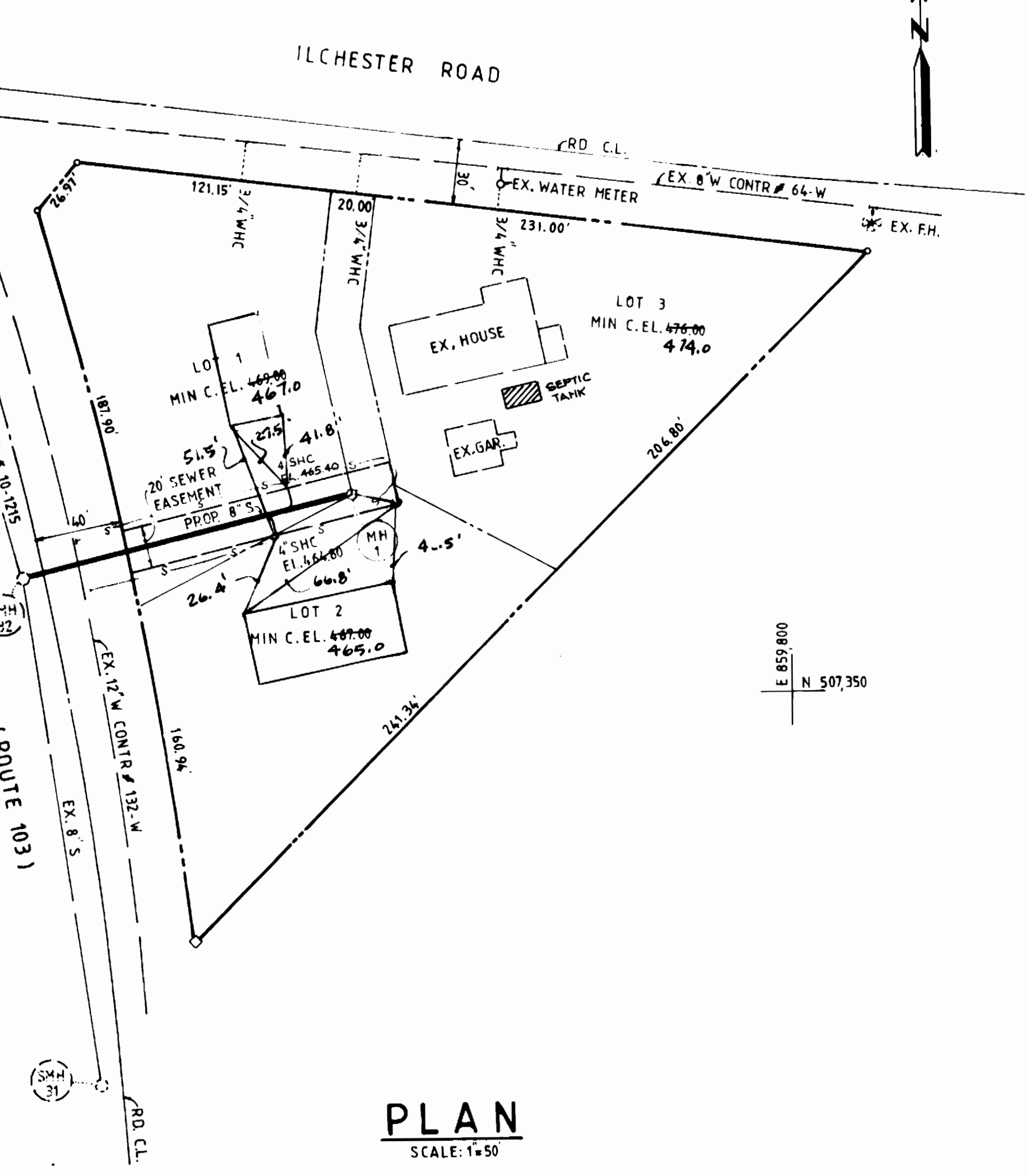
*John A. Haddad* 4/26/90  
HOWARD SOIL CONSERVATION DISTRICT DATE

**DEPARTMENT OF PUBLIC WORKS**  
HOWARD COUNTY, MARYLAND

*John A. Haddad* 11-29-90  
DIRECTOR OF PUBLIC WORKS DATE

*John A. Haddad* 11-29-90  
CHIEF BUREAU OF ENGINEERING DATE

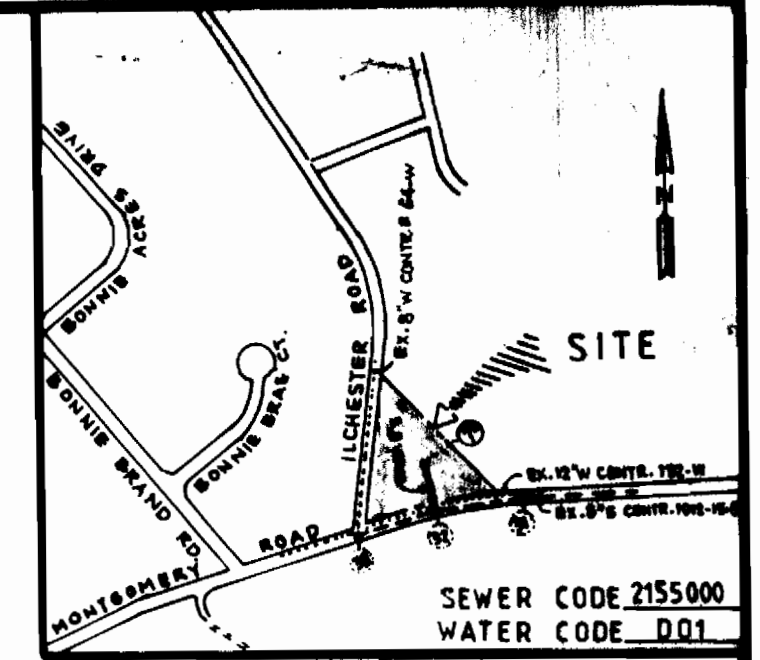
*John A. Haddad* 11-29-90  
CHIEF LAND DEVELOPMENT DIVISION DATE



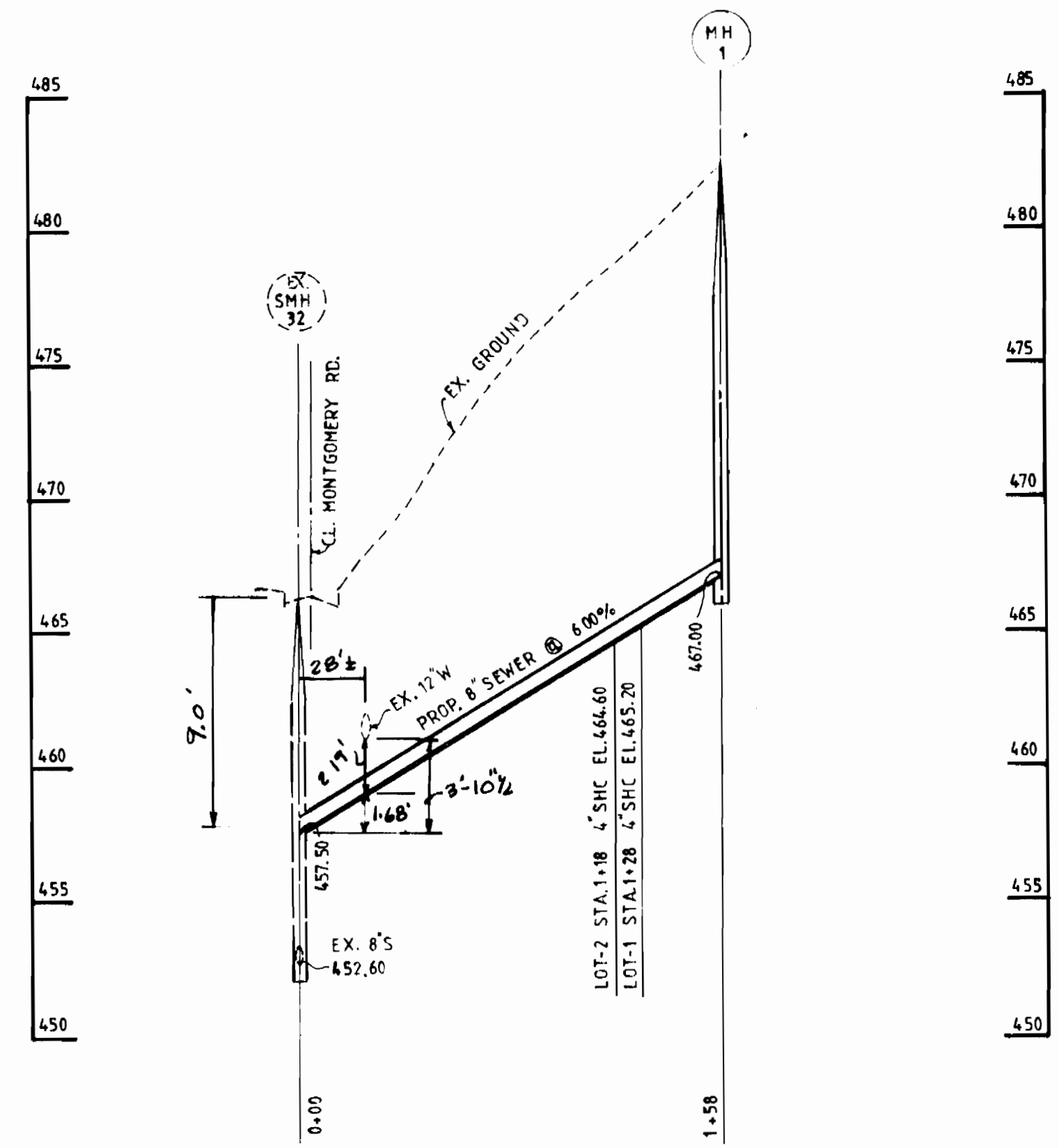
QUANTITIES			
ITEM	QUANTITY	AS BUILT	SUPPLIER
SEWER MANHOLE	1		ATLANTIC
8" SEWER	158 LF	J.M. MAG. C.	
4" SHC	40 LF		
3/4" WHC	50 LF	Red Top K.	

NUMBER OF LOTS: 3  
BUILDING TYPE: RESIDENTIAL  
NUMBER OF WHCS: 2  
NUMBER OF SHCS: 2  
DRAINAGE AREA: DEEP RUN

BENCH MARK 23 A: CUT NAIL G & E 168899 EL. 481.22  
BENCH MARK 24 A: CUT NAIL C & P 104 EL. 440.67



- SEQUENCE OF CONSTRUCTION**
- OBTAIN REQUIRED PERMITS.
  - NOTIFY HOWARD COUNTY OFFICE OF INSPECTION OF PERMITS AT 792-7272, A MINIMUM OF 24 HRS. PRIOR TO THE START OF ANY WORK.
  - INSTALL SEDIMENT AND EROSION CONTROL MEASURES.
  - CUT THE TRENCH AND PLACE SEWER PIPES. THE CUT IN MD. ROUTE 108 SHALL BE IN ACCORDANCE WITH THE S.H.A. REQUIREMENT.
  - EXCAVATED TRENCH MATERIAL TO BE PLACED ON THE UPHILL SIDE OF THE TRENCH.
  - WITH THE APPROVAL OF THE SEDIMENT CONTROL INSPECTORS, REMOVE ALL SEDIMENT AND EROSION CONTROL MEASURES ONCE ALL THE DISTURBED AREAS ARE PERMANENTLY STABILIZED.



**SEDGHI & ASSOCIATES, LTD.**  
Civil Engineers - Site Planners - Surveyors  
3217 Corporate Court  
Ellicott City, MD 21043  
(301) 750-9003

DESIGNED BY	VS		
DRAWN BY	VS		
CHECKED BY	MS		
DATE	10-30-90	BY	NO
REVISION	1 REMOVE SHC OF LOT 3	DATE	8-29-96

**SEWER PLAN & PROFILE**  
CONTRACT NO. 14-3072-D

**KHAN & HADDAD PROPERTY**  
LOT 1 TO 3  
TAX MAP 31, PARCEL 203  
1ST ELECTION DISTRICT  
HOWARD COUNTY, MD.

**DEVELOPER**  
SHABIR & MUNTAHA H KHAN  
8275 ILCHESTER ROAD  
ELICOTT CITY, MD. 21043

SCALE AS SHOWN  
SHEET 1 OF 1

AS-BUILT 11/21/92