

7/20/00 2-3pm C.O.

PERMIT

03-313522

P 513684

SEWAGE DISPOSAL SYSTEM HOWARD COUNTY HEALTH DEPARTMENT BUREAU OF ENVIRONMENTAL HEALTH

A 38653

12/19/00
NOON

12/20/00
2-3

INDEXED

410-313-2640

ISSUE DATE 7/13/2000

APPROVAL DATE 12/20/00

Eogle's Septic Clean, Inc. IS PERMITTED TO INSTALL x ALTER

ADDRESS 580 Obrecht Road, Sykesville, MD 21784 PHONE 410-795-5670

SUBDIVISION Willow Highlands LOT NUMBER 28 ADDRESS 1760 Heatherwood Way

PROPERTY OWNER Catonsville Builders PROPERTY OWNER'S ADDRESS 10753 Birmingham Way

SEPTIC TANK CAPACITY 1500 GALLONS - TOP SEAMED *PUMP SYSTEM ONLY*

PUMP CHAMBER CAPACITY 1500 GALLONS - TOP SEAMED

NUMBER OF BEDROOMS 5

SQUARE FEET PER BEDROOM 210

LINEAR FEET OF TRENCH REQUIRED 340

TRENCHES: Trenches to be 3.0 feet wide. Inlet 3.0 feet below original grade. Bottom maximum depth 5.0 feet below original grade. 2.0 feet of stone below distribution box.

LOCATION: Starting at the bend in the left lot line, place the distribution box

55 feet down the 290.26' lot line and 110' from the same lot line.
Run trenches along contour toward the rear of the lot. 5/23/00 OK ALU

PLANS APPROVED Mark Rifkin DATE 5/22/00

PERMIT VOID AFTER 2 YEARS

NOTE: CONTRACTOR RESPONSIBLE FOR SCHEDULING A PRE-CONSTRUCTION INSPECTION FOR ALL INSTALLATIONS

NOTE: TOP OF SEPTIC TANKS ARE TO BE NO DEEPER THAN 3.0 FEET BELOW FINISH GRADE

BLDG. PERMITS SIGNED

NOTE: WATERTIGHT SEPTIC TANKS REQUIRED

AND RETURNED 10/24/00

B001269 86 Propane Tank

NOTE: CLEANOUT REQUIRED EVERY 70 FEET OF SEWER LINE AND/OR AT 90° SWEEPS IN LINES FROM HOUSE TO DRAIN FIELDS, 90° ELBOWS ARE NOT ACCEPTABLE

NOTE: ALL PARTS OF SEPTIC SYSTEMS (I.E. TANK, DISTRIBUTION BOX, DRAINFIELDS) TO BE 100 FEET FROM ANY WATER WELL UNLESS OTHERWISE SPECIFICALLY AUTHORIZED

BLDG. PERMITS SIGNED

NOTE: NO ABSORPTION TRENCH TO EXCEED 100 FEET IN LENGTH UNLESS SPECIFICALLY AUTHORIZED

AND RETURNED 10/4/2000

NOTE: ALL PIPE FROM HOUSE TO SEPTIC TANK MUST BE CAST IRON OR SCHEDULE 35/40 PVC OR ABS

B00126753

CONCRETE, IN GROUND POOL

NOTE: MANHOLE RISERS REQUIRED ON ALL SEPTIC TANKS AND PUMP CHAMBERS

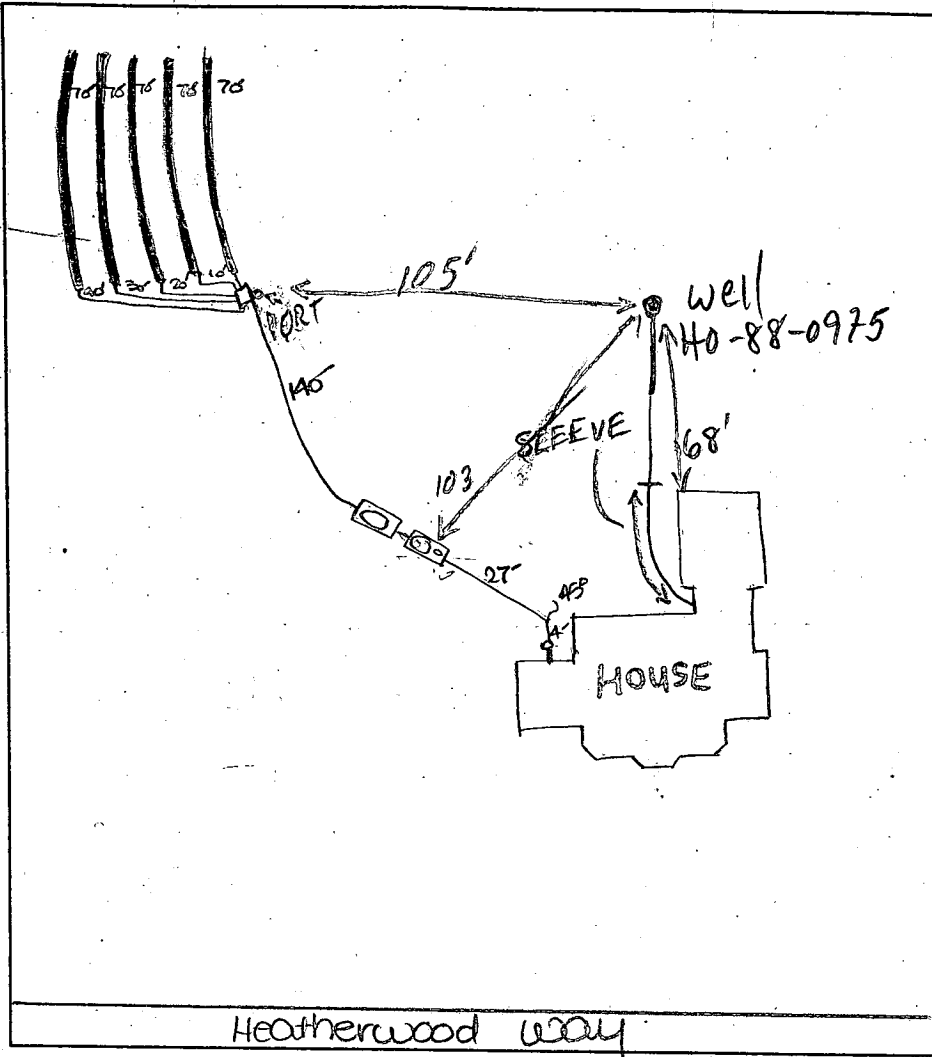
NOTE: DISTRIBUTION BOXES MUST HAVE BAFFLES

NOTE: IF PUMPED SEPTIC SYSTEM REQUIRED, (1) SEPTIC PUMP DETAIL TO BE PROVIDED BY INSTALLER PRIOR TO ISSUANCE OF SEPTIC PERMIT (2) PUMP PERFORMANCE TEST IS NECESSARY PRIOR TO HEALTH DEPARTMENT APPROVAL OF SEPTIC PERMIT

NEITHER THE HOWARD COUNTY COUNCIL NOR THE HEALTH DEPARTMENT IS RESPONSIBLE FOR THE SUCCESSFUL OPERATION OF ANY SYSTEM
PERMITTEE RESPONSIBLE FOR OBTAINING FINAL APPROVAL ON THIS PERMIT
CALL 410-313-2640 FOR INSPECTION OF SEPTIC SYSTEM

A 38653

NOT TO SCALE



TRENCH DATA	
TRENCH WIDTH	3'
TRENCH INLET DEPTH	3'
TRENCH BOTTOM DEPTH	5'
DEPTH OF STONE	2'
NUMBER OF TRENCHES	5
TOTAL TRENCH LENGTH	350'
ABSORBENT AREA	1750 ft ²
DISTRIBUTION BOX LEVEL	OK
BAFFLE IN DISTRIBUTION BOX	✓

SEPTIC TANK DATA	
SEPTIC TANK	1500 GALLONS
MANHOLE RISER	✓
6 INCH INSPECTION PORT	✓
PUMP CHAMBER DATA	
PUMP CHAMBER GALLONS	1500
MANHOLE RISER	3 1/2' ✓
ALARM	OPERATIONAL
PUMP PERFORMANCE TEST	

PRE-CONSTRUCTION INSPECTION: _____

INSPECTION COMMENTS: 7/20/00 OK to cover from 2' off house, s.t., and pump chamber. OK to install trenches 7' edge to edge. Needs house connection. DKS

7/24/00 OK to cover all work. Needs pump performance test for final. Needs house connection. DKS *lgt arriving only plumber here*
House connection OK, deep manhole riser @ S.T. & P.C., unable to reach floor. Thick Scum layer on water level in P.C. Needs to be removed to prevent solids going into drainfield, use clean water for test. JFF 12/18/00

INSPECTOR B. Baker

DATE SYSTEM APPROVED 12/20/00

12/19/00 - ALARM OK, PUMP?, PUMP SOLIDS OUT OF PUMP TANK
FILL PUMP CHAMBER WITH "CLEAN" WATER AND CALL FOR REINSPECTION - (SRV) 12/20/00 Pump working. (BB)

3/21/91

APPLICATION

PERCOLATION TESTING

A 38653

P _____

HOWARD COUNTY HEALTH DEPARTMENT
BUREAU OF ENVIRONMENTAL HEALTH
3525-H ELLICOTT MILLS DRIVE/ELLICOTT CITY, MARYLAND 21043
TELEPHONE: 313-2640

*Follow-up
NOTES
TO RE-EVALUATION
OF 2/6 AND 3/1/91*

DISTRICT _____

DATE _____

TO: THE COUNTY HEALTH OFFICER
ELLICOTT CITY, MARYLAND

I HEREBY APPLY FOR THE NECESSARY TEST PRIOR TO APPLICATION FOR PERMIT TO CONSTRUCT (OR RECONSTRUCT) A SEWAGE DISPOSAL SYSTEM.

PROPERTY OWNER _____

ADDRESS _____ PHONE _____

AGENT OR PROSPECTIVE BUYER _____

ADDRESS _____ PHONE _____

PROPERTY LOCATION:

SUBDIVISION WILLOW HIGHLANDS LOT NO. 28

ROAD AND DESCRIPTION _____

TAX MAP _____ PARCEL # _____

SIZE OF LOT _____ TYPE BLDG. _____
(SINGLE FAMILY DWELLING OR COMMERCIAL)

THE SYSTEM INSTALLED UNDER THIS APPLICATION IS ACCEPTABLE ONLY UNTIL PUBLIC FACILITIES BECOME AVAILABLE. I FULLY UNDERSTAND THE FEE CONNECTED WITH THE FILING OF THIS PERC TEST APPLICATION IS NON-REFUNDABLE UNDER ANY CIRCUMSTANCES. I ALSO AGREE TO COMPLY WITH ALL M.O.S.H.A. REQUIREMENTS IN TESTING THIS LOT.

(SIGNATURE OF APPLICANT)

RE-APPROVED BY Craig Williams FOR STAINING TRENCHES DATE 3/21/91

DISAPPROVED BY _____ FOR _____ DATE _____

HOLD PENDING FURTHER TESTS _____

REASONS FOR REJECTION OR HOLDING _____

PERCOLATION TEST PLAT/PRELIMINARY PLAT - TITLE OR I.D. # _____ DATE _____

SITE DEVELOPMENT PLAN/FINAL PLAT - TITLE OR I.D. # _____ DATE _____

THIS IS NOT A PERMIT

COUNTY #

SOIL PROFILE

0'

Empty vertical box for soil profile notes.

Empty vertical box for soil profile notes.

Empty vertical box for soil profile notes.

DISCUSSION WITH OWNER OF OBSERVATIONS BY J. W. DETMERS ON 2/6 AND 3/1/91			
- THE PLATTED EASEMENT WAS AFTER TESTING IN 1987 ESTABLISHED THAT MINIMUM GROUNDWATER SEPARATION REQUIREMENTS HAD BEEN SATISFIED,			
- A RE-EVALUATION WAS REQUESTED IN 1991 BECAUSE OF FINDINGS ON OTHER LOTS OF GROUNDWATER HIGHER THAN ESTABLISHED IN THE 1987 TESTING.			
- THE 1991 RE-EVALUATION SHOWS NO INCREASE IN THE WATER TABLE LEVEL IN THE SEWAGE DISPOSAL EASEMENTS, ALTHOUGH MOTTLING WAS OBSERVED INDICATIVE OF SATURATED CONDITIONS AT SOME TIME IN THE PAST			

SOIL PROFILE

0'

Empty vertical box for soil profile notes.

INDICATE NORTH - NAME ADJOINING ROADWAY AS BASE LINE.

DATE	TEST NO.	DEPTH	PRE-WET		TEST - 1" DROP		TIME
			START	STOP	START	STOP	
- THIS CONDITION IS CONSIDERED TO BE A SIGN FOR CAUTION, BUT NOT CONCLUSIVE EVIDENCE OF A FAILING CONDITION BY ITSELF.							
- FINDING NO WATER TABLE PROBLEMS IN THE TARGET AREA ON 2 OCCASIONS, BOTH OF THEM IN THE WET SEASON, AND THE 1991 SEASON HAVING BEEN DEMONSTRATED TO BE A PARTICULARLY REVEALING WET SEASON, THE ACCEPTABILITY OF THE ORIGINALLY							

REMARKS APPROVED USE OF A SHALLOW CONVENTIONAL SEPTIC SYSTEM IS SUSTAINED, (CONVERSATION WAS 3/21/91)

TYPE OF SOIL RECORDED AND TESTED BY 5/27/99 C. J. WILSON ALSO PRESENT S

TRENCH DESIGN DATA: AVERAGE PERCOLATION TIME _____ TRENCH WIDTH _____

INLET DEPTH _____ MAXIMUM BOTTOM DEPTH _____ SQ. FT./BEDROOM _____

(THESE NOTES RECORDED AND TESTED BY)

APPLICATION

PERCOLATION TESTING

A 38653

P _____

HOWARD COUNTY HEALTH DEPARTMENT
BUREAU OF ENVIRONMENTAL HEALTH
P.O. BOX 476 ELLICOTT CITY, MARYLAND 21043
TELEPHONE: 461-9933

DISTRICT _____

DATE _____

TO: THE COUNTY HEALTH OFFICER
ELLICOTT CITY, MARYLAND

I, HEREBY, APPLY FOR THE NECESSARY TEST IN ORDER TO CONSTRUCT (OR RECONSTRUCT) A SEWAGE DISPOSAL SYSTEM.

PROPERTY OWNER _____

ADDRESS _____ PHONE _____

PROSPECTIVE BUYER _____

ADDRESS _____ PHONE _____

PROPERTY LOCATION:

SUBDIVISION Willow Highlands LOT NO. 28 1 1/2 A Retest

ROAD AND DESCRIPTION Heatherwood way

TAX MAP _____ PARCEL # _____

SIZE OF LOT _____ TYPE BLDG. _____
(SINGLE FAMILY DWELLING OR COMMERCIAL)

THE SYSTEM INSTALLED UNDER THIS APPLICATION IS ACCEPTABLE ONLY UNTIL PUBLIC FACILITIES BECOME AVAILABLE. I FULLY UNDERSTAND THE FEE CONNECTED WITH THE FILING OF THIS PERC TEST APPLICATION IS NON-REFUNDABLE UNDER ANY CIRCUMSTANCES. I ALSO AGREE TO COMPLY WITH ALL M.O.S.H.A. REQUIREMENTS IN TESTING THIS LOT.

(SIGNATURE OF APPLICANT)

APPROVED BY _____ FOR _____ DATE _____

REJECTED BY _____ FOR _____ DATE _____

HOLD PENDING FURTHER TESTS _____ DATE _____

REASONS FOR REJECTION OR HOLDING 3-14-91 Acceptable soils for 1 1/2 A designs at upper elevations of recorded SDA JEN

HD-216

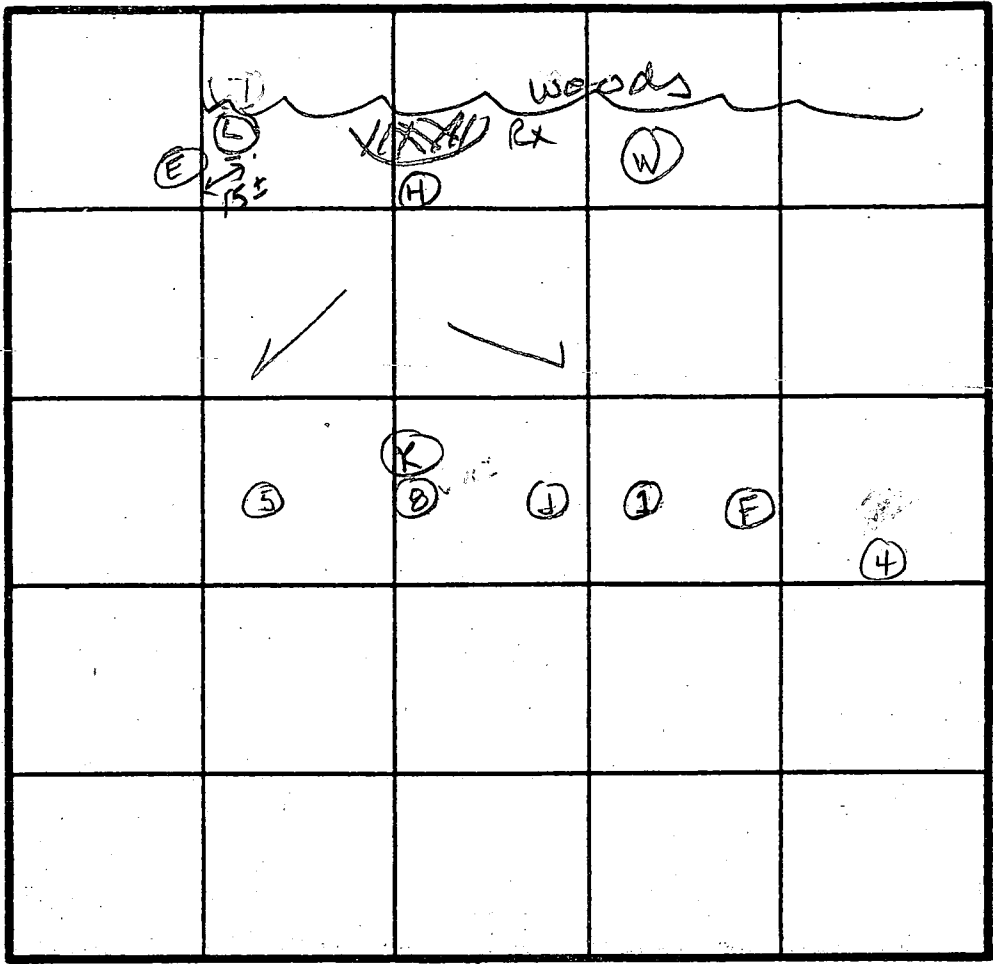
THIS IS NOT A PERMIT

A 38653

(K)

SOIL PROFILE

0-9" Dk yell. br
s & org
9"-24" Strong br
s
24"-10.5' Dk Yell br
sa s, black
decomp.
rock <10%
trace of
mottles
water at
10.0 ft
10.5' Bottom



INDICATE NORTH - NAME ADJOINING ROADWAY AS BASE LINE.

Heatherwood Way

(L)
0-7" Dk yell. br.
s soil, org.
7"-2' Strong br.
s soil, trc
of black
stains
2'-10' Yellow br.
s soil, frequent
mottles
at 3.0'
black
stains
throughout
water at 9±
10.5' Bottom

DATE	TEST NO.	DEPTH	PRE-WET		TEST - 1" DROP		TIME
			START	STOP	START	STOP	
3-13-91	K	see profile	water at 10.0 ft				
		Infiltrometer	test		run at 36 in	35 min	1 inch
	L	Mottles at 3.0 ft	water at 9.0±				
		Infiltrometer	test		run at 17 in	16.6 min	1 inch

REMARKS 1/2 A rates achievable at 9 in to 2 1/2 in with the higher elevations containing shallower acceptable soils.

TYPE OF SOIL

TESTED BY Jane Nadeau

ALSO PRESENT
Olin Ketterman
C. Williams, L. May
R. Pinkley

APPLICATION

PERCOLATION TESTING

A 38653

P _____

HOWARD COUNTY HEALTH DEPARTMENT
BUREAU OF ENVIRONMENTAL HEALTH
P.O. BOX 476 ELLICOTT CITY, MARYLAND 21043
TELEPHONE: 461-9933

DISTRICT _____

DATE _____

TO: THE COUNTY HEALTH OFFICER
ELLICOTT CITY, MARYLAND

I, HEREBY, APPLY FOR THE NECESSARY TEST IN ORDER TO CONSTRUCT (OR RECONSTRUCT) A SEWAGE DISPOSAL SYSTEM.

PROPERTY OWNER _____

ADDRESS _____ PHONE _____

PROSPECTIVE BUYER _____

ADDRESS _____ PHONE _____

PROPERTY LOCATION:

SUBDIVISION Willow Highlands LOT NO. 28

ROAD AND DESCRIPTION Heatherwood way

TAX MAP _____ PARCEL # _____

SIZE OF LOT _____ TYPE BLDG. _____
(SINGLE FAMILY DWELLING OR COMMERCIAL)

THE SYSTEM INSTALLED UNDER THIS APPLICATION IS ACCEPTABLE ONLY UNTIL PUBLIC FACILITIES BECOME AVAILABLE. I FULLY UNDERSTAND THE FEE CONNECTED WITH THE FILING OF THIS PERC TEST APPLICATION IS NON-REFUNDABLE UNDER ANY CIRCUMSTANCES. I ALSO AGREE TO COMPLY WITH ALL M.O.S.H.A. REQUIREMENTS IN TESTING THIS LOT.

(SIGNATURE OF APPLICANT)

APPROVED BY _____ FOR _____ DATE _____

REJECTED BY _____ FOR _____ DATE _____

HOLD PENDING FURTHER TESTS _____ DATE _____

REASONS FOR REJECTION OR HOLDING 2-28-91 Unable to locate acceptable soils for SDA. JEN

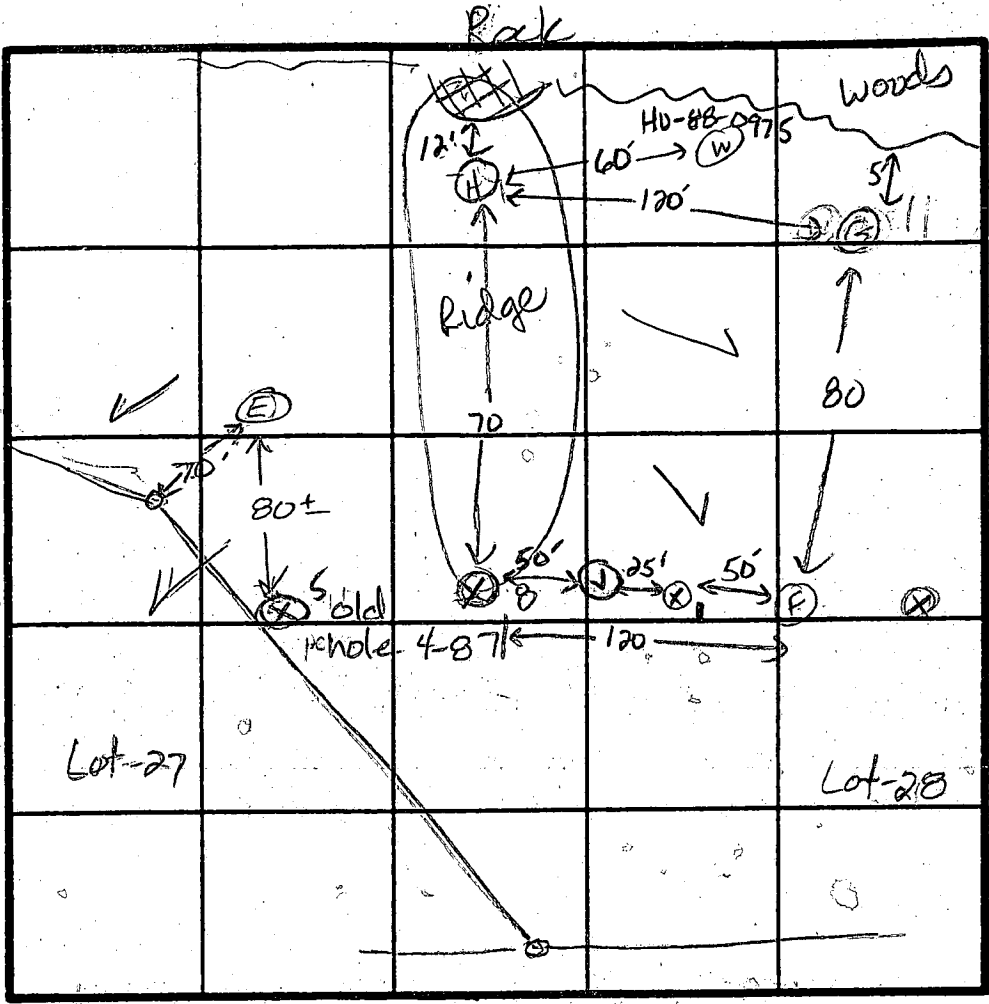
HD-216

THIS IS NOT A PERMIT

Lat 13
A 38653

(E)
SOIL PROFILE

0-2.0 Dk brs
cl w/ organics
2.0-3.0 Br sil
3.0-4.0 Tan br w/
mottled
gray sil loam
4.0-9.5 Tan br
sa sil,
relict
structure
of weathered
saprolite
apparent
Water
at 8.5'
9.5 Bottom
2 hrs



(H) (J)
0-1.0 Dk br
sil, org
1.0-3.0 Br sil
3.0-12.5 Red br
sil,
bitite
lenses,
~60%
saprolite
Gray Mottles
at 6.0
ft.
Water
at 11.5
12.5 Bottom

(F)

0-1.5 Br sil
loam
15-12 Tan-gray
mottled
sil loam
Water
at 4.0 ft
12± Bottom
Caved at
6.0 ft

(G)

0-1.0 Dk br sil
org.
1.0-2.5 Br sil
2.5-13.0 Tan-gray
sa sil,
bitite lenses
Mottles at
4.0 ft
Water at
8.5 ft
13.0 Bottom

INDICATE NORTH - NAME ADJOINING ROADWAY AS BASE LINE.

Heatherwood Way

DATE	TEST NO.	DEPTH	PRE-WET		TEST - 1" DROP		TIME
			START	STOP	START	STOP	
2-6-91	E	9.5 V	Mottles at 3.0 ft		Water at 8.5 ft		
3-1-91	10:00 am F	12.0 V	Mottles at 1.5 ft		Water 4.0 ft		Fail
	2:45 G	13.0 V	Mottles at 4.0 ft		Water at 8.5 ft		Marg
	H	3.5 S	3:00	3:01	3:01	3:04	3 min
		12.5 D	Water at 11.5		Mottles at 4.5 ft		Marg
	3:00 pm J	13.5 V	Water at 10.0		Mottles at 2.5		Marg
			Clay to 2.0 ft.				

REMARKS Permanently

TYPE OF SOIL _____

TESTED BY Jane E. Nadeau ALSO PRESENT O. Ketterman, Jr.

APPLICATION

PERCOLATION TESTING

A 38653

P _____

HOWARD COUNTY HEALTH DEPARTMENT
BUREAU OF ENVIRONMENTAL HEALTH
P.O. BOX 476 ELLICOTT CITY, MARYLAND 21043
TELEPHONE: 461-9933

DISTRICT 3

DATE 12-16-1986

TO: THE COUNTY HEALTH OFFICER
ELLICOTT CITY, MARYLAND

I, HEREBY, APPLY FOR THE NECESSARY TEST IN ORDER TO CONSTRUCT (OR RECONSTRUCT) A SEWAGE DISPOSAL SYSTEM.

PROPERTY OWNER WILLOW SPRINGS LIMITED PARTNERSHIP
16801 WESLEY CHAPEL ROAD
ADDRESS MONKTON, MARYLAND 21111 PHONE 347-8700

PROSPECTIVE BUYER _____
ADDRESS _____ PHONE _____

PROPERTY LOCATION: Highlands
SUBDIVISION WILLOW SPRINGS GOLF COURSE LOT NO. 28
ROAD AND DESCRIPTION N/S U.S. RTE 70 N AT LIVE STOCK ROAD

TAX MAP 9 & 15 PARCEL # 151 & 11
SIZE OF LOT 3.3 Ac. ± TYPE BLDG. S.F.D.
(SINGLE FAMILY DWELLING OR COMMERCIAL)

THE SYSTEM INSTALLED UNDER THIS APPLICATION IS ACCEPTABLE ONLY UNTIL PUBLIC FACILITIES BECOME AVAILABLE. I FULLY UNDERSTAND THE FEE CONNECTED WITH THE FILING OF THIS PERC TEST APPLICATION IS NON-REFUNDABLE UNDER ANY CIRCUMSTANCES. I ALSO AGREE TO COMPLY WITH ALL M.O.S.H.A. REQUIREMENTS IN TESTING THIS LOT.

APPROVED BY Dicky Abdul FOR Standard Truck DATE 8-7-89
WILLOW SPRINGS INC GEN PARTNER
[Signature]
(SIGNATURE OF APPLICANT)

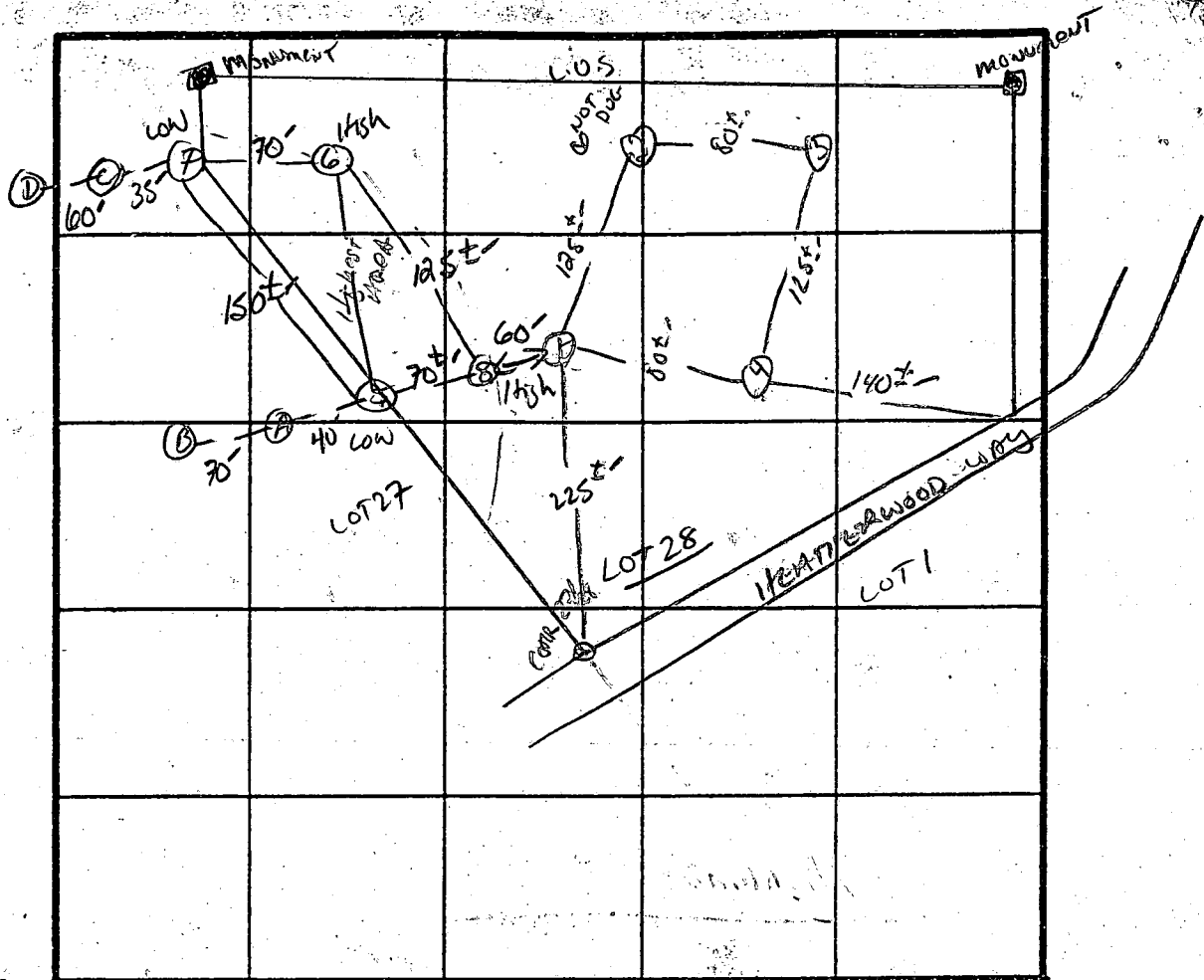
REJECTED BY _____ FOR _____ DATE _____
HOLD PENDING FURTHER TESTS _____ DATE _____

REASONS FOR REJECTION OR HOLDING 4-15-87 Perc. Unsat. factory; High H₂O table; no room for movement. Sited
5-5-87 Hold for MAT showing all holes; Provide adequate house & well site; less than
10K \$ PERC AREA MUST SHOW additional Area up hill. Sited

THIS IS NOT A PERMIT

SOIL PROFILE

0



INDICATE NORTH - NAME ADJOINING ROADWAY AS BASE LINE

C = 7 FE WATER

D = GROSS MOTTUNG TO 2-3'

WATER AT ~ 4.6'

A - WATER AT 7.5'

B - MOTTUNG TO 3' WATER AT 5'

DATE	TEST NO.	DEPTH	PRE-WET		TEST - 1' DROP		TIME
			START	STOP	START	STOP	
4/15/87	1 S	4"	12:49	12:51	12:51	12:55	4 MIN
	1 M	7.5"	12:49	12:53	12:53	12:59	6 MIN
	1 V	WATER AT 9"					
	2 V	WATER AT 8.5"					
5/5/87	3 V	WATER AT 5.5"					
	4 V	WATER AT 6.5"					
	5 V	3.5" - 12.5" WATER AT 9 FE	10:14	10:18	10:18	10:26	8 MIN
	6 S	4"	10:22	10:25	10:25	10:30	5 MIN
	6 M	8"	10:18	10:20	10:20	10:23	3 MIN
	6 V	12.5" UNIFORM SOIL BELOW	3.5-4.0'				
	7 S	4"	10:29	10:34	10:34	10:47	13 MIN
	7 V	12.5" WATER AT 9 FE					
8 V	12" DRY TO 12" UNIFORM BELOW 3.5"						

REMARKS: HOLES AS HIGH AS POSSIBLE TO SAVE WELL & HOUSE / 5/5/87 PROB NO HOUSE OR WELL SITE:
 HOLD FOR REVIEW SA
 TYPE OF SOIL: Chester - Glenville
 TESTED BY: S. Abel
 ALSO PRESENT: D-KETTERMAN

EH-12-1079

SIDE

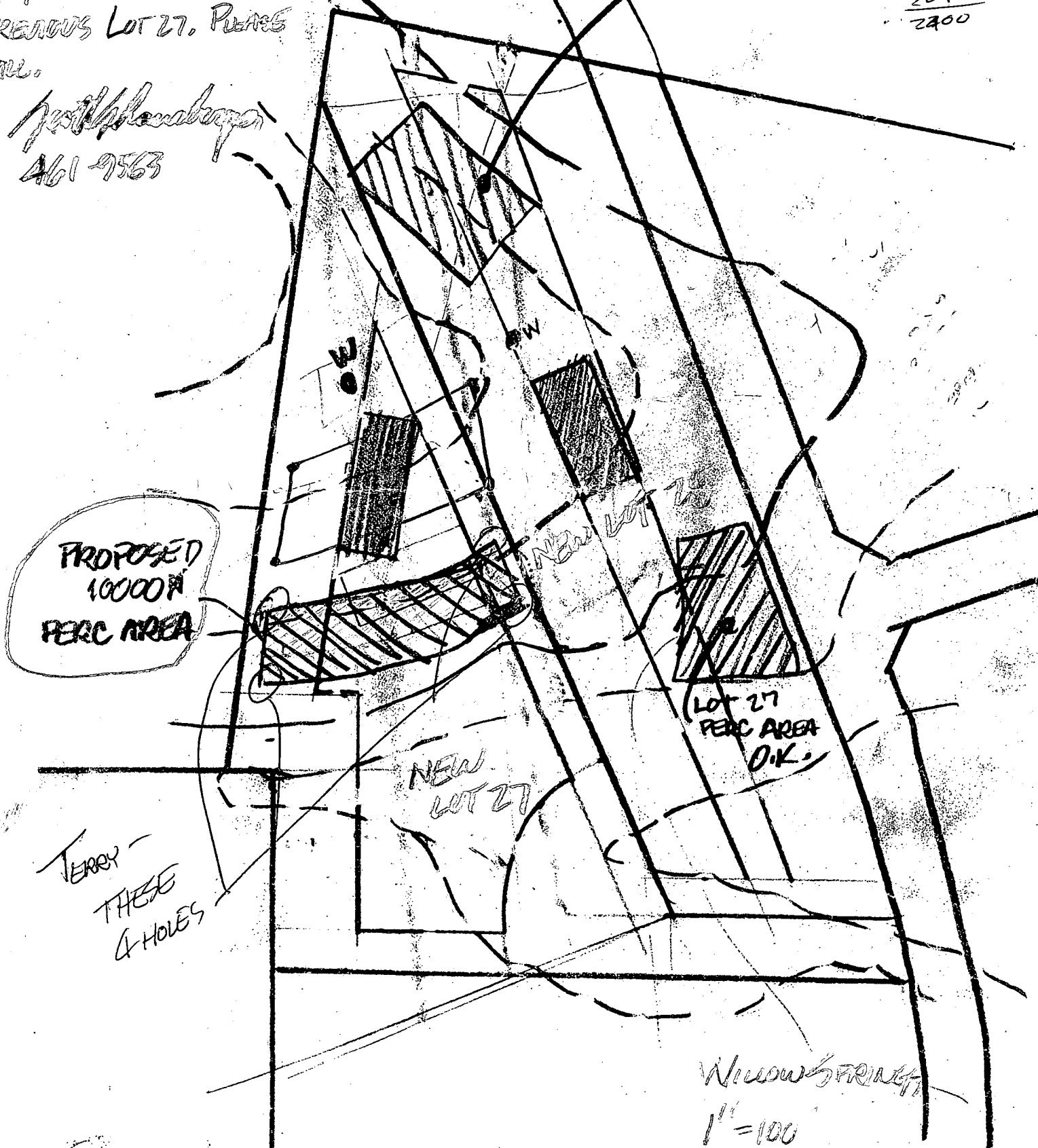
I THINK THIS MAY WORK FOR
LOTS 27 & 28 @ WILLOW SPRINGS. I HAVE MOVED LOT
LINES AROUND & PUT PROPOSED PERC AREA
HIGHER THAN ONE THAT PASSED ON
PREVIOUS LOT 27. PLEASE
CALL.

LOT 28 PERC AREA
FAILED

32
75
107
224
2400

Northumberland
461-9563

PROPOSED
10000^{sq}
PERC AREA



LOT 27
PERC AREA
O.K.

NEW
LOT 27

NEW LOT 28

TERRY -
THESE
4 HOLES

Willow Springs
1" = 100'

SOIL DESCRIPTION

NAME Willow Highlands Lot-28 COUNTY Howard FILE NO A38653
 SOIL MAP UNIT _____ MAP SYMBOL _____ DATE 3-13-91
 GEOLOGIC MATERIAL Schist ELEVATION _____ GRID NO _____ E
 NO. L DESCRIBED BY Jane Madreau _____ N

Horizon	Depth in.	Color		Texture	Structure		% Rock Fragments	Notes (Moisture, Density, Biopores, Seepage)
		Matrix	Mottles		Grade	Type		
O	0"-7"	10YR 3/4	N/A	sh	Mod. Coarse	Blocky	N/A	Root hairs, pores, grubs
A	7"-23"	7.5YR 5/8	N/A	sic1	Weak Medium	Blocky	N/A	Small zones of black stains within matrix
B	23"-96"	10YR 5/8	7.5YR 5/8 2.5YR 7/4	ssil	Weak Medium	Granular	~5%	Mottles and black stains throughout, micaceous

LANDSCAPE

Position

Summit _____
 Shoulder X
 Sideslope _____
 Footslope _____
 Depression _____
 Upland X
 Terrace _____
 Floodplain _____

Slope

Percent 6-10 ±
 Shape convex

SOIL DRAINAGE CLASS

ED _____ MWD _____ PD _____
 WD _____ SPD X VPD _____

WATER TABLE

9 ft ±

LIMITING ZONE

7"-23" sic1

SOIL CLASSIFICATION

sic1

TEST DATA

NAME	Willow Highlands Lot-28	FILE NO	A 38653
LOCATION	Heatherwood Way	COUNTY	Howard
		DATE	3-13-91
		GRID	
RECORDED BY	Jane Nadesan		

HOLE NO.	TEST NO.	DEPTH	CLOCK TIME	ELAPSED TIME	MEASUREMENT	REMARKS (Method, Moisture, Biopores)
K	1	36in	11:37	—	11 1/4 in	single ring infiltrometer Light snow, sleet Dark yellow brown sandy silty loam 24 37 40 37.7 <hr style="width: 50px; margin-left: 0;"/> ÷ 4 <div style="border: 1px solid black; padding: 5px; display: inline-block;">34.7 min/inch</div>
			12:01	24 min	12 1/4	
	2		12:03	—	11 1/8	
			12:27	24 min	11 6/8	
			12:40	37 min	12 1/8	
	3		12:44	30 min	11 in	
			1:29	45 min	12 1/8	
	4		1:35	—	10 7/8	
			1:45	10 min	11 1/8	
			2:00	33	11 6/8	

TEST DATA

NAME <u>Willow Highlands Lot-28</u>	FILE NO <u>A 38653</u>
LOCATION <u>Heatherwood Way</u>	COUNTY <u>Howard</u>
	DATE <u>3-13-91</u>
	GRID _____ E
RECORDED BY <u>Jane E. Nodera</u>	N

HOLE NO.	TEST NO.	DEPTH	CLOCK TIME	ELAPSED TIME	MEASUREMENT	REMARKS (Method, Moisture, Biopores)
(L)	1	17 in 37 62	12:23	—	13 in	Single ring infiltrometer Light snow, sleet strong brown s/d <div style="border: 1px solid black; padding: 2px; display: inline-block;">166.4 min/inch</div>
			12:48	25 min	13 1/8	
			1:15	52 min	13 3/8	
			1:53	90 min	13 7/8	
			2:07	104 min	13 5/8	

SOIL DESCRIPTION

NAME Lot-28 Willow Highlands COUNTY Howard FILE NO 38653
 SOIL MAP UNIT _____ MAP SYMBOL _____ DATE 3-13-91
 GEOLOGIC MATERIAL Schist ELEVATION _____ GRID NO _____ E
 NO. K DESCRIBED BY Jane E. Nadeau _____ N

Horizon	Depth in.	Color		Texture	Structure		% Rock Fragments	Notes (Moisture, Density, Biopores, Seepage)
		Matrix	Mottles		Grade	Type		
O	0-8"	10YR 3/4	N/A	sl	Strong Coarse	Blocky	N/A	Fine roots, organic mat
A	8"-15"	7.5YR 4/6	N/A	sl	Mod. Medium	Crumbly	< 3%	Slight amount of decomp. rock frags Micaceous veins
B	15"-126"	10YR 4/6	7.5YR 5/8	sa sl	Weak Very Fine	Granular	< 10%	Some weathered, decomp. rock frags, Dark black staining

LANDSCAPE

Position

Summit X Depression _____
 Shoulder _____ Upland X
 Sideslope _____ Terrace _____
 Footslope _____ Floodplain _____

Slope

Percent 2-4%
 Shape convex

SOIL DRAINAGE CLASS

ED _____ MWD _____ PD _____
 WD X SPD _____ VPD _____

WATER TABLE

10.0 ft

LIMITING ZONE

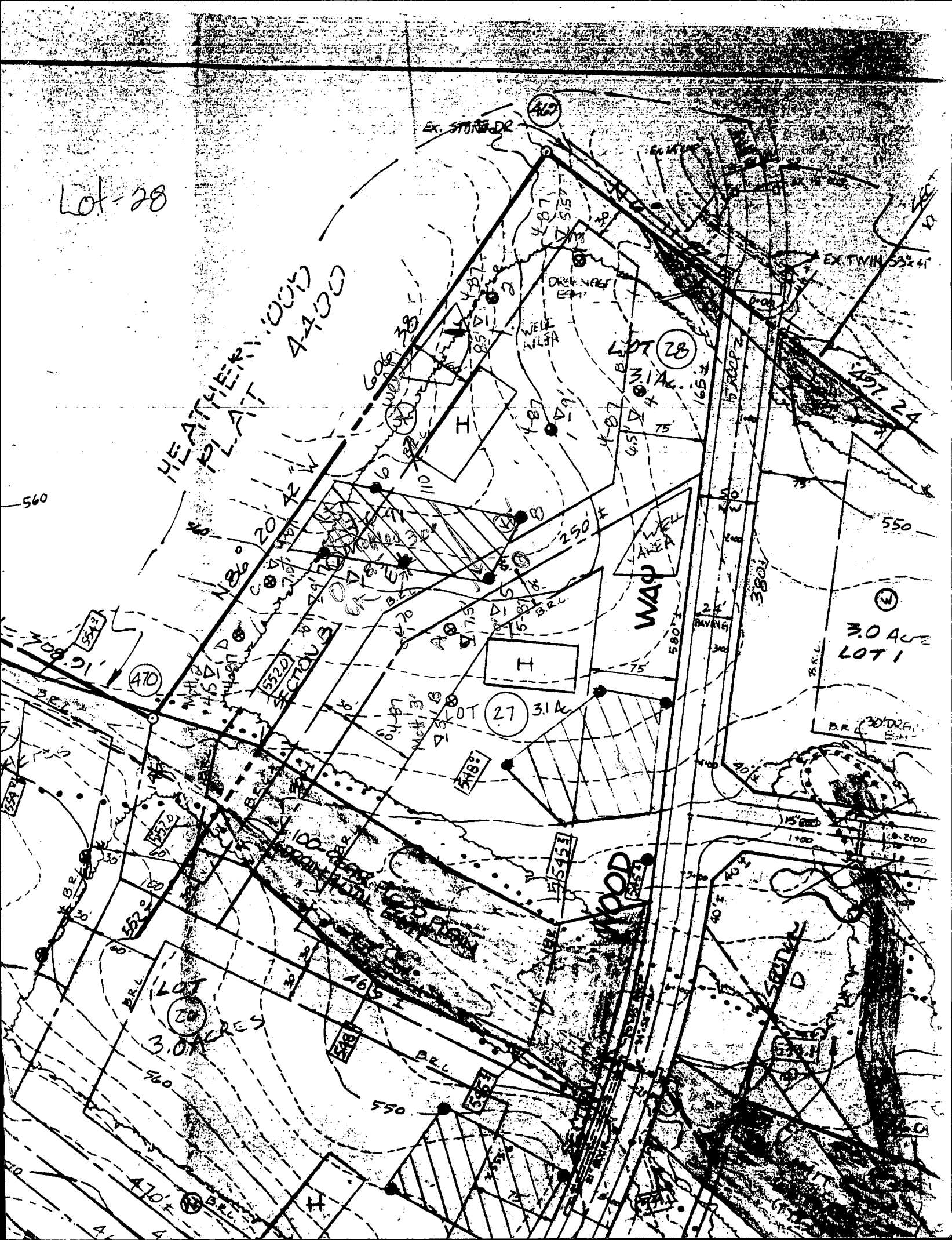
None

SOIL CLASSIFICATION

3881

Lot-28

HEATSEIER
PLAT 1000
4400



LOT 28
3.1 A.

LOT 27
3.1 A.

LOT 20
3.0 ACRES

3.0 AVE
LOT 1

WAP

WOOD

EX. STORAGE DR

EX. TWIN 53x41

DRAINAGE

WELL

SECTIONS 3

SECTIONS 4

560

550

550

510

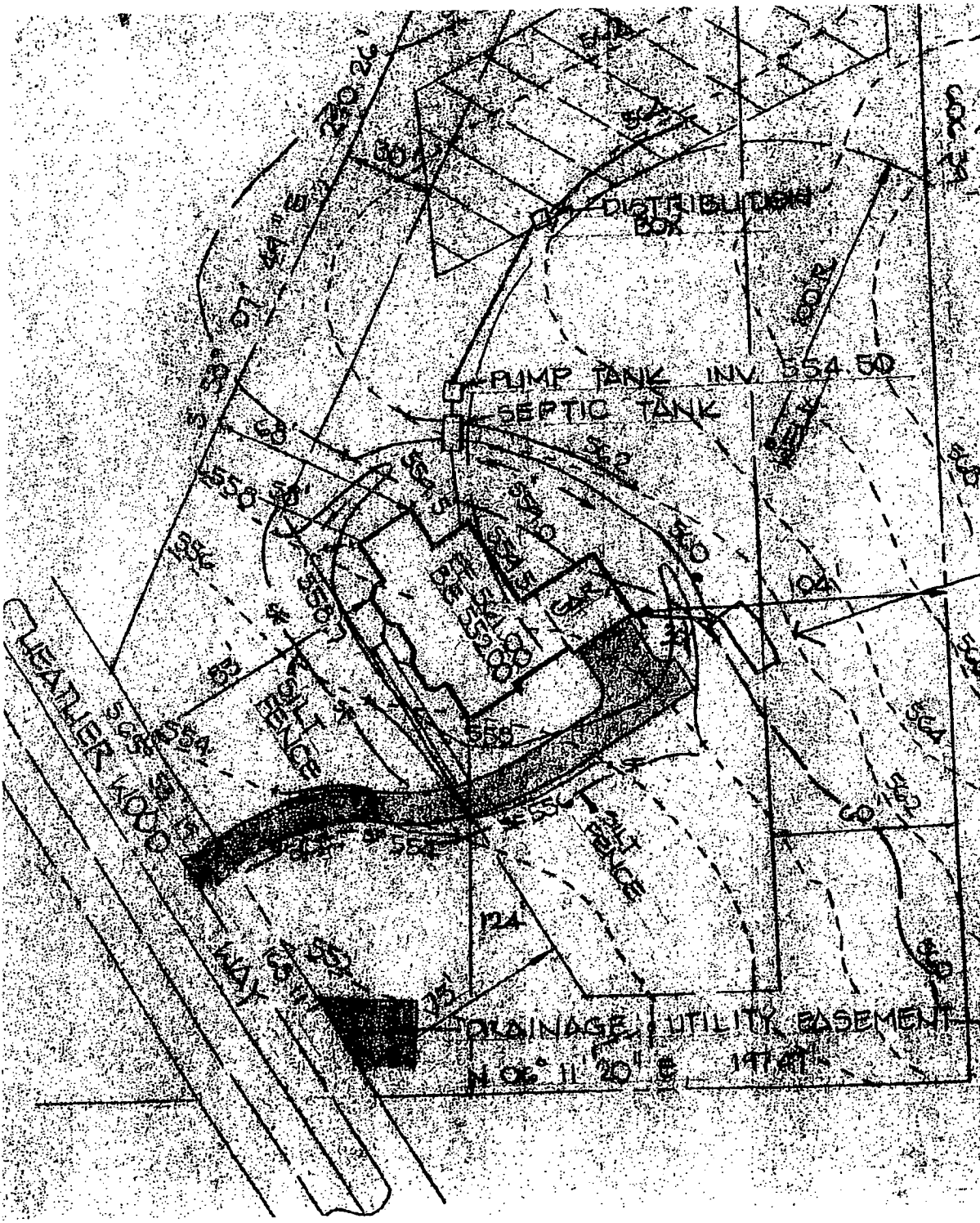
510

470

470

41

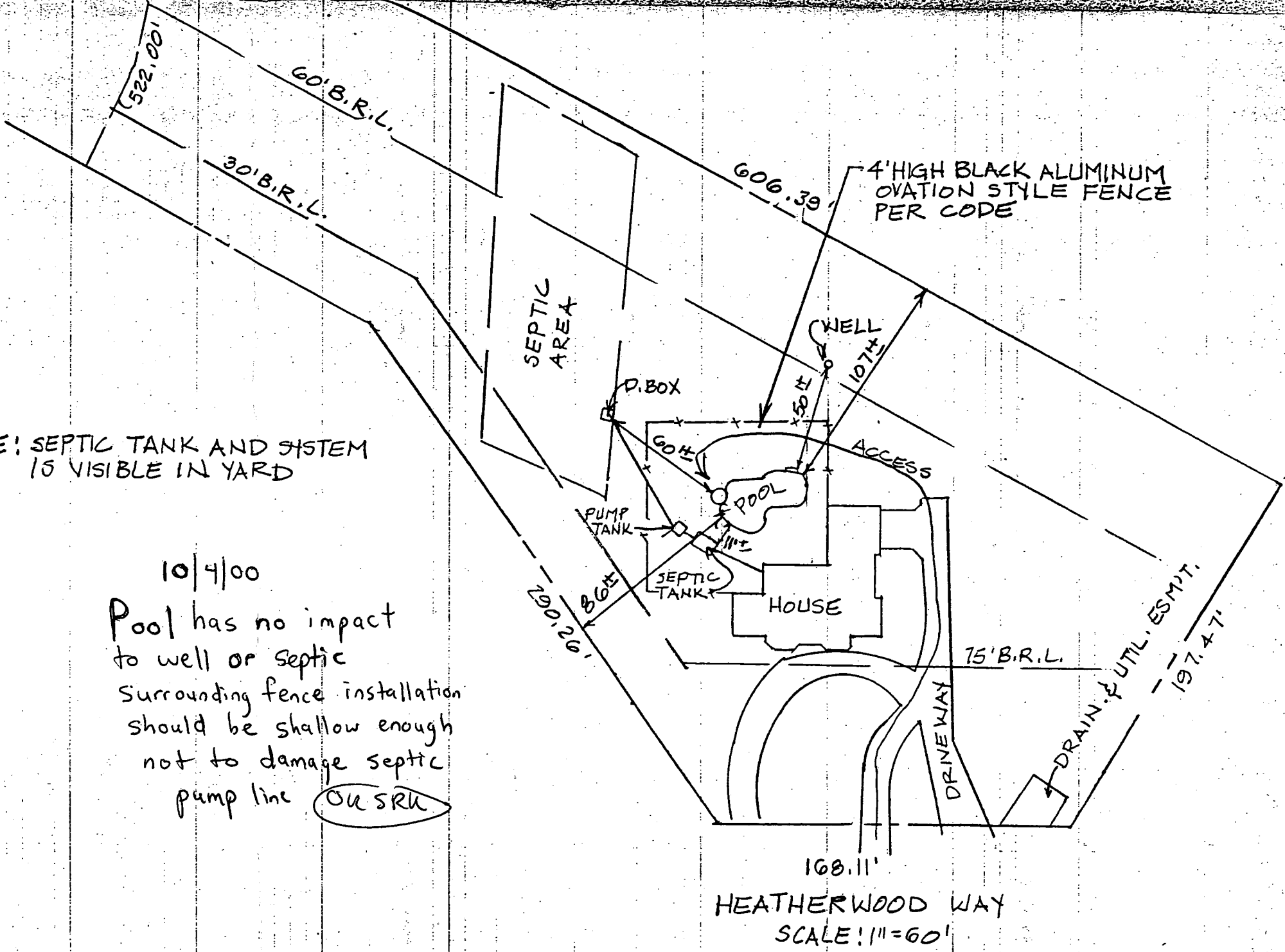
41



- 1000 Gals Tank
 - (3) FURNACE
 (1) COOLTDR
 (2) 75 gal HOT WATER HEATER
 DRIVER
 Proposed Tank Location
 * Heating & power
 *

PLAN TO ACCOMPANY
 APPLICATION FOR
 BUILDING PERMIT

LOT 28
 WILLOW HIGHLANDS AT
 WILLOW SPRINGS GOLF CO
 5th ELECTION DIST. HOWARD CO. MO
 APRIL, 2000 SCALE 1"=50'



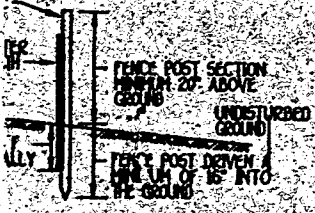
NOTE: SEPTIC TANK AND SYSTEM IS VISIBLE IN YARD

10/4/00
 Pool has no impact to well or septic
 Surrounding fence installation should be shallow enough not to damage septic pump line OR SRK

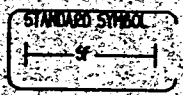
MINIMUM HEIGHT OF 16" INTO

MINIMUM HEIGHT OF GEOTEXTILE CLASS F

MINIMUM DEPTH IN GROUND



CROSS SECTION



1. Minimum height into the ground shall be 16" minimum into the ground, or 1 3/4" diameter for wood. Steel posts will be 100 pound per linear foot.

2. Fence post with wire ties shall meet the following requirements:

- Test: MHT 509
- Test: MHT 509
- Test: MHT 322
- Test: MHT 322

3. If they shall be overlapped.

4. If event and maintained when shall be 50% of the fabric height.

RT

10 YEAR FLOOD PLAIN DRAINAGE BASEMENT

58° 20' 42" E 315' 00"

58° 20' 42" E 606' 39"

LOT 28

3.012 AC±

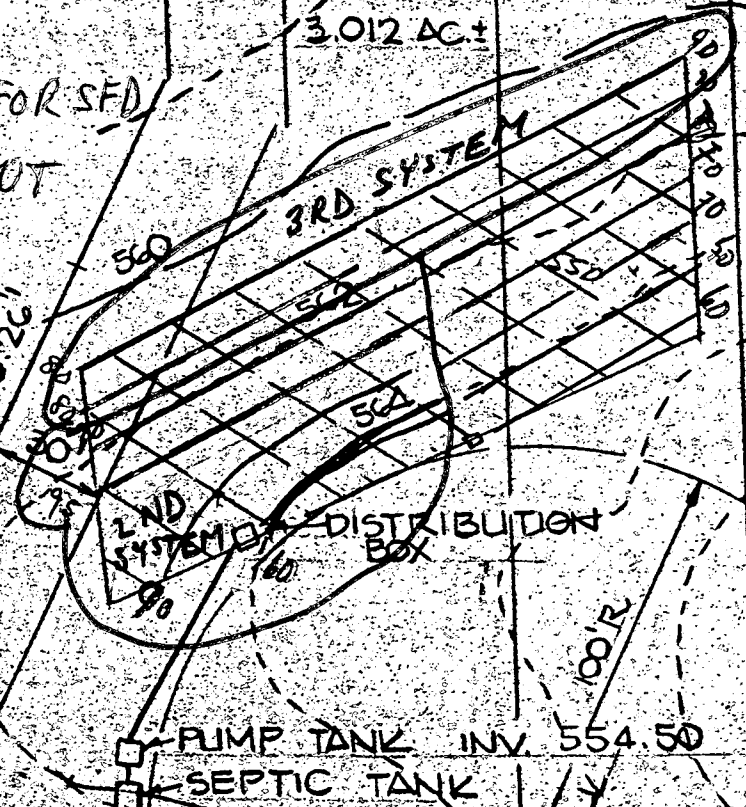
GENERAL

1. SEPTIC No.
2. PROPOSED
3. A. FIRE
4. B. BAS
5. C. DIVE
6. D. DIVE
7. E. DIVE
8. F. PROI
9. G. DIVE
10. H. EXOS
11. LENGTH
12. ISQUAN
13. CONTR
14. ANY CC
15. THERE

5/22/00 @ BP REVIEW FOR SED
 3 SYSTEMS LAID OUT
 ~340' EACH.

NO ROOM FOR ADJUSTMENT
 TO SEPTIC AREA
 NO ROOM TO SUPPORT
 ADDITIONS WHICH
 GENERATE AN
 INCREASE IN FLOW

ADJ. WELL (MR)



HEATING

WELL

BE

GAR.

WELL

WELL

WELL

WELL

WELL

WELL

WELL

WELL

WELL



7/26/2000
10 AM

HOWARD COUNTY HEALTH DEPARTMENT
Bureau of Environmental Health
3525-H Ellicott Mills Drive
Ellicott City, MD 21043
461-9933

APPLICATION FOR PITLESS ADAPTER, WELL PUMP AND PRESSURE TANK INSTALLATION

New Installation
Replacement

Receipt # _____
Date 7/25/2000

Name of Installer GREG C. FRYFOGLE PLUMBING INC.

Telephone 410-875-0300

License Number 9081

Certified Well Pump Installer _____ Well Driller _____ Registered Plumber

Name of Property Owner CATONSVILLE BLDGS

Telephone 410-750-1200

Subdivision WILLOW SPRINGS Lot # 2B

Well Tag # ~~HO-88-0975~~ HO-88-0975 ***

Site Address 1760 HEATHERWOOD WAY

HO-88-0975

Pump

- 1. Type
 - a. Deep well jet _____
 - b. Shallow well jet _____
 - c. Submersible
- 2. Make JACOZZI
- 3. Model # SANDHOLE
- 4. Capacity 10 GPM
- 5. Pump exceeds well capacity Yes _____ No
- 6. If Yes, is low pressure cutoff switch installed? Yes No _____
- 7. What methods are used to protect the pump and electrical wiring from vibrations? Torque arrestors _____ Cable guards Other _____

- Motor
- 1. Horsepower 1/2
- 2. RPM _____
- 3. Voltage _____
 - a. 110 _____
 - b. 220

- Pitless Adapter
- 1. Make HAUSER
- 2. Model # PT800
- 3. Depth 42"

Tank

- 1. Capacity WK250
 - 2. Pressure relief valve? YES
- 7/26/00 WPI OK 5' B.G.
MR 2PC CAP & CONDUIT OK

- Piping
- 1. Type POLYETHYLENE
- 2. Size 1"
- 3. NSF and/or BOCA Code approved YES
- 4. Depth of supply line 42"

- Well data
- 1. Depth 165 ft.
- 2. Yield 10 GPM
- 3. Static water level 12 ft.
- 4. Will water supply be disinfected by installer? NO

I understand that it is my responsibility to notify the Howard County Health Department when the installation is ready for inspection (otherwise this permit is null and void).

All information given above is true to the best of my knowledge.

Signature of Applicant: [Signature]

Date: 7/25/2000

Note: A sticker indicating approval/status of the installation will be placed on the well casing at the time of the inspection.

C1 1098 SEQUENCE NO. (DENV USE ONLY)

(THIS NUMBER IS TO BE PUNCHED IN COLS. 3-6 ON ALL CARDS)

STATE OF MARYLAND WELL COMPLETION REPORT

THIS REPORT MUST BE SUBMITTED WITHIN 45 DAYS AFTER WELL IS COMPLETED.

COUNTY NUMBER A-386-53

ST/CO USE ONLY DATE Received 062589

DATE WELL COMPLETED 081589

Depth of Well 165 (TO NEAREST FOOT)

PERMIT NO. FROM "PERMIT TO DRILL WELL" H-SC-0979

OWNER last name first name TOWN SUBDIVISION SECTION LOT

WELL LOG Not required for driven wells STATE THE KIND OF FORMATIONS PENETRATED, THEIR COLOR, DEPTH, THICKNESS AND IF WATER BEARING

Table with columns: DESCRIPTION (Use additional sheets if needed), FEET (FROM, TO), Check if water bearing. Includes handwritten entries: Top Soil, Sandy, Sandstone, MICKA, Sandstone, MICKA.

GROUTING RECORD WELL HAS BEEN GROUTED (Y) (N) TYPE OF GROUTING MATERIAL CEMENT (CM) BENTONITE CLAY (BC) NO. OF BAGS 7 NO. OF POUNDS 300

CASING RECORD casing types insert appropriate code below (S) (T) (C) (O) (P) (L) (R) (J) (S)

MAIN CASING TYPE Nominal diameter top (main) casing (nearest inch) Total depth of main casing (nearest foot)

OTHER CASING (if used) diameter inch depth (feet) from to

SCREEN RECORD screen type or open hole insert appropriate code below (S) (T) (C) (O) (P) (L) (R) (J) (S)

DEPTH (nearest ft.) HO 115

CIRCLE APPROPRIATE LETTER A A WELL WAS ABANDONED AND SEALED WHEN THIS WELL WAS COMPLETED E ELECTRIC LOG OBTAINED P TEST WELL CONVERTED TO PRODUCTION WELL

I HEREBY CERTIFY THAT THIS WELL HAS BEEN CONSTRUCTED IN ACCORDANCE WITH COMAR 26.04.04 "WELL CONSTRUCTION" AND IN CONFORMANCE WITH ALL CONDITIONS STATED IN THE ABOVE CAPTIONED PERMIT, AND THAT THE INFORMATION PRESENTED HEREIN IS ACCURATE AND COMPLETE TO THE BEST OF MY KNOWLEDGE.

DRILLERS IDENT. NO. 273

DRILLERS SIGNATURE (MUST MATCH SIGNATURE ON APPLICATION)

SITE SUPERVISOR (sign. of driller or journeyman responsible for sitework if different from permittee)

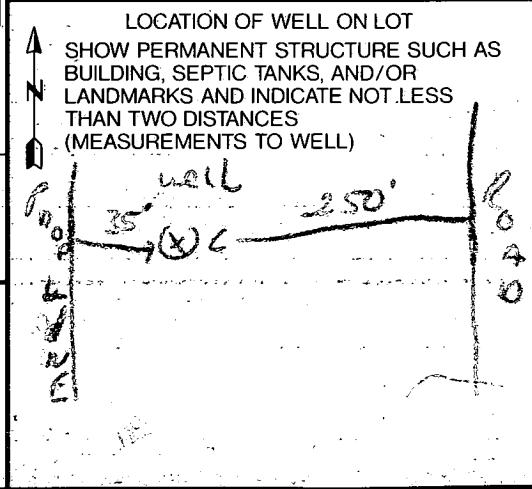
SLOT SIZE 1 2 3 DIAMETER OF SCREEN (NEAREST INCH)

GRAVEL PACK IF WELL DRILLED WAS FLOWING WELL INSERT F IN BOX 68

OEP USE ONLY (NOT TO BE FILLED IN BY DRILLER) T (E.R.O.S.) W Q 70 72 74 75 76 TELESCOPE CASING LOG INDICATOR OTHER DATA

PUMPING TEST HOURS PUMPED (nearest hour) 2 PUMPING RATE (gal. per min. to nearest gal.) 10 METHOD USED TO MEASURE PUMPING RATE Bucket WATER LEVEL (distance from land surface) BEFORE PUMPING 12 WHEN PUMPING 22 TYPE OF PUMP USED (for test) A air P piston T turbine C centrifugal R rotary O other (describe below) J jet S submersible

PUMP INSTALLED DRILLER WILL INSTALL PUMP YES (NO) IF DRILLER INSTALLS PUMP, THIS SECTION MUST BE COMPLETED FOR ALL WELLS EXCEPT HOME USE TYPE OF PUMP INSTALLED PLACE (A,C,J,P,R,S,T,O) IN BOX - SEE ABOVE: CAPACITY: GALLONS PER MINUTE (to nearest gallon) PUMP HORSE POWER PUMP COLUMN LENGTH (nearest ft.) CASING HEIGHT (circle appropriate box and enter casing height) 4 above LAND SURFACE 1 (nearest foot)



B 1 **7975** SEQUENCE NO. (DP USE ONLY)
 (THIS NUMBER IS TO BE PUNCHED IN COLS. 3-6 ON ALL CARDS)

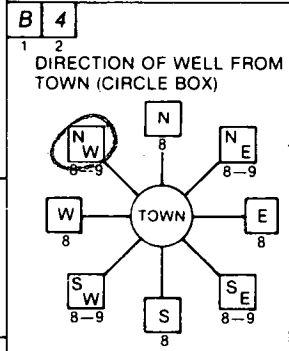
STATE OF MARYLAND
 PERMIT TO DRILL WELL
 please print or type

STATE PERMIT NUMBER
#0-88-0975
 fill in this form completely

Date Received (APA) **062989**
 OWNER INFORMATION
WILLOW SP Limited
 15 Last Name 8 Owner 13 First Name 34
16801 Westley CH RD
 36 Street or RFD 55
MONTGOMERY 57 Town 70 State 72 Zip 76

B 3 LOCATION OF WELL
HOWARD 8 COUNTY 21
WILLOW HIGHLAND 23 SUBDIVISION 42
 SECTION **44-46** LOT **28** 48 50
WESTFRIENDSHIP 52 NEAREST TOWN 71
 MILES FROM TOWN (enter 0 if in town) **1** 73 76 77 78

DRILLER INFORMATION
Ralph MAYNE 77 License No. 80 **223**
 Driller's Name
Ralph MAYNE Well Drilling
 Firm Name
9120 Brown Church Rd. Mt Airy
 Address
Ralph Mayne 6/13/89
 Signature Date



Heatherwood BRWAY 11 NEAR WHAT ROAD 30
 ON WHICH SIDE OF ROAD (CIRCLE APPROPRIATE BOX)
 NORTH SOUTH WEST EAST
150 34 37 DISTANCE FROM ROAD
 ENTER FT or MI **FT** 38 39

B 2 WELL INFORMATION
 APPROX. PUMPING RATE (GAL. PER MIN.) **5** 8 12
 AVERAGE DAILY QUANTITY NEEDED (GAL. PER DAY) **500** 14 20

USE FOR WATER (CIRCLE APPROPRIATE BOX)
 HOME (SINGLE OR DOUBLE HOUSEHOLD UNIT ONLY)
 FARMING (LIVESTOCK WATERING & AGRICULTURAL IRRIGATION)
 INDUSTRIAL, COMMERCIAL, STATE AND FEDERAL GOV. OTHER (REQUIRES APPROPRIATION PERMIT)
 PUBLIC OR PRIVATE WATER COMPANY (REQUIRES APPROPRIATION PERMIT AND STATE HEALTH DEPARTMENT APPROVAL)
 TEST, OBSERVATION, MONITORING (MAY REQUIRE APPROPRIATION PERMIT)

NOT TO BE FILLED IN BY DRILLER HEALTH DEPARTMENT APPROVAL
Howard COUNTY NAME
A 38653 COUNTY NO.
 STATE SIGNATURE _____ INSERT
 DATE ISSUED **080489** CO SIGNATURE **Craig Williams JMW** EXP. DATE _____
 NORTH GRID **541000** EAST GRID **0807000**
 50 55 57 63

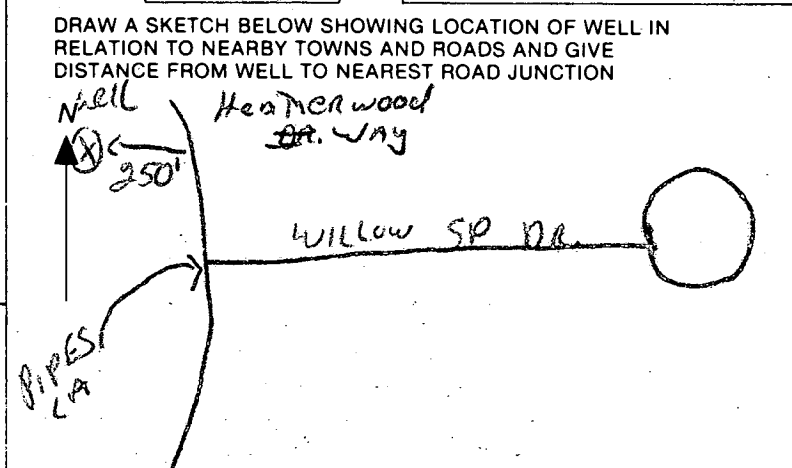
APPROXIMATE DEPTH OF WELL **1150** 24 28 FEET

APPROXIMATE DIAMETER OF WELL **6"** NEAREST INCH

METHOD OF DRILLING (circle one)
 BORED (or Augered) JETTED Jetted & DRIVEN
 AIR-ROTARY AIR-PERCussion ROTARY (Hydraulic Rotary)
 CABLE REVERSE-ROTARY DRIVE-POINT
 other _____

SHOW MAJOR FEATURES OF BOX & LOCATE WELL WITH AN X
8/15/89 9:30
 SOURCES OF DRILLING WATER
 1. well
 2. 30 ft casing
 25 ft open hole
 7 bags cement
 1 ft above grade
 Location ok
 WRITE THE BOX NUMBER FROM THE MAP HERE
 E **8007**
 N **5491**
 000 000
JENadeau

REPLACEMENT OR DEEPEMED WELLS (CIRCLE APPROPRIATE BOX)
 THIS WELL WILL NOT REPLACE AN EXISTING WELL
 THIS WELL WILL REPLACE A WELL THAT WILL BE ABANDONED AND SEALED
 THIS WELL WILL REPLACE A WELL THAT WILL BE USED AS A STANDBY
 THIS WELL WILL DEEPEM AN EXISTING WELL
 PERMIT NUMBER OF WELL TO BE REPLACED OR DEEPEMED (IF AVAILABLE) _____ 41 52



Not to be filled in by driller (OEP USE ONLY)
 APPROP. PERMIT NUMBER _____ GAP _____ 54 63
 FORCE **CW** WRITE INITIALS IN BOX PERMIT NO. **#0-88-0975**
 67 68 70 71 72 73 74 75 76 77 78 79

SPECIAL CONDITIONS

