

C1 56740

SEQUENCE NO. (MDE USE ONLY)

STATE OF MARYLAND WELL COMPLETION REPORT

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

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

FILL IN THIS FORM COMPLETELY PLEASE TYPE

COUNTY NUMBER

XIII

ST/CO USE ONLY

DATE WELL COMPLETED

Depth of Well

PERMIT NO. FROM "PERMIT TO DRILL WELL"

DATE RECEIVED MM 01 DD 28 19

MM 12 DD 27 YY 18

APPROVED 02/01/2019

300 (TO NEAREST FOOT)

HO-17-0347

OWNER Heritage Land Development

WELL SITE ADDRESS last name Daisy Road first name TOWN Woodbine

SUBDIVISION Linden Grove SECTION LOT 8

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, FEET (FROM, TO), check if water bearing. Rows include Soil, Light Brown shale, Brown shale, Gray Rock, Soft Gray Rock, Gray Rock.

GROUTING RECORD

WELL HAS BEEN GROUTED (Circle Appropriate Box) YES [Y] NO [N]

TYPE OF GROUTING MATERIAL (Circle one)

CEMENT [CM] BENTONITE CLAY [BC]

NO. OF BAGS 20 NO. OF POUNDS 1500

GALLONS OF WATER 100

DEPTH OF GROUT SEAL (to nearest foot) from 0 ft. to 45 ft.

CASING RECORD

ST STEEL CO CONCRETE PL PLASTIC OT OTHER

MAIN CASING TYPE PL Nominal diameter top (main) casing 6 inches Total depth of main casing 45 feet

OTHER CASING (if used)

PL 4 1/2 inch diameter 40 feet depth

SCREEN RECORD

ST STEEL BR BRASS HO OPEN HOLE PL PLASTIC OT OTHER

DEPTH (nearest ft.) HO 45 300

NUMBER OF UNSUCCESSFUL WELLS: 0

WELL HYDROFRACTURED YES [Y] NO [N]

CIRCLE APPROPRIATE LETTER A WELL WAS ABANDONED AND SEALED WHEN THIS WELL WAS COMPLETED

I HEREBY CERTIFY THAT THIS WELL HAS BEEN CONSTRUCTED IN ACCORDANCE WITH COMAR 26.04.04 "WELL CONSTRUCTION"

DRILLERS LIC. NO. M 4D 355

DRILLERS SIGNATURE (MUST MATCH SIGNATURE ON APPLICATION)

LIC. NO. D 113

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

C 2

Table with columns: A, C, E, N. Rows for casing types and slot sizes.

DIAMETER OF SCREEN (NEAREST INCH) 56 to 60

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

MDE 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

C 3

PUMPING TEST

HOURS PUMPED (nearest hour) 3

PUMPING RATE (gal. per min.) 8.0

METHOD USED TO MEASURE PUMPING RATE water bucket

WATER LEVEL (distance from land surface)

BEFORE PUMPING 18 ft.

WHEN PUMPING 89 ft.

TYPE OF PUMP USED (for test)

A air P piston T turbine C centrifugal R rotary O other J jet S submersible

PUMP INSTALLED

DRILLER INSTALLED PUMP (CIRCLE) (YES or NO) YES [X] NO

IF DRILLER INSTALLS PUMP, THIS SECTION MUST BE COMPLETED FOR ALL WELLS.

TYPE OF PUMP INSTALLED PLACE (A,C,J,P,R,S,T,O) IN BOX 29

CAPACITY: GALLONS PER MINUTE (to nearest gallon) 31 to 35

PUMP HORSE POWER 37 to 41

PUMP COLUMN LENGTH (nearest ft.) 43 to 47

CASING HEIGHT (circle appropriate box and enter casing height)

LAND SURFACE (nearest foot) 1

LATITUDE 39.32775 LONGITUDE 77.06581 (DEFAULT COORD. WGS 84)

Pursuant to §10-624 of the State Govt. Article of the Maryland Code personal info. requested on this form is used in processing this form pursuant to COMAR 26.04.04.

B 1 SEQUENCE NO. (MDE USE ONLY) 54293 STATE OF MARYLAND APPLICATION FOR PERMIT TO DRILL WELL please type 59039571 STATE PERMIT NUMBER HO-17-0347
70 79 fill in this form completely

B 2 DATE RECEIVED (APA) 07/13/18 OWNER INFORMATION
 8 MM DD YY 13
Heritage Land Development
 15 Last Name Owner First Name 34
PO Box 482
 36 Street or RFD 55
Hibson MD 21765
 57 Town 70 State 72 Zip 76

B 3 LOCATION OF WELL
Howard
 8 COUNTY 21
Hidden Grove
 23 SUBDIVISION 42
 SECTION 8 LOT 8
 44 46 48 50
Woodbine
 52 NEAREST TOWN 71

DRILLER INFORMATION
Michael Barbu M W D 355
 Driller's Name 76 License No. 81
Barbu Well Drilling
 Firm Name
522 Underwood Lane 2014
 Address
7/10/18
 Signature Date

B 4 SOURCES OF DRILLING WATER
 1. well
 2.
 3.
Daisy Road
 11 STREET ADDRESS 30
 ON WHICH SIDE OF ROAD (CIRCLE APPROPRIATE BOX)
 NORTH N
 WEST W EAST E
 SOUTH S
 34 1300 37
 1000
 DISTANCE FROM ROAD FT
 ENTER FT OR MI 38 39
 TAX MAP: 8 BLK: 7 PARCEL 5

B 2 WELL INFORMATION
 1 2
 APPROX. PUMPING RATE 5
 (GAL. PER MIN.) 8 12
 AVERAGE DAILY QUANTITY NEEDED 750
 (GAL. PER DAY) 14 20

USE FOR WATER (CIRCLE APPROPRIATE BOX)
 DOMESTIC POTABLE SUPPLY & RESIDENTIAL IRRIGATION
 FARMING (LIVESTOCK WATERING & AGRICULTURAL IRRIGATION)
 INDUSTRIAL, COMMERCIAL, DEWATERING
 PUBLIC WATER SUPPLY WELL
 TEST, OBSERVATION, MONITORING
 OPEN LOOP GEOTHERMAL
 CLOSED LOOP GEOTHERMAL

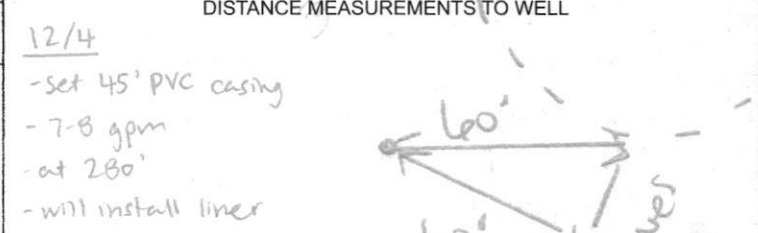
NOT TO BE FILLED IN BY DRILLER HEALTH DEPARTMENT APPROVAL
HOWARD COUNTY NAME COUNTY NO. XIII
 STATE SIGNATURE _____ INSERT S → 41
 DATE ISSUED 09/17/18 CO SIGNATURE _____ EXP. DATE _____
 43 MM DD YY 48
 DON: 12/4/18 DNI DOG: 12/5/18 Day: 7/27/2018

APPROXIMATE DEPTH OF WELL 300 FEET
 24 28

PROPOSED LOCATION OF WELL ON LOT
 SHOW PERMANENT STRUCTURES SUCH AS BUILDINGS, SEPTIC SYSTEM, ROADS AND/OR LANDMARKS AND INDICATE NOT LESS THAN TWO DISTANCE MEASUREMENTS TO WELL

APPROXIMATE DIAMETER OF WELL 6 INCH NEAREST INCH

METHOD OF DRILLING (circle one)
 BORED (or Augered) JETTED Jetted & DRIVEN
 30 AIR-ROTary AIR-PERcussion ROTARY (Hydraulic Rotary)
 37 CABLE REVerse-ROTary DRive-POINT
 other _____



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-CONTACT LOCAL APPROVING AUTHORITY FOR POLICY ON STANDBY WELLS
 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 (MDE OR COUNTY USE ONLY)
 APPROP. PERMIT NUMBER HO2017G002
 PERMIT No. HO-17-0347
 70 71 72 73 74 75 76 77 78 79

Pursuant to § 10-624 of the State Govt. Article of the Maryland Code, personal info requested on this form is used in processing this form pursuant to COMAR 26.04.04. Failure to provide the info may result in this form not being processed. You have the right to inspect, amend, or correct this form. The Maryland Department of the Environment is subject to the Maryland Public Information Act. This form may be made available on the Internet via MDE's website and is subject to inspection or copying, in whole or in part, by the public and other governmental agencies, if not protected by federal or State Law.



MICHAEL BARLOW WELL DRILLING & SERVICE, INC.
 522 Underwood Lane Bel Air, Maryland 21014
 (410) 838-6910 Fax (410) 838-3582

WELL YIELD REPORT

Date Test Completed: December 27, 2018

Well Depth: 300 feet

Customer Heritage Land Development
 Road Daisy Road
 City Woodbine
 State Maryland

Permit # HO-17-0347
 Subdivision Linden Grove
 Section _____
 Lot # 8

Time	Water Level feet PUMP SET AT 125'	Time to Fill 1-gallon bucket seconds	G.P.M.
10:15 AM	18	4	15.00
10:30 AM	90	7.5	8.00
10:45 AM	90	7.5	8.00
11:00 AM	90	7.5	8.00
11:15 AM	89	7.5	8.00
11:30 AM	89	7.5	8.00
11:45 AM	89	7.5	8.00
12:00 PM	89	7.5	8.00
12:15 PM	89	7.5	8.00
12:30 PM	89	7.5	8.00
12:45 PM	89	7.5	8.00
1:00 PM	89	7.5	8.00
1:15 PM	89	7.5	8.00
1:30 PM	89	7.5	8.00

This yield test report is for informational purposes only. Please note the yield may increase or decrease over time and the GPM indicated above is not a guarantee.

Maura J. Rossman, M.D., Health Officer

Information Form for the Installation of the Well Pump, Pitless Adapter, and Supply Piping

NOTE: The installer is responsible for requesting an inspection prior to 9 am on the day of the desired inspection. No work is to be covered until approved by the Health Department. All installations must comply with the National Standard Plumbing Code (NSPC, as amended locally) and COMAR 26.04.04 (MD Well Construction Regulations). Submission of a complete form is required prior to Use and Occupancy approval.

Company Name: Foales Well Pump & Water Treatment, LLC Telephone #: 410 795 5670
Address: 1580 Drech + Rd
Supersville, MD 21784

Must circle one: Licensed Plumber / Licensed Well Driller / Licensed Well Pump Installer
License # and name of individual responsible for the field installation:

Name (Print): David C Foales License# ms0226

*A licensed individual must perform the actual installation. Apprentices must be under the supervision of a licensed journeyman or master plumber, pump installer or well driller. Licenses may be subjected to field verification. Unlicensed individuals may be reported to the appropriate licensing agency.

Name of Property Owner: Toll Brothers Telephone #: _____
Subdivision: Linden Grove Lot #: 8 Well Tag #: HO-17-0347(S)
Site Address: 15633 Linden Grove Lane
Woodbine, MD 21797

Submersible Pump Data

Make: Grundfos
Model #: ISSAED1-F60
Pump Capacity: 15
Well Yield: 8

Pitless Adapter

Make: Cambell +
Model#: NA
GPM Depth: 36" (36" min)
GPM NSF/WSC approved: YES

Well Cap and Electric Conduit

Two piece watertight cap: YES
Screened, vented well cap: YES
Cap secured to casing: YES
Conduit min 18" B.G.: YES
Conduit secured to well cap: YES

Depth of well encountered at time of pump installation: 300 (feet)
If pump capacity exceeds well yield, a low water cut off switch is required by NSPC 1990 Section 17.8.4

Must circle one: Torque arrestors / Cable guards / Other acceptable method used
Safety rope, if used, attached to brass rope adapter or other acceptable method inside of well casing NA

Piping to house

Type: 1/2" poly pipe
PSI: 200 (160 psi min)
Depth of supply line: 36" (36" min)

House Connection

PVC sleeve to undisturbed soil at wall penetration: YES
Length of sleeve (5' minimum from foundation): 6'
Sleeve sealed properly: YES

The water supply line is required to be at least ten feet from the septic tank, pump chamber, sewage piping, distribution box, drainfields, and sewage reserve area. If this cannot be accomplished, contact this office for approval prior to installation.

Signature of company representative responsible for installation: [Signature] date: 7/7/2021

For Health Department Use Only - Not to be completed by Installer

Date Insp. Requested: <u>7/7/21</u>	Date Insp. Approved: <u>7/7/21</u>	Inspector: <u>(S)</u>
Inspection Data:	Pitless adapter watertight & water supply line at least 36" below grade	<u>✓</u> 43"
	Two piece cap installed and attached to casing securely	<u>✓</u>
	Elec. conduit extends at least 18" below grade/attached to cap properly	<u>✓</u> 43"
	Safety rope not outside of well cap/casing	<u>✓</u>
	Correct well tag attached properly and casing 8" above finished grade	<u>✓</u> 20"
	Water supply line sleeved adequately at house connection	<u>✓</u> 20"
	Adequate grout observed below pitless adapter	<u>✓</u>

(Revised form 10/24/2018)



Bureau of Environmental Health
8930 Stanford Blvd | Columbia, MD 21045
410.313.2640 - Voice/Relay
410.313.2648 - Fax
1.866.313.6300 - Toll Free

Maura J. Rossman, M.D., Health Officer

INTERIM CERTIFICATE OF POTABILITY

Expiration Date – April 29, 2021

October 29, 2021

Homeowner
15633 Linden Grove Lane
Woodbine, MD 21797

**RE: Linden Grove, Lot 8
15633 Linden Grove Lane
Building Permit: B21000405
Well Permit: HO-17-0347**

Dear Homeowner:

This is to advise you that the septic system installation and water well construction for the above referenced property have been inspected and approved. Final approval of the septic system was granted on **8/12/2021**. Final approval of the well line connection to the dwelling was granted on **7/7/2021**. The well construction was completed on **12/27/2018**. Water samples were collected on **10/18/2021, 10/20/2021, 10/29/2021**.

The water sample results indicate that the water samples submitted for testing were free of coliform and fecal coliform bacteria at the time of sampling and are bacteriologically safe for drinking. This certifies that the initial sampling requirements of COMAR 26.04.04 "Well Regulations" have been met for the water supply system installed under well permit HO-17-0347. Although the submitted sample results are in compliance with COMAR standards, the Health Department does not guarantee water supplies.

This Interim Certificate of Potability will expire **six months** from the date of issuance. Submission of a second bacteriological test indicating the water is free of coliform and fecal coliform bacteria is required prior to the expiration date, after which time a Final Certificate of Potability will be issued. **Failure to submit an additional sample and obtain a Final Certificate of Potability will result in a Notice of Violation and is punishable as a misdemeanor under the Annotated Code of Maryland, Environment Article, 9-1311, subject to a fine of up to \$500 or imprisonment not to exceed three months.**

Please contact (410) 313-1773 to schedule a final water sample appointment or contact a Maryland certified water laboratory to schedule a water sample. A list of laboratories certified by the state of Maryland may be found at the following website:
<http://www.mde.state.md.us/assets/document/WSP-Labs-2010apr16.pdf>



Bureau of Environmental Health
8930 Stanford Blvd | Columbia, MD 21045
410.313.2640 - Voice/Relay
410.313.2648 - Fax
1.866.313.6300 - Toll Free

Maura J. Rossman, M.D., Health Officer

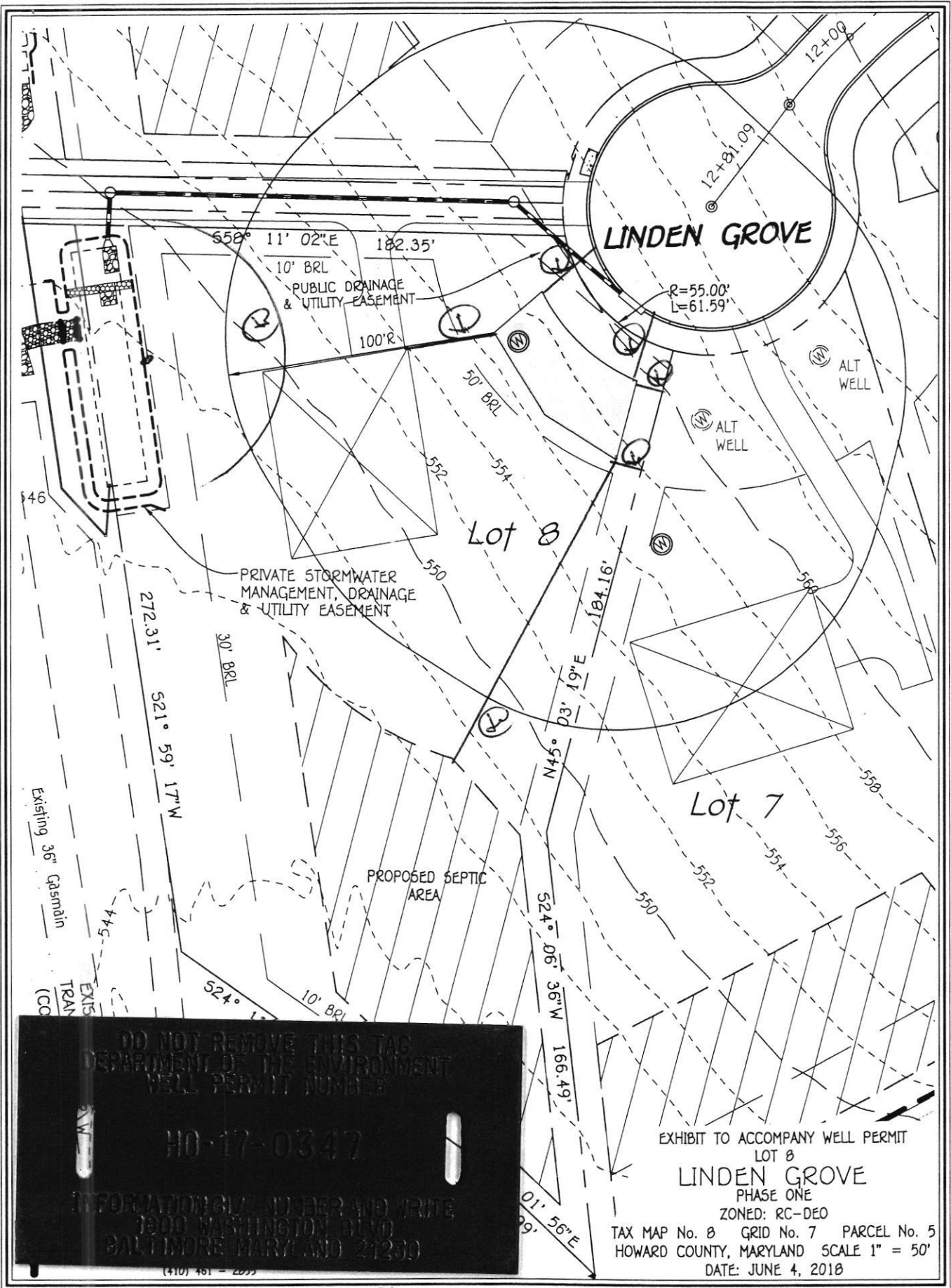
In closing, please refer to our "[Homeowner Fact Sheet](#)" which illustrates a better understanding for your Onsite Sewage Disposal System. You will also find a link to Maryland Department of the Environment's website which describes in further detail operation and maintenance of your septic system.

Approving Authority,

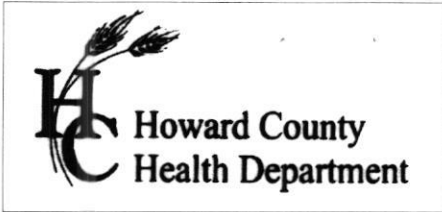
A handwritten signature in black ink, appearing to read 'Kevin M. Wolf', is written over a light blue horizontal line.

Kevin M. Wolf, LEHS, R.S./REHS, Supervisor
Groundwater Management Section
Well & Septic Program

cc: Howard County Dept. of Inspections, Licenses, and Permits
Community Hygiene Program
File



LINDEN GROVE LOT 8
 APPROVED 7/25/2018 @ 09:17 VIA SP-17-003 signed 3/22/18
 STAKED BY FCC



8930 Stanford Blvd, Columbia MD 21045
 (410) 313-6300 Fax (410) 313-2648
 TDD (410) 313-2323 Toll Free 1-866-313-6300
 website: www.askhealth@howardcountymd.gov

Bert Nixon, Director

TO ALL INTERESTED PARTIES

When submitting a well application for a proposed well for new construction, please indicate one of the following:

He
09/14/2018

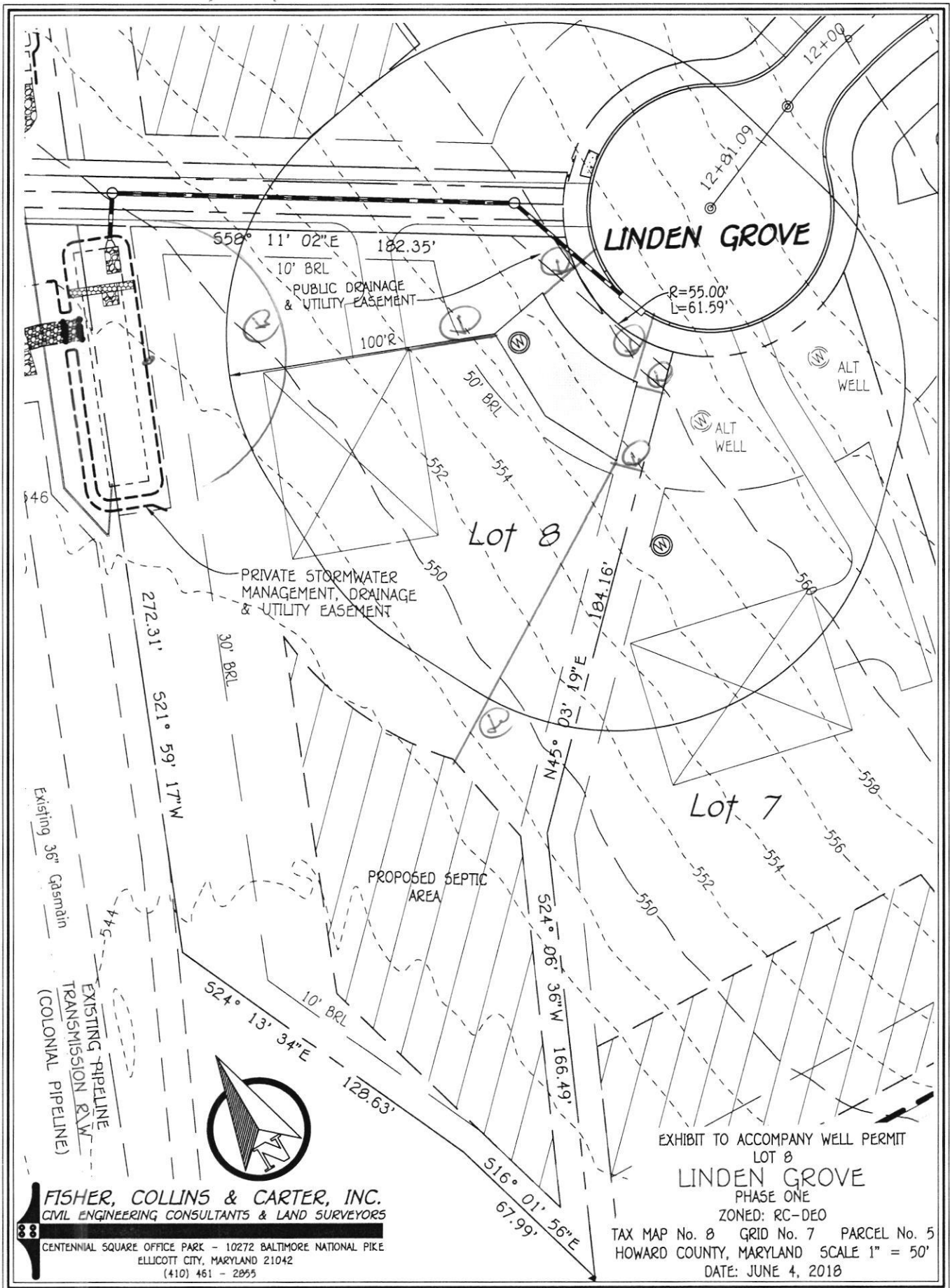
Well Site Location:

Linden Grove	8	Linden Grove
Subdivision/Property Name	Lot #	Road Name

The well site has been staked by Fisher, Collins and Carter,
 (professional land surveyor or company employing professional land surveyors)
 on 08/23/18 (date) and does not require a site inspection.

The well driller, builder or property owner will call the Health Department to schedule a time to meet in the field to verify the proposed well site location.

This sheet, along with two copies of an acceptable well site plan, must be attached to the green well permit application.



FISHER, COLLINS & CARTER, INC.
 CIVIL ENGINEERING CONSULTANTS & LAND SURVEYORS
 CENTENNIAL SQUARE OFFICE PARK - 10272 BALTIMORE NATIONAL PIKE
 ELLICOTT CITY, MARYLAND 21042
 (410) 461 - 2855

EXHIBIT TO ACCOMPANY WELL PERMIT
 LOT 8
LINDEN GROVE
 PHASE ONE
 ZONED: RC-DEO
 TAX MAP No. 8 GRID No. 7 PARCEL No. 5
 HOWARD COUNTY, MARYLAND SCALE 1" = 50'
 DATE: JUNE 4, 2018

LINDEN GROVE Lot 8
 APPROVED 7/25/08 @ 0997 VIA SP-17-003 signed 3/22/18
 STAKED BY FCC

FOUNTAIN VALLEY ANALYTICAL LABORATORY, INC.

1413 Old Taneytown Rd. Westminster, MD (410) 848-1014 (410) 876-4554

REPORT OF ANALYSIS

Laboratory ID #: 148248 Account #: 1933
Reference: Linden Grove Lot 8 Client: Fogle's Well Pump & Treatment
Location: 15633 Linden Grove Lane Requested By: Dave Fogle
Woodbine, MD 21797 Source: Well Water
Date/ Time Collected: 10/22/2021 1010 Site: Kitchen
Date/Time Rec'd: 10/22/2021 1117 Treatment: **
Chlorine ppm: Free: ND Total: ND pH: 5.8
Collected By: D. Fogle 0037DF Well #: HO-17-0347

PARAMETERS	RESULTS	UNITS	REFERENCE	METHOD	DATE/TIME/ANALYST
Bacteria, Coliform, Total, MPN	>200.5	MPN/ 100 ml	<1.0	SM20 9223B	10/23/2021 / 1630 / BCD
Bacteria, E. coli, MPN	<1.0	MPN/ 100 ml	<1.0	SM20 9223B	10/23/2021 / 1630 / BCD
Turbidity	0.90	NTU	<10	SM20 2130B	10/22/2021 / 1350 / MEH
Sand	ND	mg/L	5	Visual/Gravimetric	10/22/2021 / 1520 / CRS
Iron	0.04	mg/L	0.3*	FR, 45 (126)	10/22/2021 / 1730 / CRS

NOTES:

- 1 *SMCL = Secondary Maximum Contaminant Level
- 2 MPN/ 100 ml = Most Probable Number [of viable bacteria] per 100 ml of sample.
- 3 ND = None Detected
- 4 NTU = Nephelometric Turbidity Units
- 5 Results less than or within the reference range are considered satisfactory and within potable water limits at the time of sampling.
- 6 Sample collected by client, analyzed as received
- 7 **Multimedia unit 4x20" house filter
- 8 Visual well check: Sealed, vented cap
- 9 pH and Chlorine level tested in lab (pH tested after recommended holding time)

Reason for Test : Use & Occupancy

Building Permit # : B21000405

Date Reported: 10/25/2021

FOUNTAIN VALLEY ANALYTICAL LABORATORY, INC.

1413 Old Taneytown Rd. Westminster, MD (410) 848-1014 (410) 876-4554

REPORT OF ANALYSIS

Laboratory ID #: 148112 Account #: 1933
Reference: Linden Grove Lot 8 Client: Fogle's Well Pump & Treatment
Location: 15633 Linden Grove Lane Requested By: Dave Fogle
Woodbine, MD 21797 Source: Well Water
Date/ Time Collected: 10/18/2021 1235 Site: Pressure Tank
Date/Time Rec'd: 10/18/2021 1342 Treatment: None
Chlorine ppm: Free: ND Total: ND pH: 6.0
Collected By: J. Evans 0309JE Well #: HO-17-0347

PARAMETERS	RESULTS	UNITS	REFERENCE	METHOD	DATE/TIME/ANALYST
Bacteria, Coliform, Total, MPN	>200.5	MPN/ 100 ml	<1.0	SM20 9223B	10/19/2021 / 0945 / CRS
Bacteria, E. coli, MPN	8.7	MPN/ 100 ml	<1.0	SM20 9223B	10/19/2021 / 0945 / CRS
Nitrate	6.22	mg/L	10	601	10/18/2021 / 1545 / CRS
Turbidity	457	NTU	<10	SM20 2130B	10/19/2021 / 0915 / CRS
Sand	>5	mg/L	5	Visual/Gravimetric	10/18/2021 / 1515 / TSD
Iron	2.10	mg/L	0.3*	FR, 45 (126)	10/18/2021 / 1605 / CRS

NOTES:

- 1 *SMCL = Secondary Maximum Contaminant Level
- 2 mg/L = milligrams per liter (also, parts per million)
- 3 MPN/ 100 ml = Most Probable Number [of viable bacteria] per 100 ml of sample.
- 4 NTU = Nephelometric Turbidity Units
- 5 Results less than or within the reference range are considered satisfactory and within potable water limits at the time of sampling.
- 6 Sample collected by client, analyzed as received
- 7 ND = None Detected
- 8 Visual well check: Sealed, vented cap
- 9 pH and Chlorine level tested in lab (pH tested after recommended holding time)

Reason for Test : Use & Occupancy

Building Permit # : B21000405

Date Reported: 10/19/2021