

C1 3168

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)

COUNTY NUMBER AS17336

ST/CO USE ONLY DATE RECEIVED

DATE WELL COMPLETED

Depth of Well 22 200 26

PERMIT NO. FROM "PERMIT TO DRILL WELL" 40-95-1518

OWNER: The Warfields II, last name, first name, TOWN: Dayton, SECTION: 2, LOT: 22

WELL LOG table with columns: DESCRIPTION, FEET (FROM, TO), check if water bearing. Includes entries for Sand Stone and Gray Mica Rock.

GROUTING RECORD: WELL HAS BEEN GROUTED (Y), TYPE OF GROUTING MATERIAL: CEMENT (CM), BENTONITE CLAY (BC), NO. OF BAGS: 17, NO. OF POUNDS: 1598

CASING RECORD: MAIN CASING TYPE: ST (STEEL), Nominal diameter: 6 inch, Total depth: 60 feet

OTHER CASING (if used) diameter, depth (feet)

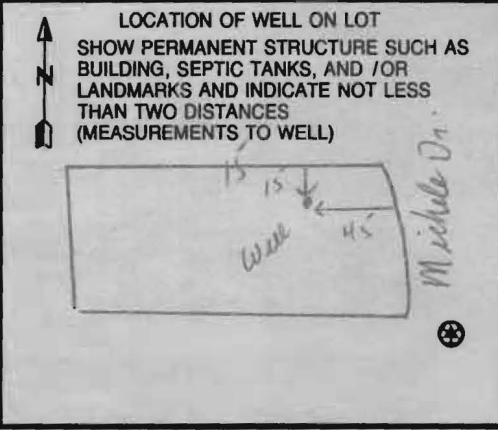
SCREEN RECORD: screen type or open hole: ST (STEEL), BR (BRASS), HO (OPEN HOLE), PL (PLASTIC), OT (OTHER)

PUMPING TEST: HOURS PUMPED: 3, PUMPING RATE: 10 gal. per min., METHOD USED TO MEASURE PUMPING RATE: Bucket

PUMP INSTALLED: DRILLER INSTALLED PUMP (YES), TYPE OF PUMP INSTALLED: S (submersible), CAPACITY: GALLONS PER MINUTE: 31-35

NUMBER OF UNSUCCESSFUL WELLS: 0, WELL HYDROFRACTURED: Y, CIRCLE APPROPRIATE LETTER: A

DEPTH (nearest ft.): 58, 200, ACHS: 8, 9, 11, 15, 17, 21, 23, 24, 26, 30, 32, 36, 38, 39, 41, 45, 47, 51



DRILLERS LIC. NO.: M SD 024, DRILLERS SIGNATURE: Joseph L. Maize, LIC. NO.: D, SITE SUPERVISOR responsible for sitework if different from permittee

GRAVEL PACK IF WELL DRILLED: 68, MDE USE ONLY (NOT TO BE FILLED IN BY DRILLER), TELESCOPE CASING, LOG INDICATOR, OTHER DATA

B 1 1074  
1 2 3 6

SEQUENCE NO. (MDE USE ONLY)

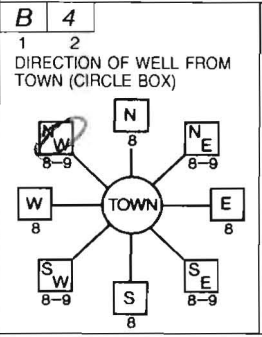
STATE OF MARYLAND  
APPLICATION FOR PERMIT TO DRILL WELL  
527950 please type

STATE PERMIT NUMBER  
HO - 95 - 1518  
70 fill in this form completely 79

Date Received (APA)  
8 MM DD YY 13  
OWNER INFORMATION  
15 Last Name Warfield, Jr. Owner Kennard First Name 34  
36 Street or RFD P.O. Box 30 55  
57 Town Glenelg Md. 70 State 72 Zip 21737 76

B 3 LOCATION OF WELL  
8 COUNTY Howard 21  
23 SUBDIVISION The Warfields II 42  
SECTION 2 44 46 LOT 22 48 50  
52 NEAREST TOWN Dayton 71  
MILES FROM TOWN (enter 0 if in town) 4 M I 73 76 77 78

DRILLER INFORMATION  
60 Driller's Name Joseph L. Mayne M S D 024 76 License No. 81  
65 Firm Name Joseph L. Mayne Well Drilling  
68 Address 5512 Ridge Rd. Mt. Airy, Md. 21771  
75 Signature Joseph L. Mayne 12-10-2007 Date



B 4  
11 NEAR WHAT ROAD Michele Dr. 30  
ON WHICH SIDE OF ROAD (CIRCLE APPROPRIATE BOX)  
NORTH N WEST W EAST E SOUTH S  
34 30 37 DISTANCE FROM ROAD FT  
ENTER FT OR MI 38 39  
TAX MAP: 27 BLK: 23 PARCEL 114

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

USE FOR WATER (CIRCLE APPROPRIATE BOX)  
 D DOMESTIC POTABLE SUPPLY & RESIDENTIAL IRRIGATION  
 F FARMING (LIVESTOCK WATERING & AGRICULTURAL IRRIGATION)  
22  I INDUSTRIAL, COMMERCIAL, DEWATERING  
 P PUBLIC WATER SUPPLY WELL  
 T TEST, OBSERVATION, MONITORING  
 G GEO-THERMAL

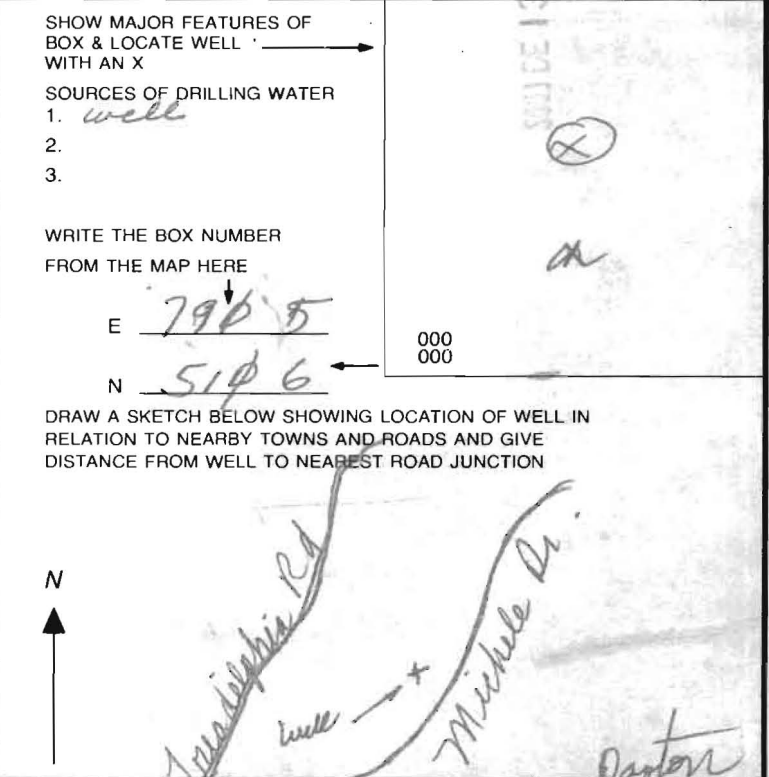
NOT TO BE FILLED IN BY DRILLER HEALTH DEPARTMENT APPROVAL  
Howard 13 A 517336  
COUNTY NAME COUNTY NO.  
STATE SIGNATURE INSERT S 41  
DATE ISSUED 2/7/08 Kim Wafar 2/7/08  
43 MM DD YY 48 CO SIGNATURE EXP. DATE  
NORTH GRID 516 000 EAST GRID 0795 000  
50 55 57 63

APPROXIMATE DEPTH OF WELL 300 24 28 FEET  
APPROXIMATE DIAMETER OF WELL 6 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)  
 N THIS WELL WILL NOT REPLACE AN EXISTING WELL  
 Y THIS WELL WILL REPLACE A WELL THAT WILL BE ABANDONED AND SEALED  
39  S THIS WELL WILL REPLACE A WELL THAT WILL BE USED AS A STANDBY-CONTACT LOCAL APPROVING AUTHORITY FOR POLICY ON STANDBY WELLS  
 D THIS WELL WILL DEEPEMED 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 HO 2006 G 009  
PERMIT No. HO-95-1518  
70 71 72 73 74 75 76 77 78 79



SPECIAL CONDITIONS Drill well @ NW corner of well box  
NOTE - APPROVING AUTHORITIES SHOULD USE SEPARATE SHEET IF NEEDED



**HOWARD COUNTY HEALTH DEPARTMENT  
BUREAU OF ENVIRONMENTAL HEALTH  
WATER AND SEWERAGE PROGRAM  
TEL: (410)313-2640 FAX: (410)313-2648**

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: \_\_\_\_\_ Telephone #: \_\_\_\_\_  
Address: \_\_\_\_\_

(Must circle one) Licensed Plumber      Licensed Well Driller      Licensed Well Pump Installer

License # and name of individual responsible for the field installation:

Name (Print): \_\_\_\_\_ License# \_\_\_\_\_

**\*A licensed individual must perform the actual installation. Apprentices must be under the direct supervision of a licensed journeyman or master plumber, pump installer or well driller. Licenses may be subjected to field verification.**

Name of Property Owner: \_\_\_\_\_ Telephone #: \_\_\_\_\_  
Subdivision: Warfields II Lot #: 22 Well Tag #: HO-95-1518  
Site Address: 14875 Michele Dr.

Submersible Pump Data

Make: \_\_\_\_\_  
Model #: \_\_\_\_\_  
Pump Capacity \_\_\_\_\_ GPM  
Well Yield: \_\_\_\_\_ GPM

Pitless Adapter

Make: \_\_\_\_\_  
Model #: \_\_\_\_\_  
Depth: \_\_\_\_\_ (36" min)  
NSF approved: \_\_\_\_\_

Well Cap and Electric Conduit

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

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

Torque arrestors or Cable guards are required - Must circle one  
Safety rope, if used, attached to inside of well casing with eye bolt \_\_\_\_\_

Piping to house

Type: \_\_\_\_\_  
PSI: \_\_\_\_\_ (160 psi min)  
Depth of supply line: \_\_\_\_\_ (36" min)

House Connection

PVC sleeved to undisturbed soil at wall penetration: \_\_\_\_\_  
Approximate length of sleeve: \_\_\_\_\_  
Sleeve caulked and sealed properly: \_\_\_\_\_

**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 \_\_\_\_\_ date \_\_\_\_\_

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

Date Insp. Requested: \_\_\_\_\_ Date Insp. Approved: 11/3/2010 BB  
Inspection Data: Pitless adapter and water supply line at least 36" below grade   
Two piece cap installed and attached to casing securely   
Elec. conduit extends at least 18" below grade/attached to cap properly   
Safety rope installed inside of well casing   
Correct well tag attached properly and casing 3" above finished grade   
Water supply line sleeved adequately at house connection   
Adequate grout observed below pitless adapter

BUREAU OF ENVIRONMENTAL HEALTH  
WATER AND SEWERAGE PROGRAM  
TEL: (410)313-2640 FAX: (410)313-2648

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: Robert L. Feezer Co. Inc Telephone #: 410-781-4655  
Address: 6321 Barnwell Ave  
Syracuse, MD

(Must circle one) Licensed Plumber Licensed Well Driller Licensed Well Pump Installer  
License # and name of individual responsible for the field installation:  
Name (Print): Robert L. Feezer License# 2122  
\*A licensed individual must perform the actual installation. Apprentices must be under the direct supervision of a licensed journeyman or master plumber, pump installer or well driller. Licenses may be subjected to field verification.

Name of Property Owner: MV Homes Telephone #: 410-379-5956  
Subdivision: WARRFIELD ESTATES II Lot #: 22 Well Tag #: HO-95-1518  
Site Address: 14875 ANDERSON DR  
GREENGLADE, MD 21721

Submersible Pump Data Pitless Adapter Well Cap and Electric Conduit  
Make: STANLEY Make: Campbell Two piece watertight cap:   
Model #: S10P4NS07221 Model #: PT-800 Screened, vented well cap:   
Pump Capacity: 1.0 GPM Depth: 48" (36" min) Cap secured to casing:   
Well Yield: 1.0 GPM NSF approved:  Conduit min 18" B.G.:   
Depth of well encountered at time of pump installation: 30.0 (feet) Conduit secured to well cap:   
If pump capacity exceeds well yield, a low water cut off switch is required by NSPC 1990 Section 17.8.4  
Torque armors or Cable guards are required - Must circle one  
Safety rope, if used, attached to inside of well casing with eye bolt:

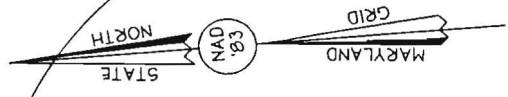
Piping to house House Connection  
Type: Poly PVC sleeved to undisturbed soil at wall penetration:   
PSI: 200 (160 psi min) Approximate length of sleeve: 10'  
Depth of supply line: 40 (36" min) Sleeve caulked and sealed properly:

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: Robert L. Feezer date: 12/8/10  
INSPECTION CALLED IN FOR 11/3/10

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

Date Insp. Requested: \_\_\_\_\_ Date Insp. Approved: \_\_\_\_\_  
Inspection Data: Pitless adapter and water supply line at least 36" below grade \_\_\_\_\_  
Two piece cap installed and attached to casing securely \_\_\_\_\_  
Elec. conduit extends at least 18" below grade/attached to cap properly \_\_\_\_\_  
Safety rope installed inside of well casing \_\_\_\_\_  
Correct well tag attached properly and casing 8" above finished grade \_\_\_\_\_  
Water supply line sleeved adequately at house connection \_\_\_\_\_  
Adequate grout observed below pitless adapter \_\_\_\_\_



MICHELE DRIVE

R=500.00' L=121.13'

*Drill @  
this loc  
first.*

*2/7/08  
well box OK  
pww*

5' Public Drainage  
And Utility Easement

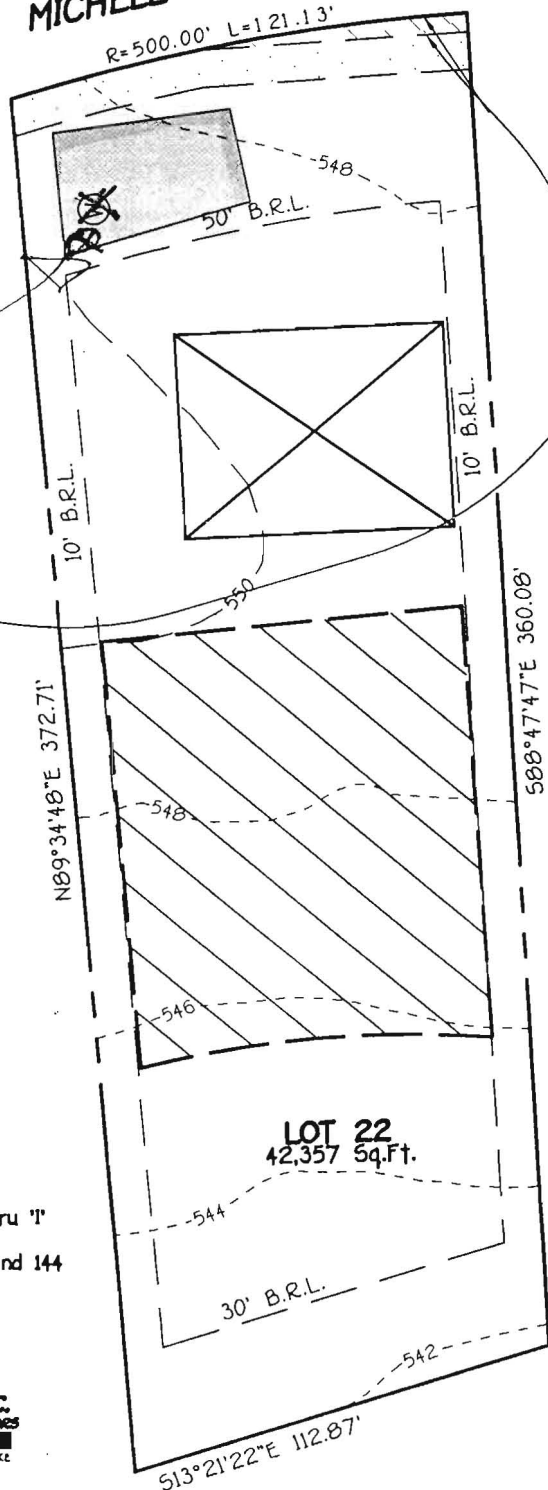


EXHIBIT TO ACCOMPANY  
WELL PERMIT  
LOT 22  
THE WARFIELDS II  
SECTION TWO  
Lots 6 Thru 68,  
Cemetery Open Space Lot 69, And  
Buildable Preservation Parcel 'A' And  
Non-Buildable Preservation Parcels 'B', Thru 'I'  
Tax Map: 21, Grid 23, Parcel: 55  
Tax Map: 27, Grid 5, Parcels: 56, 109 And 144  
Fourth Election District  
Howard County, Maryland  
Date: December 6, 2007  
F-07-040

**CARTER, INC.**  
LAND SURVEYORS  
BALTIMORE NATIONAL PICE  
21042



Bureau of Environmental Health  
7178 Gateway Drive Columbia, MD 21046  
(410) 313-2640 Fax (410) 313-2648  
TDD (410) 313-2323 Toll Free 1-866-313-6300  
website: www.hchealth.org

Peter L. Beilenson, M.D., M.P.H., Health Officer

December 21, 2010

Homeowner  
14875 Michele Drive  
Glenelg, MD 21737

RE: Warfields II, Lot 22  
14875 Michele Drive  
Glenelg, MD 21737  
BP #B10002632  
Well Permit #HO-95-1518

Dear Sir/Madam,

This is to advise you that the septic system for the above referenced property has been installed and inspected. **Final approval of the septic system was granted on 11/29/2010. Final approval of the well line connection to the dwelling was approved on 11/03/2010.**

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.

The raw nitrate sample results were previously documented to be 15.7 ppm. **A nitrate removal device (Reverse Osmosis) has been installed to treat the excessive nitrate contamination. The nitrate treatment device appears to be operating properly as evidenced by the water sample results taken on 12/16/2010 which indicates a nitrate level of <1.0 ppm.**

## **Permanent Deviation for Nitrates**

COMAR 26.04.04.09 prohibits approval of any water supply with a nitrate-nitrogen contaminant level in excess of 10 parts per million. **This department will grant a permanent deviation to that section of the regulation on condition that the nitrate removal system effectively maintains the nitrate-nitrogen contaminant level of 10 ppm or less.**

Furthermore, it will be necessary for you to comply with the following conditions:

1. The system must be properly operated and maintained continuously in accordance with the service contract for the life of the **residence.**
2. It is recommended that a laboratory certified for water testing perform a yearly nitrate analysis. (Certified to test for nitrates)
3. If you decide to sell or rent your home in the future, you must make any potential buyer/tenant aware of the above condition.

**INTERIM CERTIFICATE OF POTABILITY**  
**(Permanent Deviation for Nitrates)**

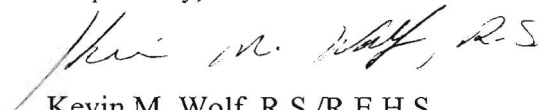
This certifies that **the initial** sampling requirements of COMAR 26.04.04 "Well Regulations" have been met for the water supply system installed under well permit #HO-95-1518 **Although the submitted sample results are in compliance with COMAR standards, the Health Department does not guarantee water supplies.** Based upon satisfactory investigation and evaluation, the Howard County Health Department as authorized by the Maryland Department of the Environment accepts this well system as required by COMAR 26.04.04.

Further more under COMAR 26.04.04.09 E. *Disclosure*, any and all special conditions to this interim certificate of potability shall be disclosed to any purchaser of the property served by the well HO-95-1568 before entering into a contract of sale or lease. A person who fails to make this disclosure is subject to the penalties set out in Regulation .12F Enforcement and Environment Article 9-1311, Annotated Code of Maryland.

**This certificate may become final upon completion of the second bacteriological and nitrate tests, which may be taken by the health department within six months of the date of this letter. Please contact (410) 313-1773 to schedule a final water sample appointment. Currently, there is no charge for this final sampling.**

Date of Water Sample(s): 12/13/2010, & 12/16/2010  
Date of Well Completion: 03/04/2008

Respectfully,



Kevin M. Wolf, R.S./R.E.H.S.  
Environmental Sanitarian  
Well and Septic Program

cc: Building Inspector's office  
Community Health Services  
File



TRACE LABORATORIES, INC

5 North Park Drive

Hunt Valley, MD 21030 USA

Telephone: 410/584-9099 / Fax: 410/584-9117

Website: www.tracelabs.com / Email: info@tracelabs.com

Maryland State Certified Laboratory #318

CERTIFICATE OF ANALYSIS

Requester:

S/O Number: 79801

NV Homes, Inc.
6085 Marshalee Drive Suite 130
Elkridge, Maryland 21075

Report Date: December 14, 2010

Property Sampled: 14875 Michele Drive, 21737
Sample Location: Pressure Tank
Residual Chlorine: <0.1 mg/L

Building Permit #: B10002632
Sampler ID #: 9813AM
Samples Iced: Yes

County: Howard
Map: 27

Subdivision: Warfields
Parcel: 114

Lot #: 22

Date/Time Collected in Field: December 13, 2010 @ 2:05 pm

Date/Time Received in Lab: December 13, 2010 @ 3:30 pm

Well Tag #: HO-95-1518
Well Condition: 2-Piece Cap, Satisfactory Condition

Water Treatment/Conditioning: Neutralizer, Softener

Table with 5 columns: PARAMETER, METHOD, MCL/\*SMCL, RESULT, PASS/FAIL. Rows include Total Coliform, E. coli, Nitrate, Turbidity, pH, and Sand.

Katherine C. Higgs
Katherine C. Higgs
Administrative Assistant

MCL: Maximum Contamination Level, an enforceable level established by the EPA
\*SMCL: Secondary Maximum Contamination Level, a level recommended by the EPA
\*\*\*A non-enforceable parameter that may cause cosmetic effects or aesthetic effects (such as taste, color or odor) in drinking water.



TRACE LABORATORIES, INC

5 North Park Drive

Hunt Valley, MD 21030 USA

Telephone: 410/584-9099 / Fax: 410/584-9117

Website: www.tracelabs.com / Email: info@tracelabs.com

Maryland State Certified Laboratory #318

CERTIFICATE OF ANALYSIS

Requester:

NV Homes, Inc.  
6085 Marshalee Drive Suite 130  
Elkridge, Maryland 21075

S/O Number: 79854

Report Date: December 14, 2010

Nitrate Retest

Property Sampled: 14875 Michele Drive, 21737  
Sample Location: Reverse Osmosis (R/O) Tap  
Residual Chlorine: <0.1 mg/L

Building Permit #: B10002632  
Sampler ID #: 9813AM  
Samples Iced: Yes

County: Howard  
Map: 27

Subdivision: Warfields  
Parcel: 114

Lot #: 22

Date/Time Collected in Field: December 16, 2010 @ 1:45 pm  
Date/Time Received in Lab: December 16, 2010 @ 4:30 pm

Well Tag #: HO-95-1518  
Well Condition: 2-Piece Cap, Satisfactory Condition

Water Treatment/Conditioning: Neutralizer, Softener, R/O

PARAMETER	METHOD	MCL	RESULT	PASS/FAIL
Nitrate	SM 4500D	10 mg/L as N	<1.0 mg/L as N	Pass

*Katherine C. Higgs*

Katherine C. Higgs  
Administrative Assistant

MCL: Maximum Contamination Level, an enforceable level established by the EPA

REQUEST FOR PERMANENT DEVIATION TO  
NITRATE STANDARDS FOR CERTIFICATE OF POTABILITY

DATE: 12/17/10 WELL PERMIT #: HO - 95 - 1518

PROPERTY OWNER: Kevin and Karen Elliott  
SUBDIVISION & LOT #: Worfields (W7) Lot 8022  
PROPERTY ADDRESS: 14875 Michele Drive Glenely MD 21737

CONDITIONS:

- 1) The well installed under permit # HO - ~~95~~ - ~~1518~~ has been documented to have a nitrate level of 157 ppm which exceeds the MCL of 10 ppm. As a result of installation and operation of a nitrate filtration system, this nitrate contamination has been reduced to <1 ppm at the primary drinking tap.

I hereby request that a Permanent Deviation to COMAR 26.04.04.09 be granted for the well installed under permit HO - ~~95~~ - ~~1518~~. I am fully aware of the conditions under which this deviation will be granted, and of my responsibilities as the well owner, which include advising any future buyer/ tenant of the installation, condition and maintenance responsibilities of the nitrate removal device.

Prospective Owner's Original Signature(s) [ **Person(s) that intend to live in the dwelling** ]

Kevin Elliott                      Karen Elliott

Prospective Owner's Day Time Phone Number(s)

(443) 255-7691