

Bureau of Environmental Health
 8930 Stanford Boulevard, Columbia, MD 21045
 Main: 410-313-2640 | Fax: 410-313-2648
 TDD 410-313-2323 | Toll Free 1-866-313-6300
www.hchealth.org
 Facebook: www.facebook.com/hocohealth

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

RECEIPT DATE: 12/22/21 **ONSITE SEWAGE DISPOSAL SYSTEM** P 570887
 APPROVAL DATE: 04/14/2022 **PERMIT: CONSTRUCTION** A _____
 PROPERTY ADDRESS: 1942 DAVIS BRANCH ROAD, WOODSTOCK, MD 21163
 SUBDIVISION: MYRTUE PROPERTY LOT: 27 TAX ID: 03-352617
 CONTRACTOR: Farm + Home Excavating EMAIL: _____
 CONTRACTOR ADDRESS: _____ PHONE: _____
 PROPERTY OWNER: SONSHINE MD LP EMAIL: greinsmith@KeystoneCustomHomes.com
 OWNER ADDRESS: 227 GRANITE RUN ROAD, LANCASTER, PA 17601 PHONE: (717)464-9060
 SEPTIC TANK SIZE (GALLONS): 2000 TANK MANUFACTURER: MAYER BROS., INC.
 PUMP MODEL: n.a. PUMP SIZE n.a. PUMP TANK CAPACITY: n.a.

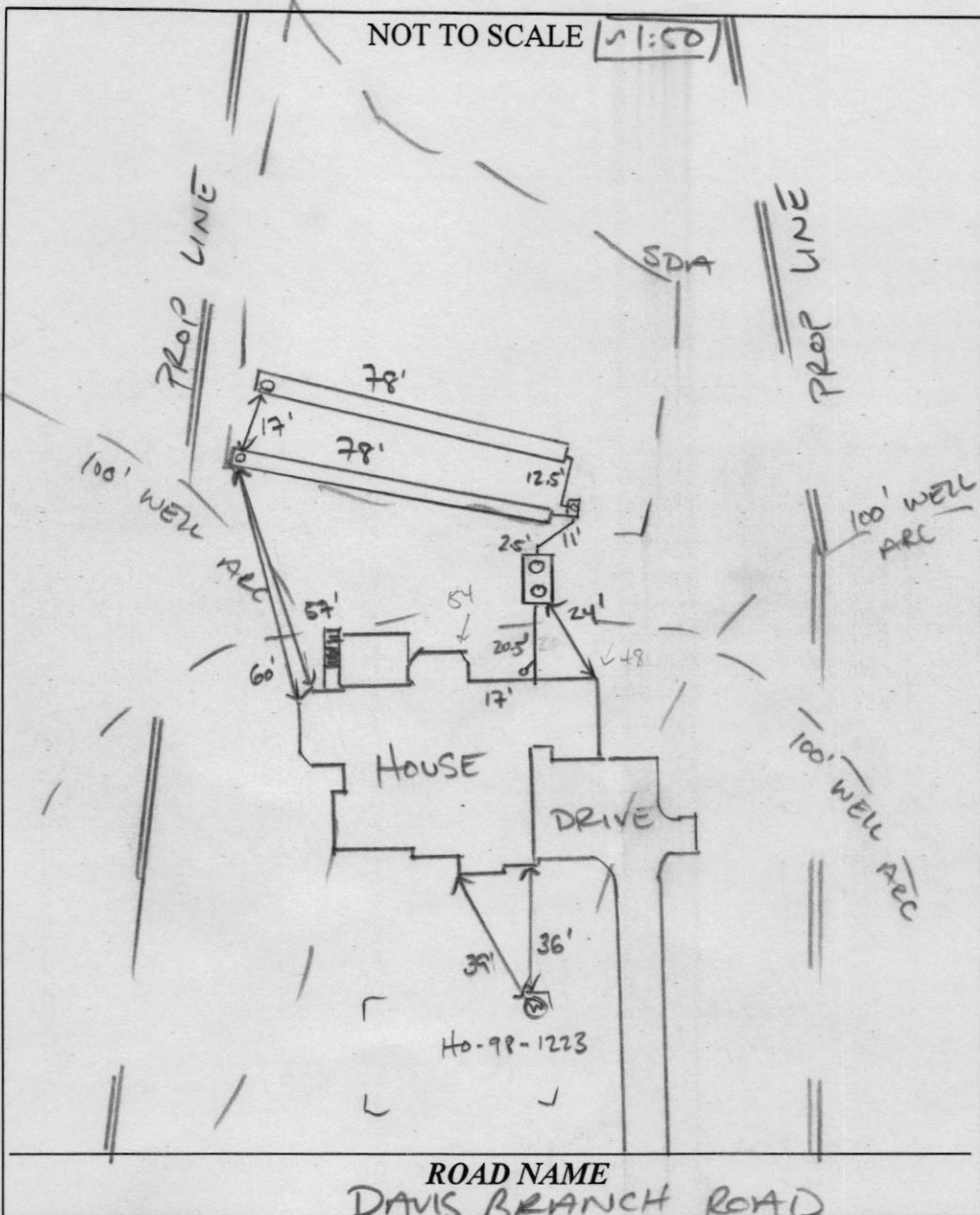
DISTRIBUTION SYSTEM: GRAVITY PRESSURE DOSED BEDROOMS: 6 APPLICATION RATE: 0.8

TRENCHES:	LINEAR FEET REQUIRED: <u>156</u>	INLET DEPTH: <u>2.5</u>
	TRENCH WIDTH: <u>3</u>	MAXIMUM BOTTOM DEPTH: <u>8.0</u>
	MINIMUM SPACE BETWEEN TRENCHES: <u>11</u>	EFFECTIVE AREA BEGINNING DEPTH: <u>4.0</u>
LOCATION:	PER APPROVED SITE PLAN. SEWAGE DISPOSAL AREA AND TANK LOCATIONS MUST BE STAKED BY LICENSED SURVEYOR PRIOR TO PRE-CONSTRUCTION INSPECTION.	
NOTES:	INSTALL A CLEANOUT IN SHC, NEAR FOUNDATION	

ISSUED BY: R BRICKER ISSUE DATE: 12/22/21 EXPIRATION DATE: 12/22/22

- NOTE: CONTRACTOR MUST SCHEDULE A PRE-CONSTRUCTION INSPECTION PRIOR TO BEGINNING ANY INSTALLATION
- NOTE: CONTRACTOR MUST SCHEDULE AN INSPECTION AND GAIN APPROVAL OF ALL COMPONENTS PRIOR TO COVERING
- NOTE: STONE MUST BE APPROVED BY HEALTH DEPARTMENT AND GRAVEL TICKET MUST BE AVAILABLE FOR REVIEW.
- NOTE: WATERTIGHT TANKS REQUIRED
- NOTE: ALL PARTS OF SEPTIC SYSTEM SHALL BE AT LEAST 100 FEET DOWNGRAIDENT FROM ANY WATER WELL
- NOTE: MANHOLE RISERS REQUIRED ON ALL SEPTIC TANKS AND PUMP CHAMBERS
- NOTE: AN ELECTRICAL PERMIT IS REQUIRED FOR INSTALLATION OF ANY ELECTRICAL COMPONENTS OF THE SYSTEM
 ELECTRICAL PERMIT ISSUED E N.A.
- NOTE: MDE RECOMMENDS SEPTIC TANKS, BAT, AND OTHER PRETREATMENT UNITS BE PUMPED AT A FREQUENCY ADEQUATE TO ENSURE THAT SOLIDS ARE NOT DISCHARGED TO THE DISPOSAL AREA

**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 410-313-1771 TO SCHEDULE INSPECTIONS.**



TRENCH/DRAINFIELD DATA		
WIDTH	INLET	BOTTOM
3'	2.5'	8'
NUMBER OF TRENCHES		2
TOTAL LENGTH		156 F
ABSORPTION AREA		468 SF + H's.w.
DISTRIBUTION BOX LEVEL		SPEED
DISTRIBUTION BOX BAFFLE		CONCRETE
DISTRIBUTION BOX PORT		YES

SEPTIC TANK DATA	
SEPTIC TANK I LEVEL	YES
MANUFACTURER	RABBITON
CAPACITY	2000 GAL
SEAM LOC	TOP
TANK LID DEPTH	~25-26"
BAFFLES	YES
BAFFLE FILTER	-
MANHOLE LOC	FRONT/BACK
6" PORT LOC	-
WATERTIGHT TEST	-
SLOTTED	YES
DATE ON LID	01/02/2022
PUMP/SEPTIC TANK LEVEL	
MANUFACTURER	
CAPACITY	
SEAM LOC	
TANK LID DEPTH	
BAFFLES	
BAFFLE FILTER	
MANHOLE LOC	
6" PORT LOC	
WATERTIGHT TEST	
SLOTTED	
DATE ON LID	

PRE-CONSTRUCTION:

04/11/2022 LAID OUT 2x78' TRS, STRAIGHTENED. (P)

INSTALLATION:

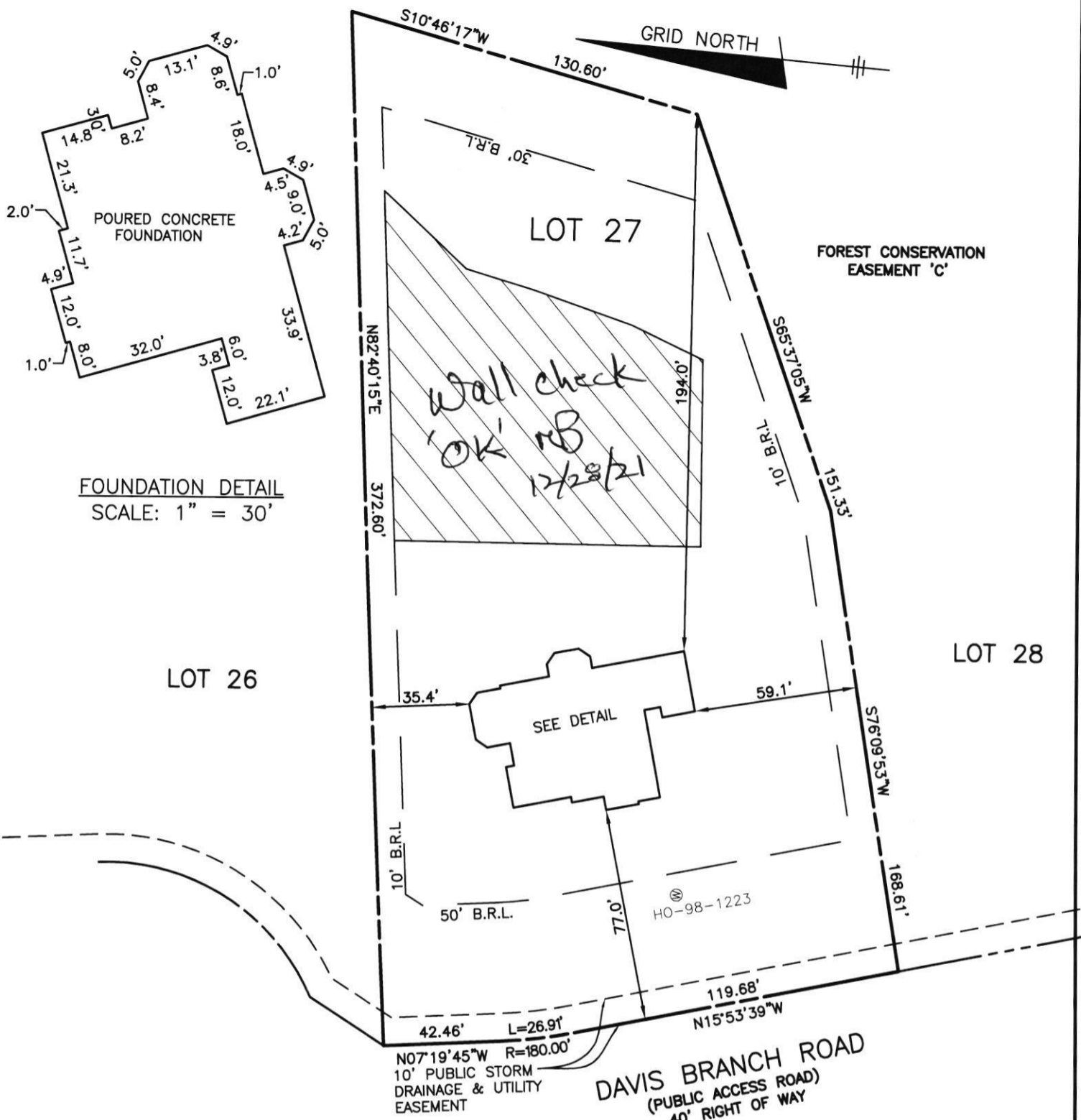
04/12/2022 SEWER LINE INSTALLED. SEPTIC TANK SET. (P)
 04/13/2022 EFF LINE, D BOX, AND UPPER TRENCH CONSTRUCT. (PM)
 UPPER TRENCH COMPLETE. (P) 04/14/2022 LOWER TRENCH
 COMPLETE DBOX LEVELLED W/ SPEED LEVELS (AM)/(PM) (P)

FINAL INSPECTOR

[Handwritten Signature]

DATE OF APPROVAL

04/14/2022



FOUNDATION DETAIL
SCALE: 1" = 30'

SURVEYOR'S CERTIFICATE

I HEREBY CERTIFY THAT THESE DOCUMENTS, WERE PREPARED BY ME OR UNDER MY RESPONSIBLE CHARGE, AND THAT I AM A DULY LICENSED PROFESSIONAL LAND SURVEYOR UNDER THE LAWS OF THE STATE OF MARYLAND, LICENSE NO. 21320, EXPIRATION DATE 1-7-2023 AND TO THE BEST OF MY PROFESSIONAL KNOWLEDGE, INFORMATION AND BELIEF, THAT THE DIMENSIONS OF THE BUILDING WALLS SHOWN HEREON ARE CORRECT; THAT THEY ARE BASED ON A FIELD RUN SURVEY PERFORMED BY BENCHMARK ENGINEERING, INC. ON 11/30/2021.

TOP OF FOUNDATION WALL = 416.8'
OFFSET DIMENSIONS TO PROPERTY LINES ARE ± 0.1'

Donald A. Mason
DONALD A. MASON
PROFESSIONAL LAND SURVEYOR
MARYLAND REG. No. 21320
FEMA FIRM No. 24027C0080D
ZONE: X
DATED: 11/06/2013

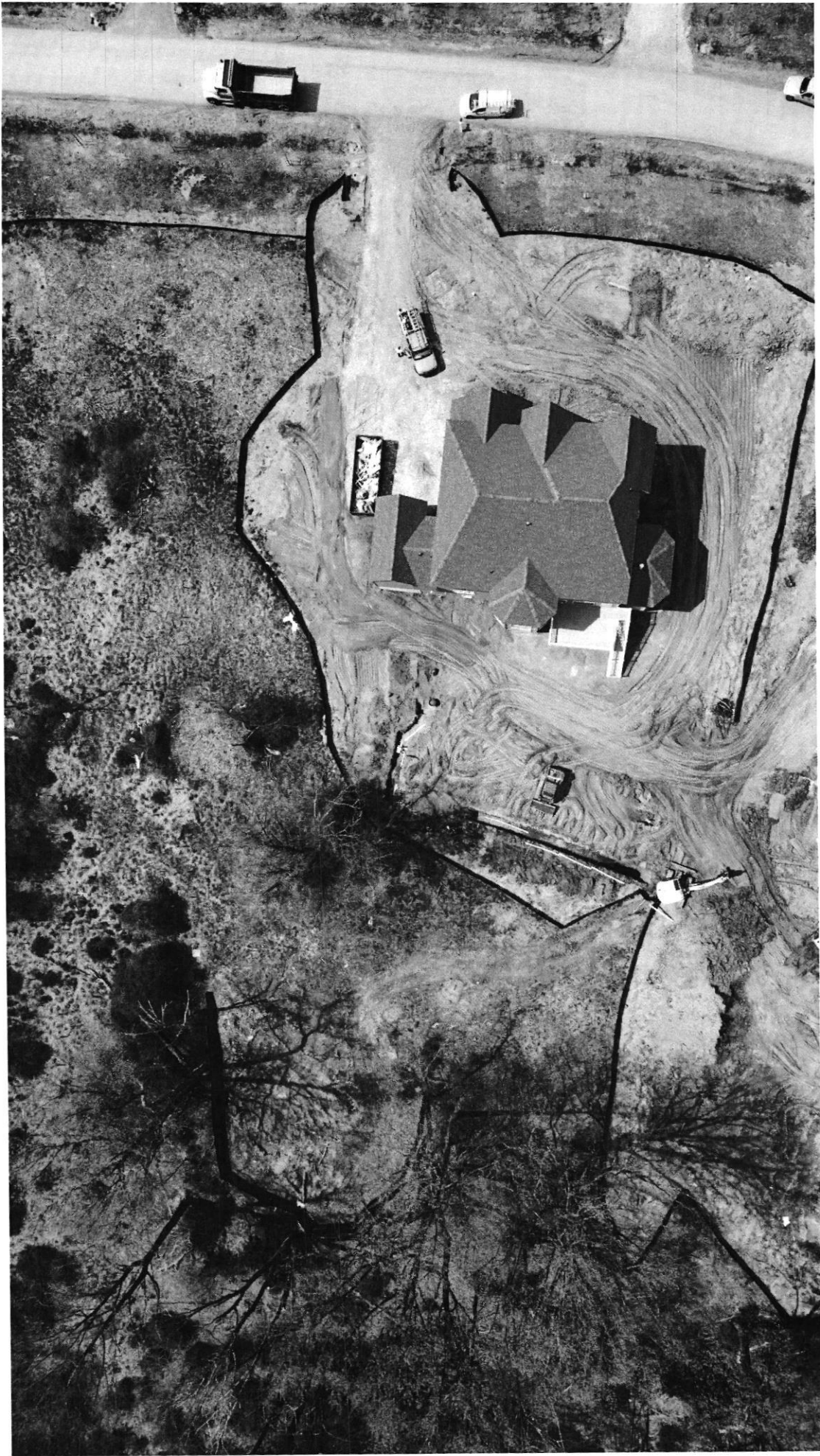
BENCHMARK
ENGINEERS ▲ LAND SURVEYORS ▲ PLANNERS
ENGINEERING, INC.
8480 BALTIMORE NATIONAL PIKE ▲ SUITE 315
ELLCOTT CITY, MARYLAND 21043
(P) 410-465-6105 ▲ (F) 410-465-6644
WWW.BEI-CMLENGINEERING.COM

DAVIS BRANCH ROAD
(PUBLIC ACCESS ROAD)
40' RIGHT OF WAY

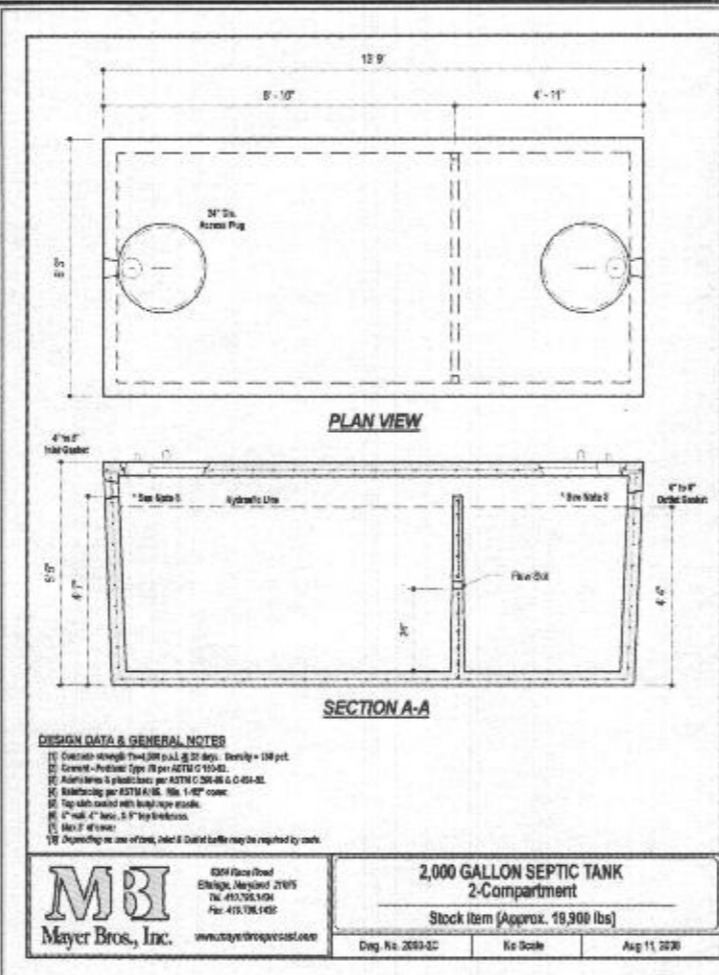
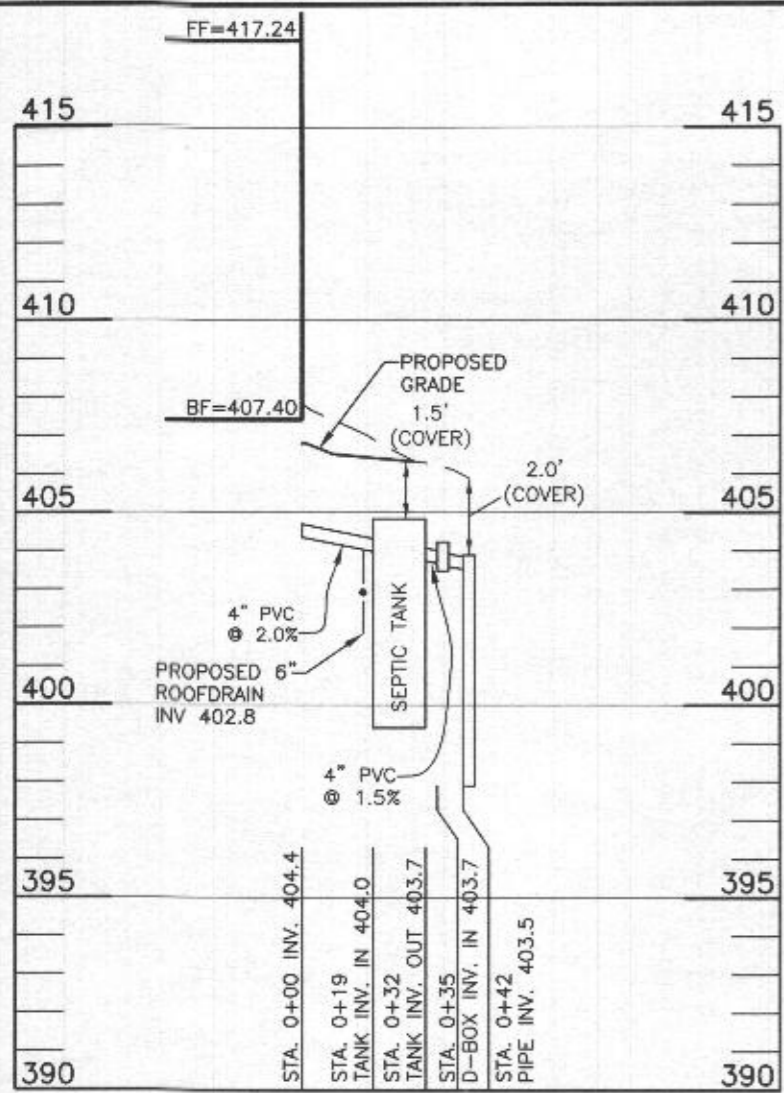
WALL CHECK
MYRTUE PROPERTY
PLAT No. 23867
LOT No. 27

1942 DAVIS BRANCH ROAD

3rd ELECTION DISTRICT
HOWARD COUNTY, MARYLAND
FIELD OBS. BY AS
COMP. BY EWF
DRAWN BY EWF
SCALE: 1" = 50' DATE: 11/30/2021



1942 DAVIS BRANCH
OSDS INSTALL 04/14/2022



DESIGN DATA & GENERAL NOTES

- 1) Concrete strength 2800 psi, 28 day, Density = 150 pcf.
- 2) Concrete - Protection Type II per ASTM C 1504.
- 3) Admixture is plasticizer per ASTM C 390-08 & C 494-02.
- 4) Reinforcing per ASTM A 618, 60, 1-#2" round.
- 5) Top walls coated with liquid-applied waterproofing.
- 6) 2" wall, 4" base, 5" top thickness.
- 7) Min. 2" of cover.
- 8) Depending on use of tank, inlet & outlet baffles may be required by code.

MBI
Mayer Bros., Inc.
www.mayerbrosgroup.com

2,000 GALLON SEPTIC TANK
2-Compartment
Stock Item (Approx. 19,900 lbs)
Dep. No. 2093-02 No Scale Aug 11, 2020

SEPTIC INVERT CHART - Lot 27

INV @ HOUSE	404.4
GROUND @ HOUSE	406.8
INV IN SEPTIC TANK	404.0
INV OUT SEPTIC TANK	403.8
TOP OF SEPTIC TANK	404.8
GROUND OVER SEPTIC TANK	406.3
INV IN DIST BOX	403.7
INV OUT DIST BOX	403.6
GROUND AT DIST BOX	406.2

INITIAL SYSTEM

Number of Bedrooms	6	
Application Rate	0.8	gpd/sf
Effective Area Beginning Depth	4.0	ft
Bottom Max Depth	8.0	ft
Design Flow	900	gpd
Drainage Field square footage	1125	sf
Sidewall Reduction Credit	0.42	
Trench width	3	ft
Effective Area Depth	4	ft
Trench Spacing	11	ft
Linear Length of trench Required	156	lf

1ST REPLACEMENT SYSTEM

Number of Bedrooms	6	
Application Rate	1.2	gpd/sf
Effective Area Beginning Depth	4.0	ft
Bottom Max Depth	8.0	ft
Design Flow	900	gpd
Drainage Field square footage	750	sf
Sidewall Reduction Credit	0.42	
Trench width	3	ft
Effective Area Depth	4	ft
Trench Spacing	11	ft
Linear Length of trench Required	104	lf

2ND REPLACEMENT SYSTEM

Number of Bedrooms	6	
Application Rate	1.2	gpd/sf
Effective Area Beginning Depth	4.0	ft
Bottom Max Depth	8.0	ft
Design Flow	900	gpd
Drainage Field square footage	750	sf
Sidewall Reduction Credit	0.42	
Trench width	3	ft
Effective Area Depth	4	ft
Trench Spacing	11	ft
Linear Length of trench Required	104	lf

TRENCH DESIGN - Lot 27

INITIAL SYSTEM					
T-1-1	LENGTH	78.2 ft	T-1-2	LENGTH	78.2 ft
	GROUND ELEVATION	406.0		GROUND ELEVATION	404.5
	INVERT ELEVATION	403.5		INVERT ELEVATION	402.8
	MAX BOTTOM ELEVATION	398.0		MAX BOTTOM ELEVATION	396.5
1ST REPLACEMENT SYSTEM					
T-2-1	LENGTH	52.1 ft	T-2-2	LENGTH	52.1 ft
	GROUND ELEVATION	402.2		GROUND ELEVATION	402.2
	INVERT ELEVATION	400.2		INVERT ELEVATION	400.2
	MAX BOTTOM ELEVATION	394.2		MAX BOTTOM ELEVATION	394.2
2ND REPLACEMENT SYSTEM					
T-3-1	LENGTH	52.1 ft	T-3-2	LENGTH	52.1 ft
	GROUND ELEVATION	499.7		GROUND ELEVATION	498.4
	INVERT ELEVATION	497.7		INVERT ELEVATION	496.4
	MAX BOTTOM ELEVATION	491.7		MAX BOTTOM ELEVATION	490.4

HEALTH DEPARTMENT SPEC SHEET INFORMATION - Lot 27

System	Application Rate	Effective Depth	Bottom Depth
1st System	0.8	4.0	8.0
2nd system	1.2	4.0	8.0
3rd System	1.2	4.0	8.0

Professional Certification. I hereby certify that these documents were prepared or approved by me, and that I am a duly licensed professional engineer under the laws of the State of Maryland. License No. 28376, Expiration Date: 01-01-2021.

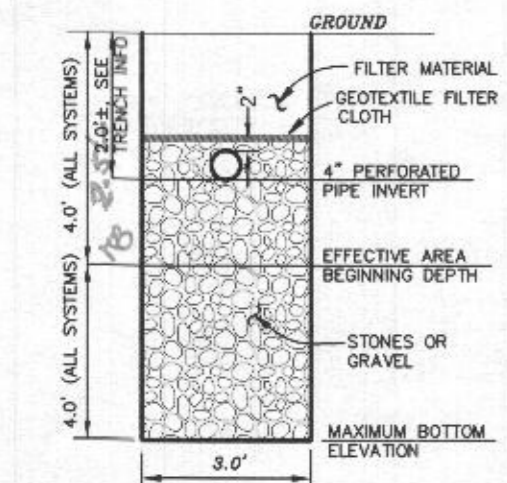


AAM-BEI

2021.04.13 09:19:04 -04'00

Approved Septic System Plan
Howard County Health Department
KS Miller 5/5/21
Signature Date
2000 gal Septic Tank
To Gravity Drainfield for 6-Bedroom SFD

LOT 27 OSDS
SCALE: 1"=50' HORIZ., 1"=5' VERT.



TYPICAL TRENCH DETAIL
NOT TO SCALE

OWNER/BUILDER:
KEYSTONE CUSTOM HOMES, INC.
227 GRANITE RUN DR.
SUITE 100
LANCASTER, PA 17601
717-464-9060

BENCHMARK
ENGINEERS ▲ LAND SURVEYORS ▲ PLANNERS
ENGINEERING, INC.
8480 BALTIMORE NATIONAL PIKE ▲ SUITE 315
ELLCOTT CITY, MARYLAND 21043
(P) 410-465-6105 ▲ (F) 410-465-6644
WWW.BEI-CMLEENGINEERING.COM

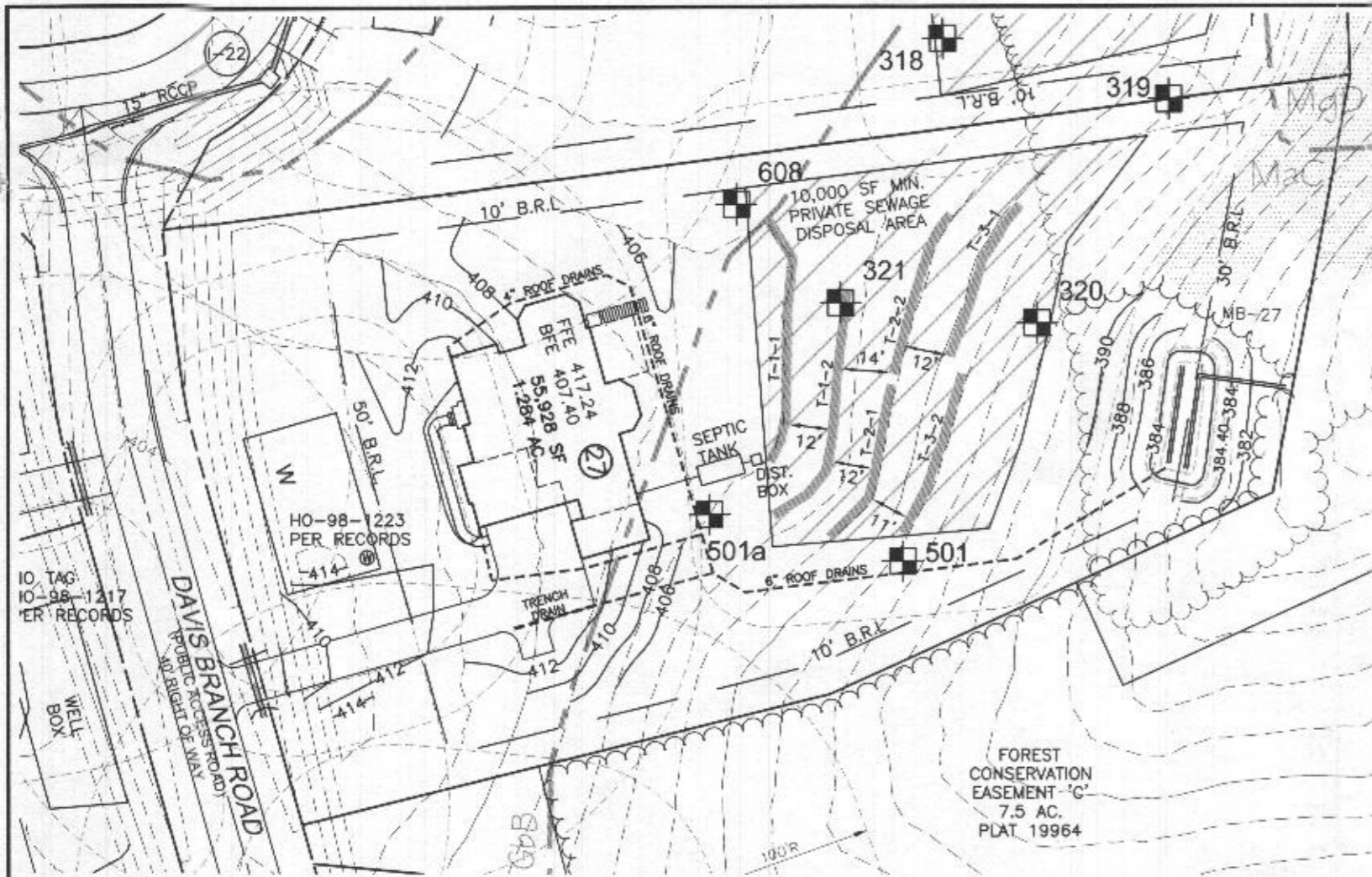
PROJECT: **MYRTUE PROPERTY LOT 27**

LOCATION: TAX MAP: 10, GRID: 24, PARCEL: 225, ZONED: RC-DEO
1942 DAVIS BRANCH RD. WOODSTOCK, MD 21163
6TH ELECTION DISTRICT, HOWARD COUNTY, MD, TAX ID 352617

TITLE: **ONSITE SEWAGE DISPOSAL PLAN**

HOUSE TYPE: **CUSTOM - KEYSTONE HOMES**

DATE:	MARCH, 2020	PROJECT NO.	2099
SCALE:	AS SHOWN	DRAWING	2 OF 2



PLAN VIEW

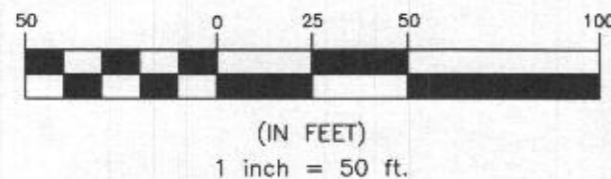
1" = 50'

GENERAL NOTES

1. THE LOT SHOWN HEREON WAS RECORDED ON THE PLAT FOR MYRTUE PROPERTY, PLAT NUMBER 23865. REFER TO THE PLAT FOR LOT DIMENSIONS, LOT AREA, ALL EASEMENTS AND CONDITIONS.
2. THE EXISTING WELL SHOWN ON THIS PLAN (HO-95-1223) HAS BEEN FIELD LOCATED BY DAFT, McCUNE WALKER, INC. AND IS SHOWN IN ACCORDANCE WITH THEIR SURVEY.
3. THERE ARE NO EXISTING WELLS OR SEPTIC SYSTEMS WITHIN 100' OF THIS PROJECT'S BOUNDARY EXCEPT AS NOTED.
4. TOPOGRAPHY SHOWN WAS FLOWN BY VIRGINIA RESOURCE MAPPING, INC. DATED FEBUARY 2003 AND SUPPLEMENTED WITH FIELD SURVEY BY DMW, INC. DATED 2005.
5. SEDIMENT AND EROSION CONTROLS WILL BE SUBMITTED BY HOWARD SOILS CONSERVATION DISTRICT AS A CUSTOM GRADING PLAN.
6. ALL DRAINAGE AND STORMWATER MANAGEMENT FEATURES USED ON THIS SITE MUST COMPLY WITH THE APPROVED BUILDING PERMIT AND CUSTOM GRADING PLANS.
7. ANY CHANGES TO A PRIVATE SEWAGE DISPOSAL AREA OR WELL BOX SHALL REQUIRE A REVISED PERCOLATION CERTIFICATION PLAN.

LEGEND

- PROPOSED CONTOURS
- EXISTING CONTOURS
- EXISTING PRIVATE SEWAGE DISPOSAL AREA
- EXISTING WELL BOX
- PROPOSED TREELINE
- EXISTING TREELINE
- SOILS MAP SYMBOL
- SOILS DELINEATION LINE
- PERC TEST PASSED
- PERC TEST FAILED



BENCHMARK INFORMATION NAD83

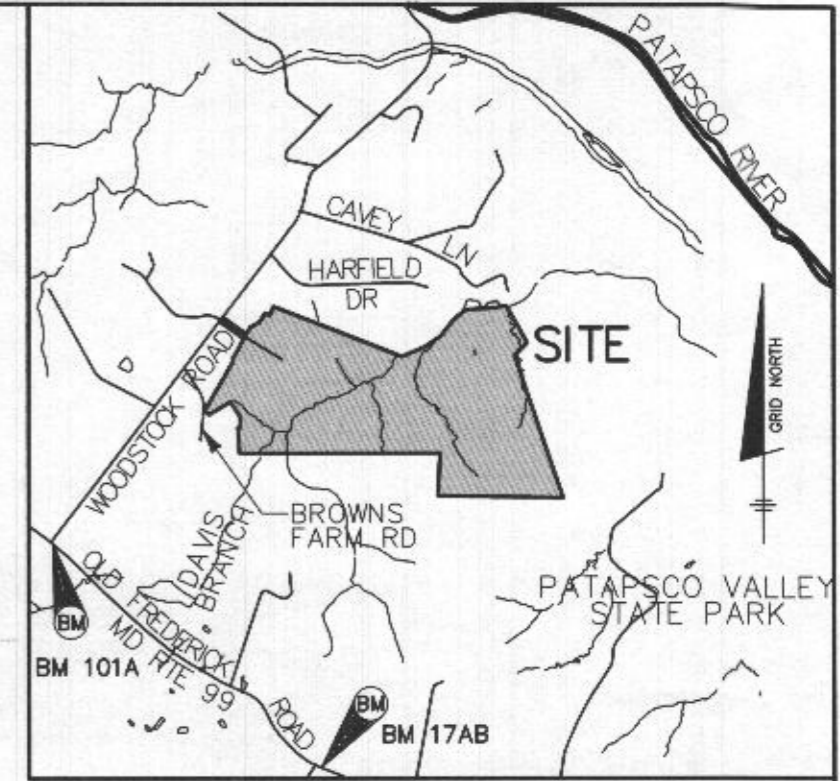
Ho. Co. STATION 17AB
STAMPED DISC SET ON TOP OF CONCRETE COLUMN

NORTHING: 564468.943'
EASTING: 1318257.375'
ELEVATION: 561.105'

Ho. Co. STATION 101A
STAMPED DISC SET ON TOP OF CONCRETE COLUMN

NORTHING: 565347.937'
EASTING: 1319266.269'
ELEVATION: 588.708'

Approved Septic System Plan
Howard County Health Department
R. Bueler 5/5/21
Signature Date
2000-gal Septic Tank
to Gravity Drain Field
for 6-bedroom SFD



VICINITY MAP

SCALE: 1" = 2000'

8. ANY CHANGES TO THE LOCATIONS OR DEPTHS TO ANY COMPONENTS MUST BE APPROVED BY THE ENGINEER AND THE HOWARD COUNTY HEALTH DEPARTMENT PRIOR TO INSTALLATION. A REVISED SITE PLAN MAY BE REQUIRED.
9. ANY ELECTRICAL WORK FOR THE INSTALLATION MUST BE PERFORMED BY A LICENSED ELECTRICIAN.
10. THE SEPTIC TANK WILL BE A 2000 GALLON TWO COMPARTMENT TANK.
11. THE MAXIMUM EARTH COVER OVER THE TANK IS 3 FEET. GREATER EARTH COVER WILL REQUIRE A HEAVY LOAD BEARING TANK.
12. ALL WELLS AND SEPTIC SYSTEMS LOCATED WITHIN 100' OF THE PROPERTY BOUNDARIES AND 200' DOWN GRADIENT OF ANY WELLS/OR SEPTIC SYSTEM HAVE BEEN SHOWN.
13. ANY FUTURE WELLS SHALL BE 10' FROM DRIVEWAY.

Professional Certification. I hereby certify that these documents were prepared or approved by me, and that I am a duly licensed professional engineer under the laws of the State of Maryland, License No. 28376, Expiration Date: 01-01-2021.



AAM-BEI

2021.04.13 09:18:25 -04'00

PROJECT:	MYRTUE PROPERTY LOT 27	
LOCATION:	TAX MAP: 10, GRID: 24, PARCEL: 225, ZONED: RC-DEO 1942 DAVIS BRANCH RD. WOODSTOCK, MD 21163 6TH ELECTION DISTRICT, HOWARD COUNTY, MD, TAX ID 352617	
TITLE:	ONSITE SEWAGE DISPOSAL PLAN	
HOUSE TYPE:	CUSTOM - KEYSTONE HOMES	
DATE:	MARCH, 2020	PROJECT NO. 2099
SCALE:	AS SHOWN	DRAWING <u>1</u> OF <u>2</u>

OWNER/BUILDER:

KEYSTONE CUSTOM HOMES, INC.
227 GRANITE RUN DR.
SUITE 100
LANCASTER, PA 17601
717-464-9060

BENCHMARK

ENGINEERS • LAND SURVEYORS • PLANNERS
ENGINEERING, INC.
8480 BALTIMORE NATIONAL PIKE & SUITE 315
ELLCOTT CITY, MARYLAND 21043
(P) 410-465-6105 • (F) 410-465-8644
WWW.BEI-CIVILENGINEERING.COM