



HOWARD COUNTY HEALTH DEPARTMENT

57357

DATE 9/3/15

p5

Received From Bath Canal Backhoe PHONE # 410-875-4197

4410 Salem Bottom RD Westminster MD 21157

For Septic Permits: Hargrove Heights Lot H

1675A Hargrove RD + Woodlands Lot 2

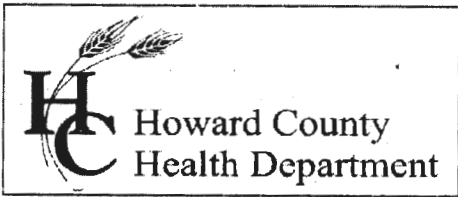
14395 Howard RD

CASH
 CHECK
NO. 49769

seven hundred ninety two Dollars

\$ 792.00

Received By [Signature]



LC-50UB300

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: 9/3/15 ONSITE SEWAGE DISPOSAL SYSTEM P 557357
APPROVAL DATE: 10/19/2015 PERMIT: CONSTRUCTION A
PROPERTY ADDRESS: 1675 -A Henryton Road
SUBDIVISION: Henryton Heights LOT: 14 TAX ID: 03-303713
CONTRACTOR: EMAIL:
CONTRACTOR ADDRESS: PHONE:

CONTRACTOR CERTIFIED FOR BAT INSTALLATION: MDE MANUFACTURER:

PROPERTY OWNER: Bruce and Andrea Punte EMAIL:
OWNER ADDRESS: PHONE:

BAT UNIT MODEL: Norweco TNTLP-600 PUMP SIZE: PUMP TANK CAPACITY:

OPERATION & MAINTENANCE AGREEMENT DATE SIGNED: DATE RECORDED:

DISTRIBUTION SYSTEM: GRAVITY PRESSURE DOSED BEDROOMS: 4 APPLICATION RATE:

TRENCHES: LINEAR FEET REQUIRED: 70 INLET DEPTH: 2
TRENCH WIDTH: 3 MAXIMUM BOTTOM DEPTH: 6
MINIMUM SPACE BETWEEN TRENCHES: 11 EFFECTIVE AREA BEGINNING DEPTH: 2

LOCATION: PER APPROVED SITE PLAN. SEWAGE DISPOSAL AREA AND BAT UNIT LOCATION MUST BE STAKED BY LICENSED SURVEYOR PRIOR TO PRE-CONSTRUCTION INSPECTION.

NOTES: 2x35' Trenches Public H2O

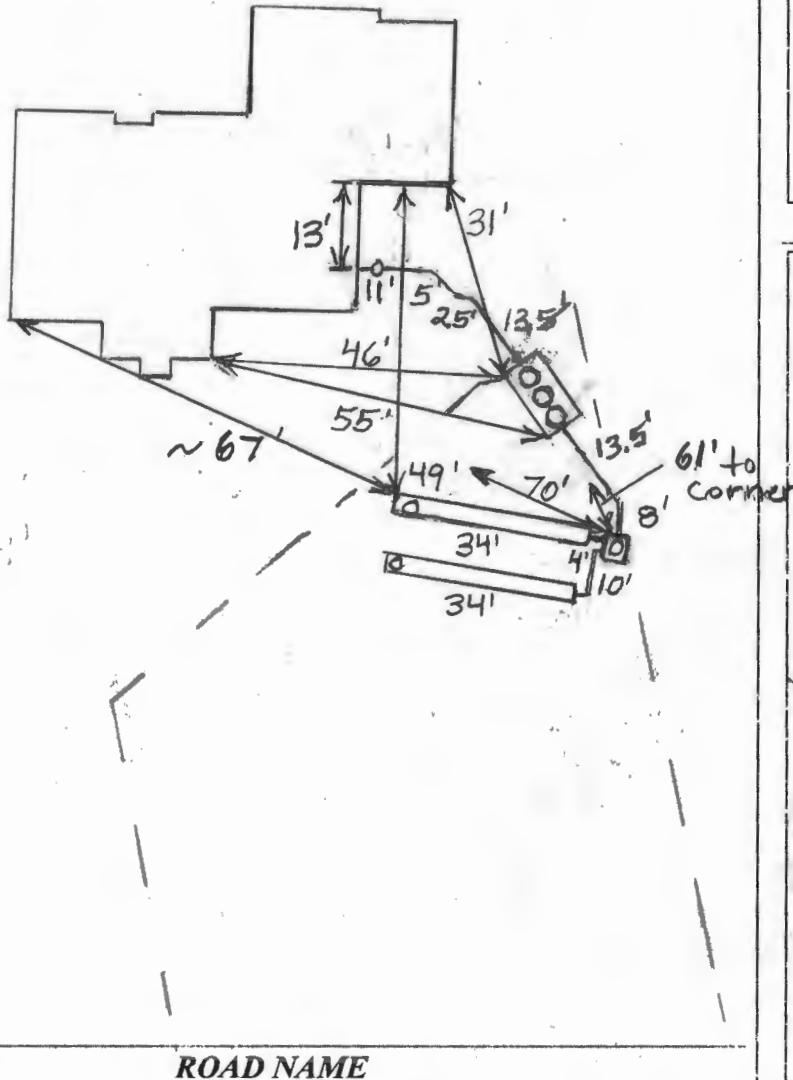
ISSUED BY: Robert Bricker H.O. ISSUE DATE: 9/3/15 EXPIRATION DATE: 9/3/16

- 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 SEPTIC TANKS REQUIRED
NOTE: ALL PARTS OF SEPTIC SYSTEM SHALL BE AT LEAST 100 FEET DOWNGRADIENT 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 15004292
NOTE: AN INDIVIDUAL CERTIFIED BY MDE AND THE MANUFACTURER FOR BAT INSTALLATION MUST BE PRESENT AT ALL TIMES DURING BAT INSTALLATION.
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.

NOT TO SCALE

Public H₂O



TRENCH/DRAINFIELD DATA

WIDTH	INLET	BOTTOM
3'	2'	6'
NUMBER OF TRENCHES 2		
TOTAL LENGTH 68'		
ABSORPTION AREA 204 + Sidewall		
DISTRIBUTION BOX LEVEL Levelers		
DISTRIBUTION BOX BAFFLE Yes		
DISTRIBUTION BOX PORT Yes		

SEPTIC TANK DATA

SEPTIC TANK I LEVEL	Yes
MANUFACTURER	Norweco Babylon
CAPACITY	1300 GAL
SEAM LOC	Top
TANK LID DEPTH	1'-2.5'
BAFFLES	No
BAFFLE FILTER	No
MANHOLE LOC	Front, Middle + Rear
6" PORT LOC	None
WATERTIGHT TEST	No
SLOTTED	N/A
DATE ON LID	8/29/2015

RUMP/SEPTIC TANK LEVEL N/A

MANUFACTURER	
CAPACITY	GAL
SEAM LOC	
TANK LID DEPTH	
BAFFLES	
BAFFLE FILTER	
MANHOLE LOC	
6" PORT LOC	
WATERTIGHT TEST	
SLOTTED	
DATE ON LID	

PRE-CONSTRUCTION:

10/13/15 Spoke with Kenny from South Carroll via phone. Tank stakes and upper SDA stakes are present - okay to set tank prior to layout. (SC)

10/13/2015 Topography similar to plan. Install similar to plan. (BB)

INSTALLATION: 10/13/2015 Tank set. House connection made. (BB)

10/15/2015 Received approval of BAT unit from Norweco representative. (BB)

10/19/2015 System finished O.K. to backfill. Received BAT approval from Norweco dealer. (BB)

FINAL INSPECTOR

B. Baker

DATE OF APPROVAL

10/19/2015

Back River Pre-Cast, LLC

PO BOX 329
Glyndon, MD 21071
Phone # 410-833-3394
Fax # 410-833-4116

Letter of Certification

This is to certify that the Norweco Singlair TNT 600 GPD Septic Tank installed at 1675-A Henryton Rd., Marriottsville, MD 21104 on October 13, 2015 was installed according to the manufacture's specifications.

Installer: Mark Seal

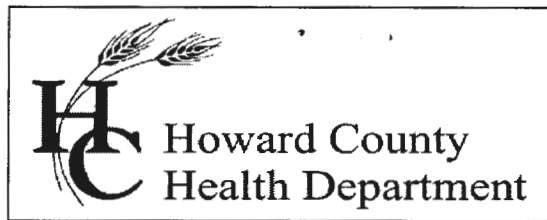
Property Owner: Bruce Punte

Permit #



MATTHEW GECKLE

Vice-President



Bureau of Environmental Health

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Facebook: www.facebook.com/hocohealth
Twitter: HowardCoHealthDep

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

December 16, 2014

To: Alice Miller, Benchmark Engineering, Inc.

RE: BAT Site Plan comments; Henryton Heights, Lot 14 (Punte residence)

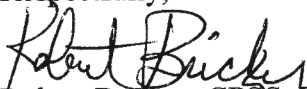
The following amendments, deletions, or revisions are needed on the submitted BAT Plan for the subject property.

1. Prominently place a label on the plan which states that Public Water will be used.
2. Illustrate and label the Water House Connection (WHC). Observe all setbacks and construction requirements, e.g. sleeve the water line as it crosses under the driveway, and continue the sleeve for about 5 feet beyond the crossing.
3. 'DW-1' is within 100 feet of a well on the neighboring property. Move the location of 'DW-1'.
4. Illustrate the label "100.0' SEPTIC OFFSET" and the line that delineates the offset across the sewage disposal area (SDA) with greater amount of points.
5. As the upper corner of the SDA is not being used for trenches, illustrate the BAT tank in the upper corner of the SDA. While maintaining appropriate depth for the Sewer House Connection (SHC), plan a more direct path from the house to the SDA.
6. The distribution box may be at the edge of the SDA, not necessarily within the boundary.
You are proposing the effective area (and trench pipe invert) to be at 1.8'. Typically, the depth selected for the distribution pipe is at one of the 0.5-foot increments between 2 feet and 4 feet.
 - a. Recalculate the coefficient and the subsequent trench length
 - b. Accurately illustrate the trench length.
 - c. Label each trench with the proposed distribution pipe invert elevation.
 - d. Illustrate the correct spacing between trenches. (You calculated 11.4 feet for spacing, but illustrated only 10 feet.) The measurement is wall-to-wall.
8. You are giving me trench data for a 4-bedroom residence, but proposing a BAT unit for a 5-bedroom residence. A correction is needed.
9. The 'TYPICAL TRENCH DETAIL' isn't making sense.
10. Propose a location for the Control Panel where access will not be hindered by a deck or other structure.

*No Pure Cont
Per MSJ
1/21/15*

You may contact me at 410-313-2691, or by email, if you have questions about these requirements.

Respectfully,

A handwritten signature in black ink that reads "Robert Bricker". The signature is written in a cursive style with a large, prominent "R" and "B".

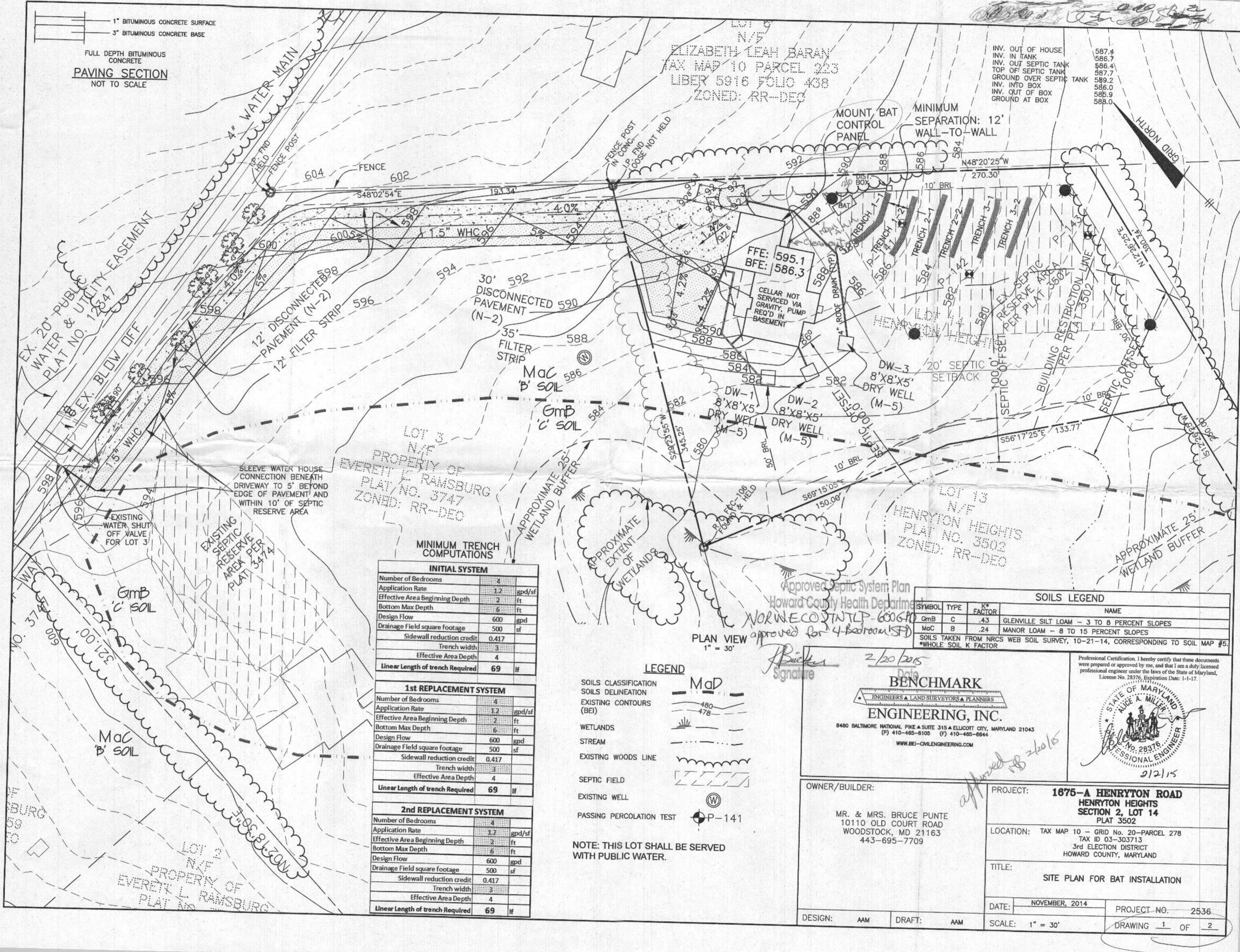
Robert Bricker, CPSS, REHS/RS
Environmental Health Specialist
Well and Septic Program

Copy: John Carney and Chris Malalgari, Benchmark Engineering, Inc.
file

1" BITUMINOUS CONCRETE SURFACE
 3" BITUMINOUS CONCRETE BASE
 FULL DEPTH BITUMINOUS CONCRETE
PAVING SECTION
 NOT TO SCALE

ELIZABETH LEAH BARAN
 TAX MAP 10 PARCEL 223
 LIBER 5916 FOLIO 408
 ZONED: RR-DEC

INV. OUT OF HOUSE 587.4
 INV. IN TANK 586.7
 INV. OUT SEPTIC TANK 586.4
 TOP OF SEPTIC TANK 587.7
 GROUND OVER SEPTIC TANK 589.2
 INV. INTO BOX 586.0
 INV. OUT OF BOX 585.9
 GROUND AT BOX 588.0



INITIAL SYSTEM

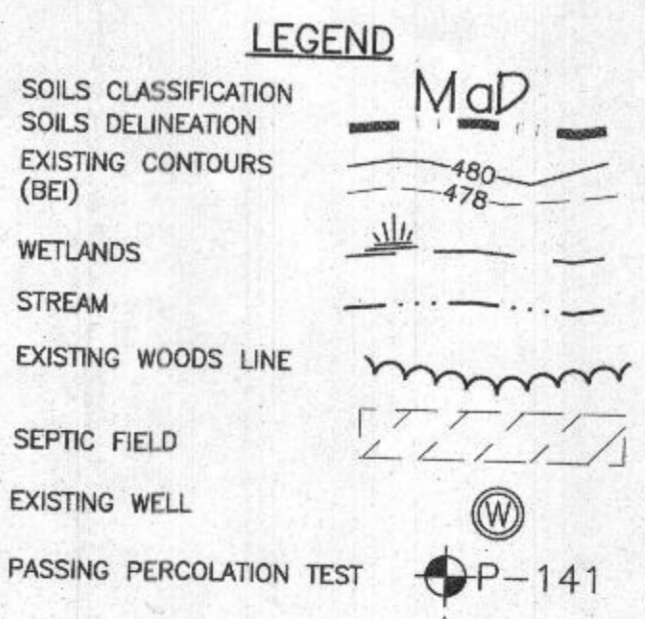
Number of Bedrooms	4
Application Rate	1.2 gpd/sf
Effective Area Beginning Depth	2 ft
Bottom Max Depth	6 ft
Design Flow	600 gpd
Drainage Field square footage	500 sf
Sidewall reduction credit	0.417
Trench width	3
Effective Area Depth	4
Linear Length of trench Required	69 lf

1st REPLACEMENT SYSTEM

Number of Bedrooms	4
Application Rate	1.2 gpd/sf
Effective Area Beginning Depth	2 ft
Bottom Max Depth	6 ft
Design Flow	600 gpd
Drainage Field square footage	500 sf
Sidewall reduction credit	0.417
Trench width	3
Effective Area Depth	4
Linear Length of trench Required	69 lf

2nd REPLACEMENT SYSTEM

Number of Bedrooms	4
Application Rate	1.2 gpd/sf
Effective Area Beginning Depth	2 ft
Bottom Max Depth	6 ft
Design Flow	600 gpd
Drainage Field square footage	500 sf
Sidewall reduction credit	0.417
Trench width	3
Effective Area Depth	4
Linear Length of trench Required	69 lf



NOTE: THIS LOT SHALL BE SERVED WITH PUBLIC WATER.

SOILS LEGEND

SYMBOL	TYPE	K* FACTOR	NAME
Gmb	C	.43	GLENNVILLE SILT LOAM - 3 TO 8 PERCENT SLOPES
Mac	B	.24	MANOR LOAM - 8 TO 15 PERCENT SLOPES

SOILS TAKEN FROM NRCS WEB SOIL SURVEY, 10-21-14, CORRESPONDING TO SOIL MAP #5.
 *WHOLE SOIL K FACTOR

Approved Septic System Plan
 Howard County Health Department
 NORWECOST/INTLP-600610
 approved for 4 bedroom (SF)

Buckler
 Signature

2/20/2015
 Date

BENCHMARK ENGINEERING, INC.
 ENGINEERS & LAND SURVEYORS & PLANNERS
 8480 BALTIMORE NATIONAL PIKE & SUITE 315 A ELLICOTT CITY, MARYLAND 21043
 (P) 410-485-6105 (F) 410-485-6644
 WWW.BEI-CIVILENGINEERING.COM

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: 1-1-17.



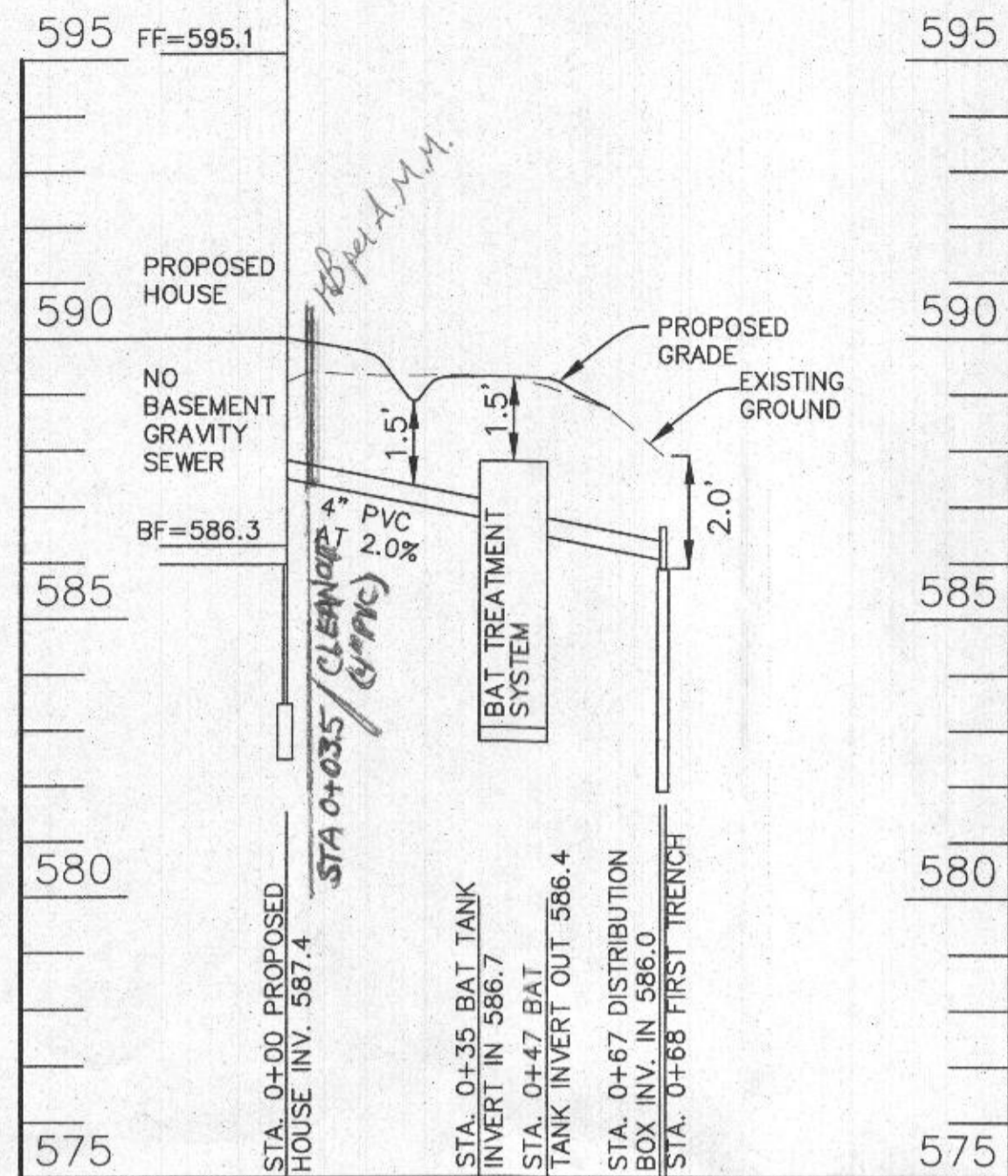
OWNER/BUILDER:
 MR. & MRS. BRUCE PUNTE
 10110 OLD COURT ROAD
 WOODSTOCK, MD 21163
 443-695-7709

PROJECT: **1675-A HENRYTON ROAD HENRYTON HEIGHTS SECTION 2, LOT 14 PLAT 3502**

LOCATION: TAX MAP 10 - GRID No. 20-PARCEL 278
 TAX ID 03-303713
 3rd ELECTION DISTRICT
 HOWARD COUNTY, MARYLAND

TITLE: **SITE PLAN FOR BAT INSTALLATION**

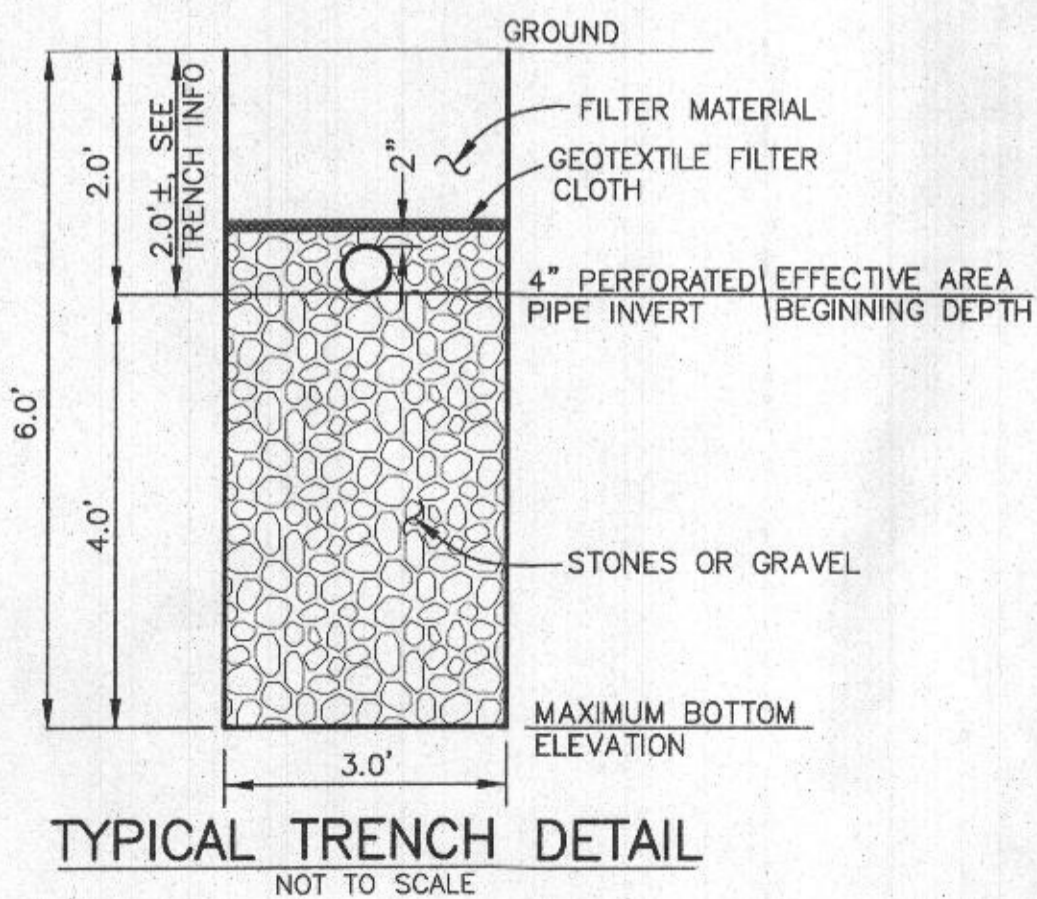
DATE: NOVEMBER, 2014 PROJECT NO. 2536
 DESIGN: AAM DRAFT: AAM SCALE: 1" = 30' DRAWING 1 OF 2



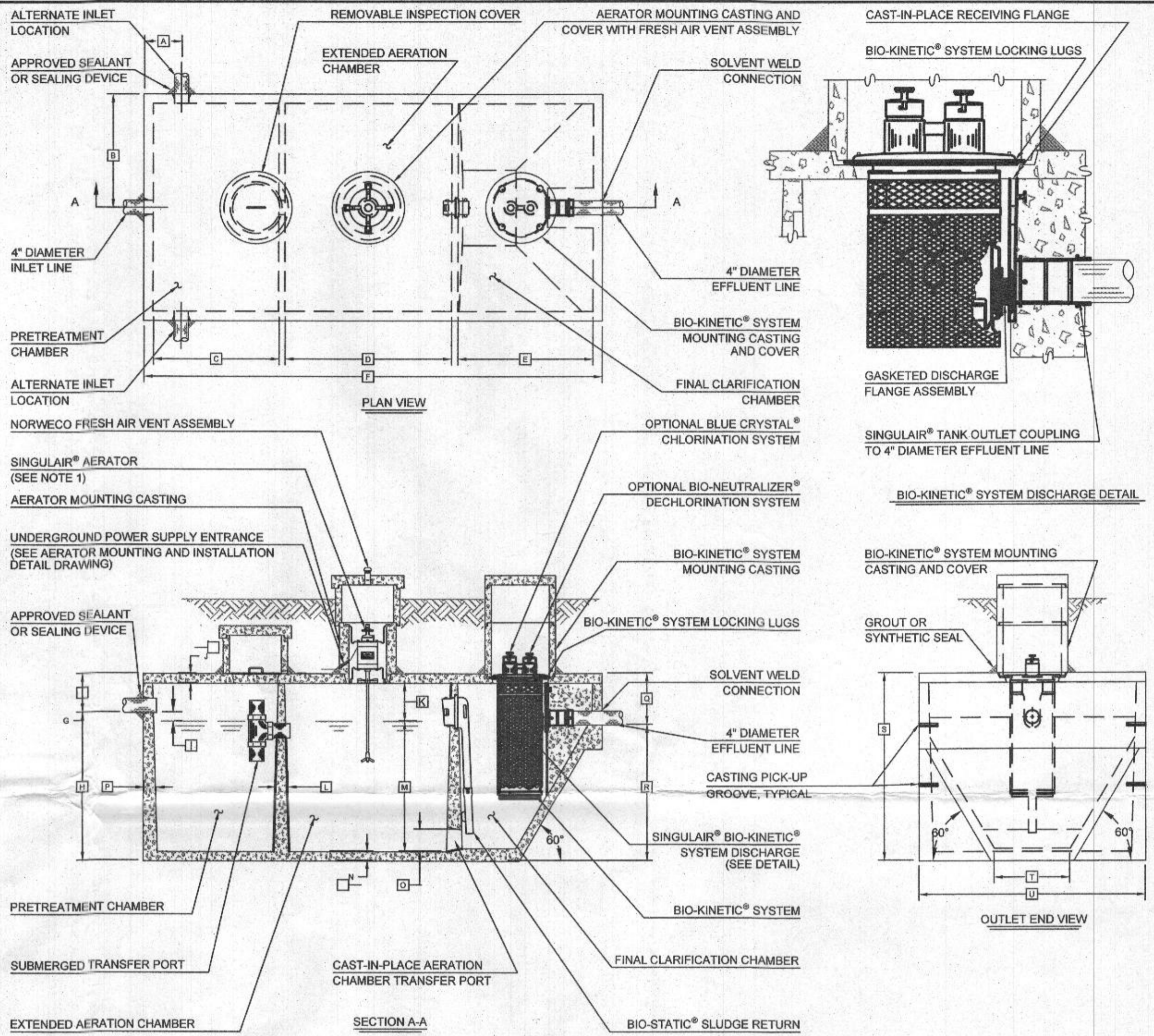
SEWER PROFILE - LOT 14
SCALE: VERTICAL 1"=3', HORIZONTAL 1"=30'

TRENCH INFORMATION

TRENCH 1-1	TRENCH 2-1	TRENCH 3-1
TRENCH LENGTH 35 LF	TRENCH LENGTH 35 LF	TRENCH LENGTH 35 LF
GROUND ELEVATION 587.9	GROUND ELEVATION 584.9	GROUND ELEVATION 582.5
INVERT ELEVATION 585.9	INVERT ELEVATION 582.9	INVERT ELEVATION 580.5
MAX. BOTTOM ELEV. 581.9	MAX. BOTTOM ELEV. 578.9	MAX. BOTTOM ELEV. 576.5
TRENCH 1-2	TRENCH 2-2	TRENCH 3-2
TRENCH LENGTH 35 LF	TRENCH LENGTH 35 LF	TRENCH LENGTH 35 LF
GROUND ELEVATION 586.5	GROUND ELEVATION 583.5	GROUND ELEVATION 580.8
INVERT ELEVATION 584.2	INVERT ELEVATION 581.5	INVERT ELEVATION 578.8
MAX. BOTTOM ELEV. 580.2	MAX. BOTTOM ELEV. 577.5	MAX. BOTTOM ELEV. 574.8



CRITICAL DIMENSIONS			
A	1'-0"	N	0'-3"
B	3'-0"	O	0'-6"
C	3'-4"	P	0'-3"
D	4'-5"	Q	1'-4"
E	3'-7"	R	3'-8"
F	12'-2"	S	5'-0"
G	1'-0"	T	2'-0"
H	4'-0"	U	6'-0"
I	0'-3"	V	
J	0'-3"	W	
K	1'-0"	X	
L	0'-2"	Y	
M	3'-6"	Z	



NOTES:
TOTAL SYSTEM CAPACITY: 1,300 GALLONS
RATED CAPACITY: 600 GALLONS PER DAY
APPLICABLE FOR A FOUR BEDROOM HOME

Approved Septic System Plan
Howard County Health Department
NORWECO TINTLP-600 GPD
approved for 4 Bedroom SFD
R. Bicker Signature
2/20/15 Date

- Required BAT Site Plan Notes
- Any change 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 sit plan may be required.
 - The maximum depth of the BAT shall be per the manufacturer's specification, 3.0'.
 - The blower may not be located further from the tank than the manufacturer's specifications, 75'.
 - The BAT system shall be maintained and operated for the life of the system.
 - The BAT shall be operated by and maintained by a certified service provider.
 - Within one month of installation, a person installing the BAT system shall report to the Maryland Department of the Environment (MDE) in a manner acceptable to MDE, the address and date of completion of the BAT installation and the type of BAT installed.
 - Electrical work for the BAT installation must be performed by a licensed electrician.
 - An agreement and Easement must be completed and signed by all applicable parties, and recorded in Land Records of Howard County.
 - The Health Department requires documentation for the start-up certification from the manufacturer prior to final approval of the installation.

SEE MANUFACTURER'S SPECIFICATIONS FOR DETAILS. WWW.NORWECO.COM

BENCHMARK
ENGINEERS • LAND SURVEYORS • PLANNERS
ENGINEERING, INC.
8480 BALTIMORE NATIONAL PIKE & SUITE 315 & ELLICOTT CITY, MARYLAND 21043
(P) 410-465-8105 (F) 410-465-6644
WWW.BE-CIVILENGINEERING.COM

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: 1-1-17.

OWNER/BUILDER:
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HENRYTON HEIGHTS
SECTION 2, LOT 14
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LOCATION: TAX MAP 10 - GRID No. 20-PARCEL 27B
TAX ID 03-303713
3rd ELECTION DISTRICT
HOWARD COUNTY, MARYLAND

TITLE: **SITE PLAN FOR BAT INSTALLATION**

DATE: NOVEMBER, 2014 PROJECT NO. 2536
SCALE: 1" = 30' DRAWING 2 OF 2