

3454,3464 GILLSVILLE HWY (HWY 323)

Level III Soil Survey; Summit Soil Consulting Inc.

HALL COUNTY

NRCS SERIES	Depth to ROCK inches	Depth to WATER inches	TRENCH DEPTH inches	ESTIMATED PERC RATE min/in	DOH CODE
Cecil	>72	>72	24-42	75	A
Chestatee	48-56	>56	20-32	70	A,K
Chestatee-H	34-42	>35	10-28	75	H
Hard Labor	>72	36-40	10-24	90	C
Hard Labor-2	>72	50-60	18-34	90	P
Cataula-V Variant	>72	20-40*	24-36**	90	T
Madison	65 >72	>72	24-42	55	A
Pacolet	65>72	>72	24-42	55	A
Chestatee 32-40%	48-56	>56	18-40	0.25 Gal/day/sqft	C,G
Rion	>72	>72	24-42	55	A
Rion 32-40%	>76	>76	45-52	55	A,G
Santuc	>72	16-25	NA	NA	F

Note: - Hard rock is defined as material impenetrable by hand auger, soft saprolite excluded

- Depth to water is defined as the depth to first indication of seasonal saturation

* Slow percolation zone

** Depth after cut grading

SUITABILITY CODES:

A: Soils should have ability to function as an absorption field with proper design, installation, and maintenance.

C: Due to seasonal saturation, and/or drainage problems, failure of conventional system is probable.

Alternative systems may be considered. Examples Aerobic Treatment Units, Drip Irrigation, Peat Moss Systems, Eljen Sand Filters and Low Pressure Gravel Beds. Consult with local health department.

F: Unsuitable for septic systems under most circumstances, rock, deep fill or water table near surface.

G: Due to slope conditions, these areas may be considered for a narrow trench installation or alternative method if proper depth and length can be achieved. An Aerobic Treatment Unit or other class 1 producing system should be considered to increase depth of installation on these steep slopes.

The septic system should be installed before construction to ensure proper installation

H: Test pits dug with a back-hoe may be considered to determine suitability due to multiple shallow rock refusals.

Rock refusal was encountered at 34"-42" inches with a hand auger. A shallow installation with an alternative system or conventional system may be considered pending pit studies. Septic system in first is recommended on these soils. Hand auger borings are limited in rocky conditions.

Installations depths may change based on pit studies.

K: These soils generally have sufficient depth of soil material over bedrock to accommodate a septic system, however, inclusions of rock with insufficient depth may occur.

Removing more than 18" of natural soil in these areas, will require the area to be reevaluated.

P: Soil has seasonal saturation in lower portion of soil and is subject to slow percolation in the upper portion of the soil.

Removing more than 12" of natural soil in these areas, will require the area to be reevaluated.

R: Test pits with a backhoe are recommended to determine suitability.

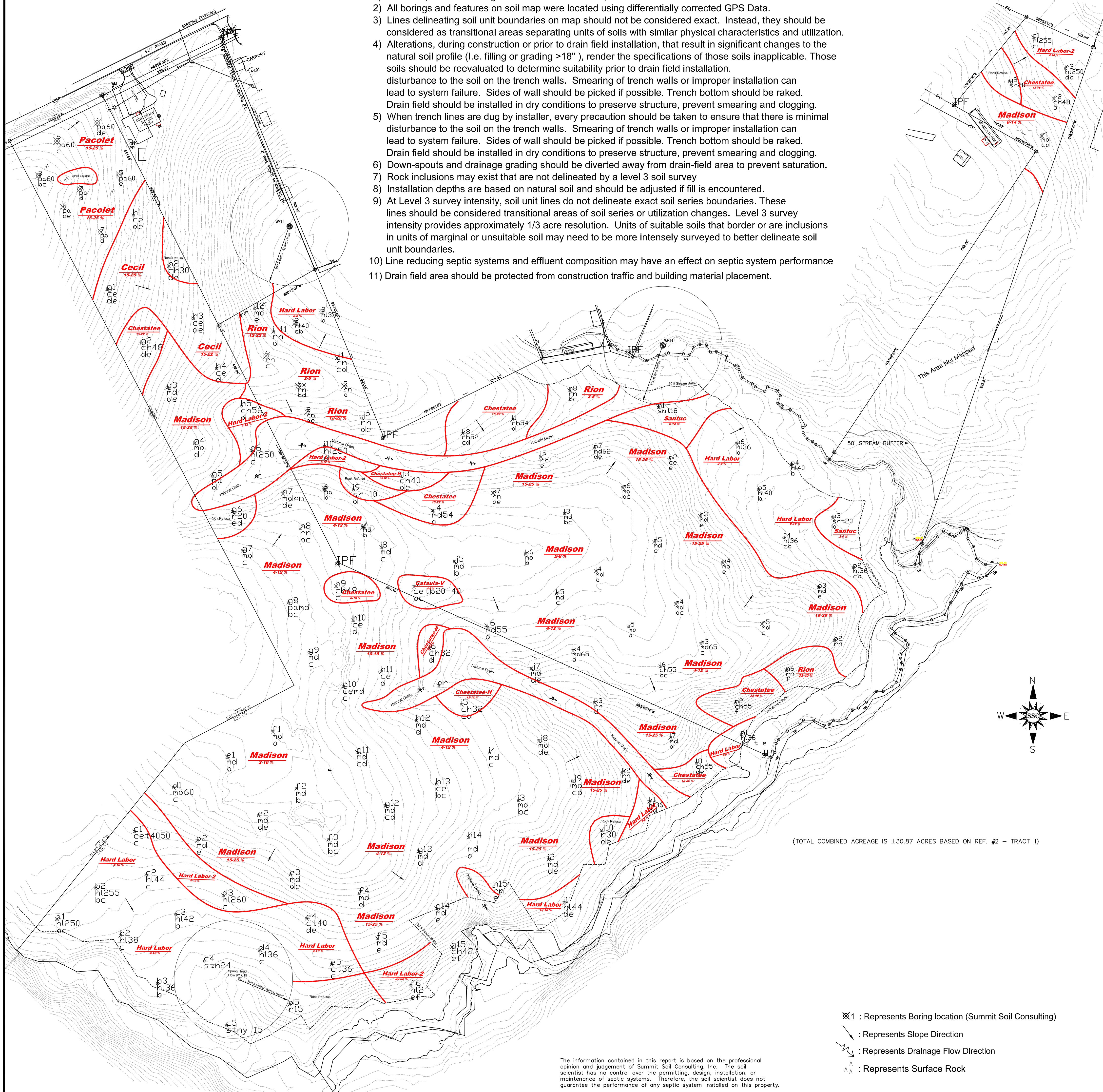
T: Soils should have ability to function as an absorption field with proper design, installation, and maintenance.

Profiles observed in this soil unit had low to high chroma mottling, indicative of slow percolation from 20-40 inches, but were free of low chroma mottling past 40 inches.

30 inches should be cut off top to remove majority of the restrictive layer.

GENERAL NOTES AND COMMENTS:

- 1) Base Map Source: Georgia Premier Land Services, Inc.
- 2) All borings and features on soil map were located using differentially corrected GPS Data.
- 3) Lines delineating soil unit boundaries on map should not be considered exact. Instead, they should be considered as transitional areas separating units of soils with similar physical characteristics and utilization.
- 4) Alterations, during construction or prior to drain field installation, that result in significant changes to the natural soil profile (i.e. filling or grading >18"), render the specifications of those soils inapplicable. Those soils should be reevaluated to determine suitability prior to drain field installation. disturbance to the soil on the trench walls. Smearing of trench walls or improper installation can lead to system failure. Sides of wall should be picked if possible. Trench bottom should be raked. Drain field should be installed in dry conditions to preserve structure, prevent smearing and clogging.
- 5) When trench lines are dug by installer, every precaution should be taken to ensure that there is minimal disturbance to the soil on the trench walls. Smearing of trench walls or improper installation can lead to system failure. Sides of wall should be picked if possible. Trench bottom should be raked. Drain field should be installed in dry conditions to preserve structure, prevent smearing and clogging.
- 6) Down-spouts and drainage grading should be diverted away from drain-field area to prevent saturation.
- 7) Rock inclusions may exist that are not delineated by a level 3 soil survey
- 8) Installation depths are based on natural soil and should be adjusted if fill is encountered.
- 9) At Level 3 survey intensity, soil unit lines do not delineate exact soil series boundaries. These lines should be considered transitional areas of soil series or utilization changes. Level 3 survey intensity provides approximately 1/3 acre resolution. Units of suitable soils that border or are inclusions in units of marginal or unsuitable soil may need to be more intensely surveyed to better delineate soil unit boundaries.
- 10) Line reducing septic systems and effluent composition may have an effect on septic system performance
- 11) Drain field area should be protected from construction traffic and building material placement.



(TOTAL COMBINED ACREAGE IS ±30.87 ACRES BASED ON REF. #2 - TRACT II)

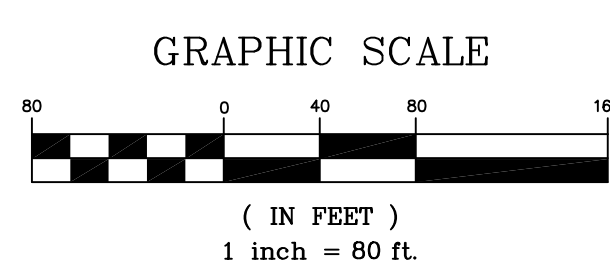
- ⊗ : Represents Boring location (Summit Soil Consulting)
- ↘ : Represents Slope Direction
- : Represents Drainage Flow Direction
- ▲ : Represents Surface Rock

The information contained in this report is based on the professional opinion and judgement of Summit Soil Consulting, Inc. The soil scientist has no control over the permitting, design, installation, or maintenance of septic systems. Therefore, the soil scientist does not guarantee the performance of any septic system installed on this property.

Date: 9/23/19

LEVEL 3 SOIL SURVEY

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City & Zip Code
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