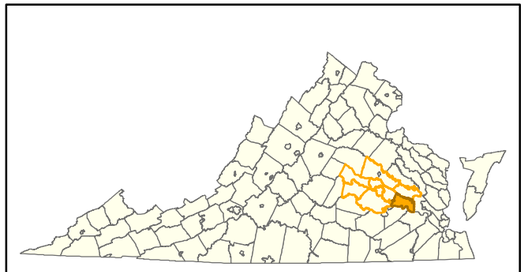
Developmental Constraints Based on Septic Tank Absorption

Charles City



No Limitation for Septic Tanks

Slight Limitation for Septic Tanks

Severe Limitation for Septic Tanks

Interstate

US Primary Highway

State Primary Highway

Railroad

Stream

Intermittent Stream

River, Lake, Pond

PROPERTY	LIMITS			RESTRICTIVE FEATURE
	SLIGHT	MODERATE	SEVERE	
1. USDA TEXTURE	---	---	ICE	PERMAFROST
2. TOTAL SUBSIDENCE (IN)	---	---	>24	SUBSIDES
3. FLOODING	NONE	RARE	FREQ, OCCAS	FLOODING
4. DEPTH TO BEDROCK (IN)	>72	<40-72	40	DEPTH TO ROCK
5. DEPTH TO CEMENTED PAN THICK (IN)	>72	20-40	<40	CEMENTED PAN
6. PONDING	---	---	+	PONDING
7. DEPTH TO HIGH WATER TABLE (FT)	>6	4-6	<4	WETNESS
8. PERMEABILITY (24-60", IN/H)	2.0-6.0	0.6-2.0	>6.0	PERCS SLOWLY
8a. PERMEABILITY (24-60", IN/H)	---	---	>6.0	POOR FILTER
9. SLOPE (PCT)	>8	8-15	<15	SLOPE
10. WEIGHT PERCENT >3" (WEIGHT AV.0-40")	<25	25-50	>50	LARGE STONES

Septic tank absorption fields are subsurface systems of tile or perforated pipe that distribute effluent from a septic tank into the natural soil. The centerline depth of the tile is assumed to be 24 inches. Only the soil between depths of 24 and 60 inches is considered in making the ratings. The soil properties and site features considered are those that affect the absorption of the effluent, those that affect the construction and maintenance of the system, and those that may affect public health.

The soil properties and qualities that affect the absorption of the effluent are permeability, depth to a seasonal high water table, depth to bedrock, depth to a cemented pan, and susceptibility to flooding. Stones and boulders and a shallow depth to bedrock, ice, or a cemented pan interfere with installation. Subsidence interferes with installation and maintenance. Excessive slope may cause lateral seepage and surfacing of the effluent in downslope areas. Also, soil erosion is a hazard where absorption fields are installed in sloping soils.

(Note: This county does not have any soils rated with moderate limits.)

Source: National Soil Survery Handbook, 1993

N

0 1 2 4 6 Miles

Source: US Census Bureau, 2000
Natural Resources Conservation Service, 2002
Richmond Regional Planning District Commission, 2004

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