

VI. CONCLUSION

The ability to control and shape the environment exists most powerfully at the local level. Local people are the most intimately involved with environmental and land use issues. They are the ones who must live most directly with the consequences of planning decisions.

Therefore, it makes good sense that local people should have access to planning tools and inventory systems such as the ones described in this report. As we have stated, there is no 'best' system, only a best system for a particular community's needs and resources. State and regional planning groups have a major role to play in aiding communities select, set-up, and maintain computerized or non-computerized inventory systems which fit the individual community.

This project has been an attempt to show, in an exploratory fashion, what some of the capabilities and outcomes can be for Vermont communities which use computer techniques for natural resource inventory systems.

It has been a continuation of the Center for Studies in Food Self-Sufficiency's effort to carry out projects in the community--projects in which the community itself can directly participate and from which it can benefit.

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APPENDIX A

Key for Physical Limitations for Development Map:

Development Requiring On-Site Subsurface Sewage Disposal

(Based on an analysis of limiting factors on design, construction, operation, and maintenance of site improvements according to current state standards and conventional engineering practice).

CRITICAL FACTORS:

15% or greater slopes
excessively wet soils
water
10-15% slope plus seasonal high water table
10-15% slope plus 0'-4' depth to bedrock

SERIOUS FACTORS:

seasonal high water table
10-15% slope plus hardpan
10-15% slope plus 4'-8' depth to bedrock
4'-8' depth to bedrock plus seasonal high water table or hardpan

MODERATE FACTORS:

10-15% slope
fragipan
4'-8' depth to bedrock

APPENDIX A
(continued)

Key for Physical Limitations for Development Map:

Low-Impact Development With Alternative Waste Disposal Systems

(Based on an analysis of limiting factors on the design, construction, operation, and maintenance of limited site improvements according to standards and procedures to minimize cost and alteration to the existing topography).

CRITICAL FACTORS:

25% slope
water
10-25% slope plus excessively wet
15-25% slope plus 0'-4' depth to bedrock

SERIOUS FACTORS:

15-25% slope
excessively wet
0'-4' depth to bedrock
10-15% slope plus 0'-4' depth to bedrock

MODERATE FACTORS:

10-15% slope plus seasonally wet
10-15% slope plus fragipan

SLIGHT LIMITATIONS:

4'-8' depth to bedrock
fragipan
seasonally wet
10-15% slope

APPENDIX B

from SOIL CONSERVATION SERVICE

Soil Potential for Agriculture in Vermont

The soils and land of Vermont have been classified into four categories with respect to their potential for agriculture. The four categories are Highest, Good, Low, and Limited.

The soils are rated on their relative ability to support crops that are commonly grown in Vermont. The Highest and Good categories comprise those soils with the highest potential productivity and the least limitations for farming. The Highest category coincides with the national definition of "Prime Farmland" in the Land Inventory and Monitoring program as administered by the Soil Conservation Service.

The definitions of each category follows:

Highest Potential

Soils in this category qualify for Prime Farmland as defined in the National Land Inventory and Monitoring program. They have high potential for sustained agriculture and have little or no limitations for a wide variety of crops adapted to Vermont's climate. They have the following attributes:

1. Soil temperature and growing season are favorable.
2. Soil moisture is adequate to sustain crops throughout the growing season.
3. Water moves readily through the soil, and hardpans or other restrictive layers are absent.
4. Stones comprise less than 10 percent of the surface.
5. The soils are not frequently flooded and have no water table within 1.5 feet of the surface during the growing season.
6. The soils are not frequently flooded and have no water table within 1.5 feet of the surface during the growing season.
7. Slope is favorable and soils are not subject to erosion.
8. Soils are deep and rock outcrops are not present in sufficient amount to hinder use.

APPENDIX C

from SOIL CONSERVATION SERVICE

Good Potential

Soils in this category are in land capability classes II and III according to the National Land Capability Classification system. This system was developed by the USDA Soil Conservation Service. Soils in class II and III that qualify for the "Highest Category" are excluded from this category. Soils in this category have good potential for growing crops, but one or more limitations will restrict the choice of crops and require more intensive management than for soils in the Highest category. The limitations result from one or more of the following:

1. Excess slope and an erosion hazard.
2. Excess wetness or slow permeability.
3. A flooding hazard.
4. Shallow or moderate depths to bedrock, hardpan, or other layers that limit the rooting zone.
5. Moderately low available soil moisture.

*The Vermont definition of prime used in this paper includes the SCS definitions of Highest Potential and Good Potential as indicated in these Appendices.

APPENDIX D

Summary Table:

Changes in Use of Agricultural Land Between 1942 and 1975

	All Agricultural Land	Prime (1) Vermont	Prime (2) Highest Quality	Not Prime (1) Vermont
1942	5754	3910 (68%)	254 (4%)	1844 (31%)
1975	4481	3084 (69%)	199 (4%)	1397 (31%)
Change	1273	826	55	447
Change as % of 1975 amount	22%	21%	22%	24%
Resident./ Commercial/ Industrial as % of change	36%	39%	53%	29%
Forest as % of change	48%	50%	19%	45%

Measured in hectares (2.47 acres)

APPENDIX E

Brattleboro Soils: Agricultural Potential

<u>Soil Type</u>	<u>Slope</u>
HIGHEST POTENTIAL	
Unadilla	0-8
Scio	0-8
Merrimac	0-8
Raynham	0-8
Colrain	0-8
Stowe	0-8
Ondawa	0-8
Woodbridge	0-8
Peru	0-8
CLASS II	
Tunbridge/Woodstock	0-8
CLASS III	
Unadilla	8-15
Scio	8-15
Merrimac	8-15
Windsor	0-8
Deerfield	0-8
Tunbridge/Woodstock	8-15
Stowe	8-15
Woodbridge	8-15
Woodstock	0-8

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