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Food Production Capability In New England

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In recent years, each of the New England states have considered or enacted legislation with the intent of preserving food production capability. Justification for these programs include the need to retain farmland for the use of future generations flavored with some words about self-sufficiency in food production. Proponents argue that the market system has failed to reflect the needs of future generations in terms of sufficient income to current farmers to enable them to continue in farming.

The economic market system may be used to find optimal allocation of resources for the present and over time as desired by society. However, in the case of farmland, the market system has not provided the desired resource allocation thus, there is a basis for government intervention.

The issue of alternative methods for retaining food production capability in New England has been debated by farmers, government officials and citizens. Discussion of alternative methods of preserving food production capability requires some measures of the New England agricultural industry. Three measures are (1) Cash Receipts from Farm Marketings, (2) Land in farms, and (3) Number of farms. Changes in these measures provide a basis for evaluating the effectiveness of various methods.

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Cash Receipts From Farm Marketings

The actual value of cash receipts from farm marketings in New England increased from $823 million in 1972 to $1,602 million in 1982. However, the real value of cash receipts decreased from $823 million to $774 million when price levels were adjusted for inflation - a decrease of six percent. (See Table 1)

Land in Farms

In 1880, there were 21,510,000 acres of land in farms in New England. By 1980, the amount of land in farms had declined to 5,120,000, a 7% decrease from 1972. Connecticut and Massachusetts show a larger decrease but still less than two percent per year. The decrease in land in farms in New England is nearly one percent a year. However, that is ten percent in ten years, or nearly 500,000 acres. If current trends continue, New England will lose the equivalent of the New Hampshire Agricultural Economy by 1990. (See Table 2)

Number of Farms

In 1980, the number of farms in New England was estimated at 27,220. This is a decrease from the 206,900 farms in New England in 1880. More recently, the annual loss in number of farms since

1964 is estimated at 967 and since 1972 at 270. Current trends show a loss in number of farms of about one percent a year. By 1990, that is a decrease of 2700 farms and farm managers. Where are the food production managers of the future? (See Table 3)

Table 1
Deflated Cash Receipts From Farm Marketings

STATE	Actual 1972	Actual 1982	In 1972 dollars 1972	In 1972 dollars 1982*	% CHANGE In 1972 dollars
	(Millions of Dollars)				
CT	$169	$309	$169	$149	-12
ME	239	408	239	197	-18
MA	160	341	160	165	+3
NH	57	104	57	50	-12
RI	21	33	21	16	-24
VT	177	407	177	197	+11
New England	$823	$1602	$823	$774	-6

*Calculated by dividing 1982 actual figures by GNP implicit price deflator, which is 206.88 when 1972 = 100. Agricultural Outlook, Economic Research Service, U.S. Department of Agriculture, Washington, D.C., September 1983, p. 42.

Table 2
Land in Farms, New England

STATE	1880	1964	1972	1980	% CHANGE 1972-1980
	(Million Acres)				
CT	2.45	.72	.53	.45	-15
ME	6.55	2.59	1.75	1.64	- 6
MA	3.40	.94	.72	.65	-10
NH	3.72	.91	.58	.58	N.C.
RI	.51	.10	.07	.06	-14
VT	4.88	2.52	1.85	1.74	- 6
New England	21.51	7.78	5.50	5.12	- 7

Table 3
Number of Farms, New England

STATE	1880	1964	1972	1980	% CHANGE 1972-1980
	(Thousands)				
CT	30.6	6.0	4.5	3.8	-16
ME	64.0	13.0	7.8	8.0	+ 2
MA	38.4	8.7	5.9	5.2	-12
NH	32.2	5.0	2.7	3.2	+19
RI	6.2	1.0	.7	.7	N.C.
VT	35.5	9.0	6.7	6.3	- 6
New England	206.9	42.7	28.3	27.2	- 4%

The real value of cash receipts from farm marketings in New England has declined about six percent during the last ten years. The amount of land in farms for the region is decreasing about one percent annually as is the number of farms. These are symptoms of a slowly declining industry.

The state legislature in each of the New England states has taken the political pulse and has enacted or is considering legislation to preserve food production capability in each state.

Alternative Methods of Preserving Food Production Capability in New England

Several of the states have enacted differential assessment laws which make possible the assessment of farmland at its agricultural use value rather than the fair market value. Differential assessment laws may be of three types: preferential assessment, deferred taxation and restrictive agreements. Preferential assessment of farmland allows the farmland to be assessed at use value and has very loose eligibility requirements and limited penalities for withdrawal. This type of legislation is attractive to participation and probably least effective in retaining land in agricultural use.

Deferred taxation is a form of preferential assessment with tight eligibility requirements and specific penalties for withdrawal from the program, including repayment of deferred taxes.

Restrictive agreements are essentially a contract between land owner and local taxing entity whereby the landowner agrees to keep land in farming in return for use value assessment on the land.

Other methods of preserving food production capability include. (1) purchase of development rights, (2) agricultural zoning, (3) circuit breaker income tax credits, (4) current use valuation for estate and inheritance tax, (5) capital gains tax, (6) agricultural districts, and (7) tax stabilization programs. Many of these methods have an impact on local property taxes paid by farmland owners and other local taxpayers. The tax incidence of preservation programs can be estimated and considered before the programs are adopted.

AN EXAMPLE OF USE VALUE ASSESSMENT
100 ACRE FARM ASSESSED AT $1,000/ACRE.
TAX RATE $25/$1,000 TAX BILL $2,500
40A FORAGE CROPLAND
40A PASTURE
10A WOODLAND
10A NECESSARY RELATED LAND
USING FARMLAND ASSESSMENT VALUES.

FORAGE CROPLAND	40A x $200 =	$8,000
PASTURE	40A x $100 =	4,000
WOODLAND	10A x $ 75 =	750
NECESSARY	10A x $ 50	500
TOTAL FARMLAND ASSESSMENT VALUE		$13,250

ASSESSED VALUE x TAX RATE

13,250 x $25 = $331

BEFORE	$2,500
AFTER	331
TAX REDUCTION	$2,169

IN A TOWN WITH TWENTY FARMS, IF ALL TWENTY FARMS IN TOWN USE FARMLAND ASSESSMENT, MUST REDUCE TOWN TAX BASE

$86,750 PER FARM x 20 FARMS = $1,735,000

$100,000,000 - $1,735,000 = $98,265,000

$$\frac{\text{TAX LEVY}}{\text{TAX BASE}} = \frac{\$\ 2,500,000}{\$98,265,000} = \$25.44 - \text{NEW TAX RATE}$$

FARMLAND OWNER TAX BILL

ASSESSED VALUE x TAX RATE = TAX BILL

$13.250 x $25.44 = $337.08

BEFORE	$2,500.00
AFTER	337.08
TAX REDUCTIONS	$2,162.92

HOME OWNER

ASSESSED VALUE x TAX RATE = TAX BILL

BEFORE $100.000 x $25.00 = $2500

AFTER $100.000 x $25.44 = $2544

TAX INCREASE $ 44

IMPACT OF FARMLAND ASSESSMENT PROGRAM

FOR THE FARMER	
ANNUAL TAX REDUCTION	$2,162.92
FOR THE HOME OWNER	
ANNUAL TAX INCREASE	$ 44.00

Consequences of Adopting Alternative Methods

One approach to evaluating the impact of alternative land preservation methods is to estimate the change in local property taxes for the farmland owner and residential home owners. To facilitate this analysis, a "Tax Primer" may be used to help people understand how local property taxes are determined and to evaluate programs that have an impact on local property taxes.

TAX PRIMER

HOW ARE LOCAL PROPERTY TAXES FIGURED?

NEED TO KNOW THREE THINGS.

TAX LEVY - TOWN BUDGET, SCHOOLS, POLICE, FIRE, TOWN OFFICIALS, ROADS, PARKS

TAX BASE = FAIR MARKET VALUE OF ALL PROPERTY IN TOWN.

$$\text{TAX RATE} = \frac{\text{TAX LEVY}}{\text{TAX BASE}} = \text{IN DOLLARS/\$1,000.}$$

IF

TAX LEVY = $ 2,500,000
TAX BASE = $100,000,000
TAX RATE = $\frac{\$\ 2,500,000}{\$100,000,000}$ = .025/DOLLAR or $25/$1,000

IF HAVE 100 ACRE FARM ASSESSED AT $1,000/ACRE (MARKET VALUE)

TAX DUE = TAX RATE x ASSESSED VALUE

$25/$1,000 x 100 (1,000)

25 x 100 = $2,500

$$\frac{\text{TAX DUE } \$2,500}{100 \text{ ACRES}} = \$25/\text{ACRE TAX.}$$

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In this example, when several farms were assessed at farmland values, the tax base in town was reduced, the tax levy stayed the same and the tax rate increased. The farmers paid less property tax since the tax burden was shifted to the remaining taxpayers. The intent of the farmland assessment program is to preserve the food production capability. The effectiveness of the program will be measured over time by change in deflated cash receipts, land in farms and number of farmers.

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