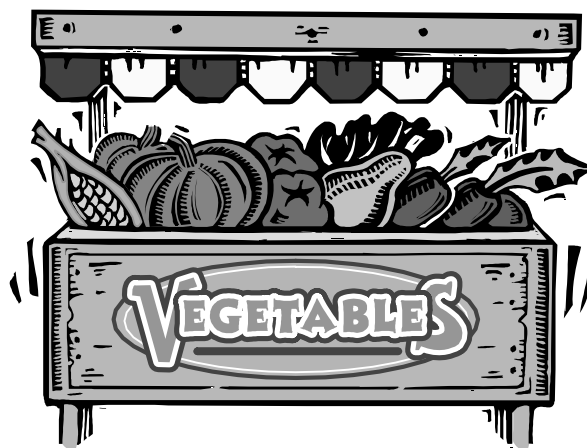


# **An Analysis of Vegetable Farms' Direct Marketing Activities in New York State**



**Wen-fei L. Uva**

Department of Applied Economics and Management  
College of Agriculture and Life Sciences  
Cornell University  
Ithaca, NY 14853-7801

Publication price per copy is \$5.00

For additional copies, please contact:

Wen-fei Uva  
Sr. Extension Associate  
456 Warren Hall  
Cornell University  
Ithaca, NY 14853-7801

Email: [WL32@CORNELL.EDU](mailto:WL32@CORNELL.EDU)  
Phone: 607-255-3688  
FAX: 607-255-9984

It is the Policy of Cornell University actively to support equality of educational and employment opportunity. No person shall be denied admission to any educational program or activity or be denied employment on the basis of any legally prohibited discrimination involving, but not limited to, such factors as race, color, creed, religion, national or ethnic origin, sex, age or handicap. The University is committed to the maintenance of affirmative action programs which will assure the continuation of such equality of opportunity.

## ABSTRACT

Farm retail marketing or farmer-to-consumer direct marketing is an important outlet for many New York vegetable products. Marketing direct to consumers takes special skills and abilities on the part of marketers, and also requires a favorable location with respect to land resources and local markets. Since many farmers and direct market managers lack the resources and experience to compete with supermarkets, it is important for direct marketing operators to differentiate themselves from the mass marketers. The goal of this study was to analyze the effectiveness of direct marketing activities and marketing strategies used by New York vegetable farms. A survey designed to collect information on farm retail marketing practices from New York vegetable farms was conducted during the winter of 2000-20001. Results were analyzed based on business profiles of New York vegetable farms with direct marketing activities, marketing channels used, retail seasonality, product mix, importance of different direct marketing activities, effectiveness of different marketing and business management tools, and future plans for various marketing activities.

The surveyed vegetable farms had average total farm sales of \$274,311 and average retail sales of \$123,612. Direct marketing to consumers was an important source of farm income for a majority of the surveyed New York vegetable farms with retail mar-

keting activities. Sixty-nine percent of the respondents received more than half of their farm gross income from direct sales to consumers. However, vegetable farms with direct marketing activities generally did not rely on retail alone. Farms with higher gross sales utilized more marketing channels and depended more heavily on wholesale. May through October is the most important sales season for farmer-to-consumer direct marketing activities. The surveyed farms retailed more than just the items they produced. Purchased items for resale were an important avenue to expand product line and increase the volume of products available for retail. Three most commonly used direct marketing methods were roadside markets, farmers' markets and pick-your-own. Among all the direct marketing components, fresh farm products - including fresh vegetables, fruits, and meat products - were rated as most important to the operation by most surveyed farms (83 percent). Ice cream stand had the second highest rating but was only rated by 3 percent of the surveyed farms. Ornamental plants and holiday crops were rated number three by 43 percent and 54 percent of farms, respectively. The most commonly used promotion tools were "word-of-mouth" and "newspapers", and "labor related challenges" and "competition in the markets" were the two major concerns among survey respondents.

## ACKNOWLEDGEMENTS

This survey was conducted by the Cornell Horticulture Business Management and Marketing Program in the Department of Applied Economics and Management at Cornell University. Sincere appreciation goes to the New York State Vegetable Growers Association for providing funding for this study. The author thanks Diane Eggert of New York State Farmers' Direct Marketing Association and Bob Lewis of New York State Department of Agriculture & Markets for identifying vegetable farms with direct marketing activities in the state to participate in the survey. Special appreciation also goes to Dr.

Anu Rangarajan in the Department of Horticulture and Dr. Nelson Bills in the Department of Applied Economics and Management at Cornell University, Monika Roth and Brian Caldwell of Cornell Cooperative Extension, and Diane Eggert of New York State Farmers' Direct Marketing Association for providing assistance in developing the survey questionnaire and reviewing the report. Finally, special thanks are extended to New York State vegetable operators for providing valuable comments and participating in the study.

## TABLE OF CONTENTS

	<i>Page</i>
Abstract .....	i
Acknowledgements .....	ii
Executive Summary .....	v
I. INTRODUCTION .....	1
II. STUDY APPROACH AND DEFINITIONS .....	2
III. RESULTS .....	4
Surveyed Respondent Profile .....	5
The Role of Direct Market Sales to Farm Income .....	7
Marketing Channels Used by Vegetable Farms with Direct Marketing Activities .....	7
Direct Marketing Seasonality .....	9
Direct Marketing Methods .....	12
Direct Marketing Product Enterprises .....	12
<i>Product Mix</i> .....	12
<i>Items Purchased for Resale</i> .....	15
<i>Entertainment Activities</i> .....	16
<i>Organic Product Offerings</i> .....	16
<i>Restaurant/Cafe/Deli</i> .....	16
Future Plans .....	17
Marketing Tools .....	18
Business Management Strategies Used to Improve Profitability .....	21
Direct Marketers' Views on Barriers, Opportunities and Training Needs .....	23
IV. CONCLUSION .....	28
REFERENCES .....	28
V. APPENDIX A .....	31
VI. APPENDIX B -- SURVEY INSTRUMENT .....	49

## LIST OF TABLES

Table III-1. Direct Marketer Profile Classified by Retail Sales, NY (2000), PA (1996) and NJ (1992) .....	5
Table III-2. Descriptive Statistics of the Surveyed Direct Marketing Vegetable Farms' Direct Marketing (Retail) Sales, by Size of Retail Sales .....	5
Table III-3. Comparison of Annual Total Farm Gross Sales and Direct Marketing (Retail) Sales, by Total Farm Sales .....	8
Table III-4. Marketing Channels Used by NY Direct Marketing Vegetable Farms .....	9
Table III-5. Average Annual Direct Marketing (Retail) Sales for Different Direct Marketing Methods, by Retail Sales .....	13
Table III-6. Frequency of Selling at Farmers' Markets and Sales, by Retail Sales .....	13
Table III-7. Percentage of Sales and Businesses by Product Line .....	14
Table III-8. Items Purchased for Resale by Product: Urban vs. Rural Retail Locations .....	15
Table III-9. Organic Product Marketing by Retail Sales .....	17
Table III-10. Ranking of Top Barriers Facing Direct Marketing Operations, by Retail Location .....	25
Table III-11. Ranking of Top Opportunities Facing Direct Marketing Operations, by Retail Location ....	26

	<i>Page</i>
Table III-12. Ranking of Top Training Needs for Direct Marketing Operations, by Retail Location .....	27
Table V-1. Areas of Crop Produced, by Total Farm Receipts .....	31
Table V-2. Crops Produced by New York Direct Marketing Vegetable Farms, by Total Farm Receipts ...	31
Table V-3. Marketing Outlet Used by New York Vegetable Farms with Direct Marketing Outlets, by Size of Businesses .....	32
Table V-4. Average Percentage of Retail Income Generated in Each Month, by Retail Sales .....	33
Table V-5. Direct Marketing Methods Used by New York Vegetable Farms and Retail Sales Generated by Each Marketing Method .....	34
Table V-6. Average Retail Sales and Percentage of Respondents Offering Each Product Line, by Retail Sales .....	35
Table V-7. Items Purchased for Resale for Each Product Line, by Retail Sales .....	36
Table V-8. On-farm Entertainment Activity Offerings and Charges, by Retail Sales .....	37
Table V-9. Future Plans for Different Direct Marketing Components, by Retail Sales .....	38
Table V-10. Ranking of Top Barriers Facing Direct Marketing Operations, by Retail Business .....	39
Table V-11. Ranking of Top Opportunities for Direct Marketing Operations, by Retail Business .....	40
Table V-12. Ranking of Top Training Needs for the Direct Marketing Operations, by Retail Businesses .....	41

## **LIST OF FIGURES**

Figure III-1. Distribution of Survey Respondents from New York Counties .....	4
Figure III-2. Distribution of Respondents by Retail Sales: Urban vs. Rural Retail Locations .....	6
Figure III-3. Years Involved in Direct Marketing, by Retail Sales .....	7
Figure III-4. Percentage of Total Annual Farm Sales from Direct Marketing (Retail) Sales: Urban vs. Rural Retail Locations .....	8
Figure III-5. Average Number of Marketing Channels Used by Survey Respondents .....	10
Figure III-6. Average Months of Retail Operation by Retail Sales: Urban vs. Rural Retail Locations .....	10
Figure III-7. Sales Generated in each Month as Percentage of Total Surveyed Retail Sales: Urban vs. Rural Retail Locations .....	11
Figure III-8. Direct Marketing Methods Used by Respondents and Percentage .....	12
Figure III-9. Average Number of Product Lines by Retail Sales: Urban vs. Rural Retail Locations .....	14
Figure III-10. Incidence of On-Farm Entertainment Activities and Charges: Urban vs. Rural Retail Locations .....	16
Figure III-11. Average Revenue from Restaurant, Cafe, and Deli Operations, by Retail Sales .....	17
Figure III-12. Future Plans for Different Direct Marketing Enterprises .....	18
Figure III-13. Respondents' Utilization of Different Marketing Tools, by Retail Location .....	19
Figure III-14. Effectiveness Rating of Different Marketing Tools, by Retail Location .....	19
Figure III-15. Annual Marketing Budget as Percentage of Retail Sales .....	20
Figure III-16. Respondents' Utilization of Different Business Management Tools, by Retail Sales .....	21
Figure III-17. Effectiveness Rating of Different Business Management Tools, by Retail Location .....	22
Figure V-1. Effectiveness of Different Marketing Tools, by Retail Sales .....	42
Figure V-2. Effectiveness of Different Marketing Tools, by Retail Sales (cont.) .....	43
Figure V-3. Effectiveness of Different Marketing Tools, by Retail Sales (cont.) .....	44
Figure V-4. Effectiveness of Business Management Strategies, by Retail Sales .....	45
Figure V-5. Effectiveness of Business Management Strategies, by Retail Sales (cont.) .....	46
Figure V-6. Effectiveness of Business Management Strategies, by Retail Sales (cont.) .....	47

## **LIST OF BOXES**

Box 1. Definition of Farmer-to-Consumer Direct Marketing Methods Used in This Study .....	3
---	---

## EXECUTIVE SUMMARY

Farmer-to-consumer direct marketing or farm retailing is an important outlet for many New York vegetable products. This marketing channel experienced a resurgence of interest in recent decades. Some contributing factors include depressed wholesale farm prices and consolidation in the produce industry in recent years. Many medium and small size farms have adopted direct marketing to consumers as an alternative to sustain business vitality. In addition, growing consumer interest in nutrition and food quality, combined with increased attention in the sustainable agriculture movement and in local community development, further fueled consumer interest in direct purchasing from farmers.

Marketing direct to consumers takes special skills and abilities on the part of marketers, and also requires a favorable location with respect to land resources and local markets. Since many farmers and direct marketing managers lack the resources and experience to compete with supermarkets, it is important for direct marketing operators to differentiate themselves from mass marketers. This report summarizes results of a survey designed to collect information on farmer-to-consumer direct marketing (retail) practices used by New York vegetable farms.

Objectives of this study are to:

- ◆ Determine the economic dimension of farmer-to-consumer direct marketing activities on New York vegetable farms.
- ◆ Analyze effectiveness of different marketing activities and strategies used by New York farmer-to-consumer direct marketing vegetable farms.
- ◆ Identify industry concerns and research questions for future in-depth direct marketing studies.

The direct marketing sales in this study refer to farms selling their products (food and non-food) and services directly to consumers using various retail outlets (roadside markets, farmers' markets, pick-your-own, community supported agriculture, catalog, internet, etc.). The products sold could include products grown on the farm as well as agricultural and non-agricultural products purchased for resale. A mail survey was developed to collect information on farm direct marketing practices, as defined above, from New York vegetable

farms with direct marketing sales in 2000.

Results from 122 completed surveys are summarized in the analysis. The survey respondents' average total annual gross sales were \$274,311 in 2000. Although the overall average retail sales of the surveyed respondents were \$123,196 in 2000 (including products grown on the farm and purchased for resale as well as services and entertainment activities), one-half of the respondents had less than \$30,000 (median) annual retail sales. The majority of surveyed farms produced more than vegetables. Among the surveyed direct marketing vegetable farms, 46 percent also produced fruits and berries, and 45 percent also produced ornamental crops.

Direct marketing to consumers was an important source of farm income for a majority of the surveyed direct marketing vegetable farms. Of the farms surveyed, 45 percent of total farm sales in 2000 were from retail business. Sixty-nine percent of the respondents received more than half of their farm's gross income from direct sales to consumers. Moreover, for 44 percent of the respondents, retail sales accounted for more than 90 percent of their total farm receipts, compared with 7 percent of the respondents who attributed less than 10 percent of farm receipts to retail. Among respondents, the average percentage of sales from direct sales to consumers was 72 percent.

The surveyed direct marketing vegetable farms generally did not depend on retail alone. Among the five marketing channels identified in this survey - 'wholesale to supermarkets', 'wholesale to other retail farm markets', 'wholesale to foodservice outlets', 'wholesale through other wholesale outlets' (wholesalers, brokers, processors, auction, etc.), and 'direct marketing to consumers' - respondents used an average of 2.3 marketing channels to sell their products. 'Wholesale to other retail farm markets' is the most commonly utilized wholesale outlet, while foodservice outlets was the least utilized wholesale channel. Although only 29 percent of the respondents wholesaled through 'other wholesale outlets', this marketing channel is important to farm income. Twenty-nine percent of total surveyed farm sales were generated from this wholesale channel, compared to 14 percent from 'wholesale to other retail farm markets'.

New York direct marketing vegetable farms generally only retail seasonally. The surveyed respondents retailed an average of 6.4 months in 2000. About one-quarter (24 percent) of respondents retailed less than four months of the year, and only 8 percent retailed year-round. Operations with higher retail sales operated longer retail seasons, and operations with urban locations also had longer retail seasons. May through October is the most important sales season for farmer-to-consumer direct marketing sales. Fall sales were very significant for New York direct marketers, and December is a month with potential to generate high sales.

Fresh vegetables, ornamental plants and fresh fruits were the top three retail product categories for New York direct marketing vegetable farms. Other product categories sold by surveyed respondents included processed products, holiday crops (pumpkins and Christmas trees), gifts and accessories, baked goods, ice cream, meat products, milk and cheese products, and other products (maple syrup, mushrooms, entertainment activities, furniture, firewood and wool). Larger retail operations had a broader product mix. New York direct marketing vegetable farms also retailed more than just items that they produced on the farm. They purchased items for resale to expand the product line, increase variety, and supplement the volume of products available for retail. The surveyed farms are least likely to purchase vegetables and pumpkins to resell. On the other hand, for all other product lines identified in this study, more than 50 percent of farms purchased some items in those product lines to resell.

Among the direct marketing methods identified in this study (roadside markets, farmers' markets, pick-your-own (PYO), community supported agriculture (CSA), catalog sales, internet sales, and other methods (including direct order/custom sales)), New York direct marketing vegetable farms with direct marketing activities generally used

one to two marketing methods to retail their products. Three most commonly used direct marketing methods were roadside markets, farmers' markets and pick-your-own (PYO). Roadside marketing was used by three-quarters of respondents to market their products and generated three quarters of the direct marketing sales surveyed.

Competition and labor related challenges are the top barriers to success in many direct marketing operators' minds. Identified competition includes supermarkets, international trades and other farm markets. Labor related challenges mentioned include lack of labor pool and hard-to-find seasonal help, difficulty in finding good labor and keeping qualified labor, and high costs of labor. Other top barriers were location, limited resources (capital, time and land), regulations, and marketing related issues (advertising, display, attracting new customers, etc.).

While the top opportunity identified by the respondents was definitely diversification and expansion, many farms have different plans on how they want to expand and diversify their retail businesses. The expansion plans include on-farm entertainment/agri-tourism, product lines/crop mix, greenhouse/ornamental plant sales, farmers' markets, value-added products, internet/mail order sales, diversification, longer season, and larger farm size and longer operating hours. Respondents also strive to provide 'farm fresh', high quality and fresh products, as well as good service. Expanding marketing is another important opportunity identified by respondents.

Direct marketing is an important source of income for New York vegetable farms with direct marketing activities. Many New York direct marketing farms are considering expansion; therefore, more attention to marketing and business management will be necessary to ensure future profitability and success.





# I. INTRODUCTION

Farmer-to-consumer direct marketing or farm retailing is an important outlet for many New York vegetable products. During the Depression of the 1930s, many farmers turned to roadside marketing (Bond, 1941). Favorable wholesale prices during and following World War II provided better alternatives, and interest in direct marketing to consumers declined. In the late 1950s, mechanization and other production technologies changed price and cost relationships, and the larger volumes required to market through traditional wholesale channels again encouraged renewed interest in direct marketing among many growers (How, 1980). This marketing channel experienced a resurgence of interest that began in the 1970s. Some contributing factors include depressed wholesale farm prices and consolidation in the produce industry in recent years. While some growers are striving for economies of scale in search of lower costs and higher efficiency to meet the needs of large buyers, many medium and small size farms have adopted direct marketing to consumers as an alternative to sustain business vitality, obtain higher prices, and maintain a competitive edge in the market. In addition, growing consumer interest in nutrition and food quality, combined with increased attention in the sustainable agriculture movement and local community development, further fueled consumer interest in direct purchasing from farmers.

A USDA study showed that pressing issues facing farmer-to-consumer direct marketers are uncertainty of cost and returns, availability of technical assistance, and the overall regulatory environment (Bills, *et al.* 2000). Marketing direct to consumers takes special skills and abilities on the part of marketers, and often requires a favorable location with respect to land resources and local markets. Since many farmers and direct marketing managers lack the resources and experience to compete with supermarkets, it is important for direct marketing operators to differentiate themselves from mass marketers. Cornell researchers conducted several studies in the 1970s to obtain information on the characteristics of direct marketing businesses in New York and the customers who patronize them (Stuhlmiller and How, 1978; Stuhlmiller, *et al.* 1976; and Eiler and Rosenfeld, 1973). While there are some recent studies on consumer preferences and shopping habits at farmers' direct marketing outlets, there is a need for information on effective market-

ing activities and their economic feasibility, targeting the needs of New York growers.

Direct marketing to consumers is an important marketing channel to New York vegetable farms. According to the 1997 Census of Agriculture (USDA, 1999), 55 percent of the 1,585 vegetable farms in New York conducted some direct marketing activities, and about \$13.2 million (or 5 percent) of total sales generated by these New York vegetable farms traced to direct marketing activities. However, the direct sales definition used by the Census of Agriculture is more narrowly defined than farmers' actual practices. The Census of Agriculture defined direct sales as sales of crops, livestock, poultry, or other products sold directly to consumers for their own consumption from roadside stands, farmers' markets, pick your own, door-to-door, etc. It only included sales of agricultural commodities sold directly for human consumption, such as vegetables, fruit, eggs, milk, cattle, chickens, hogs, turkeys, etc., and only commodities grown or raised on the farm. Nevertheless, in order to maintain their competitive edge in the market, many farmers with direct-to-consumer sales have adopted various marketing strategies to enhance the value of their products and services. They often also sell nonfood products, i.e. ornamental plants and gift items, and products purchased for resale, and receive income from services they provide. Therefore, the magnitude of vegetable farms' direct marketing activities is much greater than the census figures demonstrated. This study attempts to examine a comprehensive picture of retail practices used by vegetable farms in New York and the impacts of those practices on farm profitability.

Objectives of this study are to:

- Investigate the dynamics of farmer-to-consumer direct marketing activities on New York vegetable farms.
- Analyze the effectiveness of different marketing activities and strategies used by New York farmer-to-consumer direct marketing vegetable farms.
- Identify industry concerns and research questions for future study.

This report summarizes the results of a survey designed to collect information on farmer-to-

consumer marketing (retail) practices used by New York vegetable farms in 2000.

---

## II. STUDY APPROACH AND DEFINITIONS

Various definitions are used for farm direct marketing studies. Although it often stands for farmer-to-consumer direct sales – retail, sometimes it could also include direct sales to food services and other specific outlets – wholesale (NY Agricultural Statistics Service, 1988). This study only considers retail practices used by vegetable farms in New York and the impacts of those practices on farm profitability. Therefore, “direct marketing sales” in this study include sales generated by farms selling their products (food and nonfood) and services directly to individual consumers using various retail outlets. Direct sales to institutional customers, i.e. foodservice, are not included in this study. The products sold could encompass products grown or processed on the farm as well as products purchased for resale, and the services provided also included entertainment activities. This definition is different from the one used by the Census of Agriculture; therefore, it is very important to note that many results in this report cannot be directly compared with the figures of direct sales in the Census of Agriculture.

The direct marketing product and service categories included in this survey were:

- ◆ Fresh vegetables and melons
- ◆ Fresh fruits and berries
- ◆ Nursery and greenhouse crops (bedding and potted plants, flowers, trees, etc.)
- ◆ Holiday crops (pumpkins and Christmas trees)
- ◆ Meat products
- ◆ Milk and chess products
- ◆ Value-added/processing products
- ◆ Baked goods
- ◆ Ice cream
- ◆ Gifts and gardening accessories
- ◆ Entertainment activities
- ◆ Other products (i.e. maple syrup, honey, furniture, etc.)

The types of direct marketing retail outlets included in this survey were (see Box 1 for definition):

- ◆ Roadside markets
- ◆ Farmers’ markets
- ◆ Pick-your-own (PYO)
- ◆ Community supported agriculture (CSA)
- ◆ Catalogue and internet sales
- ◆ Other direct sales (i.e. direct order, craft show, etc.)

A mail survey was developed to collect information from New York vegetable farms on farm direct marketing practices, as defined above. The survey questionnaire is included in Appendix B. A random sample of 500 vegetable farms with direct marketing sales were identified from two sources – the New York State Farmer’s Direct Marketing Association list and the “New York State Guide to Farm Fresh Products” published by New York State Department of Agriculture and Markets. Therefore, only vegetable farms that reported direct marketing sales were selected to participate in the survey.

In November 2000, a draft of the questionnaire was pre-tested by four farms that were not in the sample list. The questionnaire was revised based on input from the growers. In January 2001, the final questionnaire, along with a cover letter explaining the purpose of this study, was mailed to the list of 500 direct marketing vegetable farms in New York State. A postcard reminder was mailed to the sample list six weeks after the first mailing. In total, 163 questionnaires (33 percent) were returned. For various reasons, some of these were unusable (i.e., incomplete, no longer in business, or had no vegetable production to report.) A total of 122 surveys were completed and included in this analysis.

Survey results were statistically tested to

examine possible relationships among farm characteristics, specifically, retail sales, retail locations and direct marketing practices. Retail locations of the surveyed vegetable farms were classified as being in urban or rural areas, based on the Census Bureau's definition of urbanized and rural areas. According to the Census Bureau, urbanized areas are places with populations of at least 50,000, and they usually consist of a central city and the surrounding area

that has close social and economic ties to the central city with a density of at least 1,000 people per square mile; and rural areas are everywhere that is not urban. Based on Census 2000 data, New York counties meeting the urban definition include Bronx, Erie, Kings, Monroe, Nassau, New York, Queens, Suffolk and Westchester. Therefore, surveyed respondents with retail locations in these counties are categorized as urban retail locations.

### **Box 1. Definition of Farmer-to-Consumer Direct Marketing Methods Used in This Study**

- **Roadside Market:** a temporary or permanent structure, located along a public road and used for selling farm products directly to consumers by an individual farm operation. A roadside market can vary from an open stand in front of the farm offering limited products to elaborate buildings equipped with refrigerated display cases, lighting, shopping carts, and multiple checkout systems, operating year-round.
- **Farmers' Market:** a building, structure, or place used by two or more agricultural producers for retailing farm products. Each marketer operates independently. Farmers' market facilities may range from an open lot where farmers park their vehicles and display products to enclosed buildings with display counters and other accommodations. The farmer usually pays a fee for the occupied space to cover maintenance and advertising.
- **Pick-Your-Own (PYO) Operation:** permits customers to come to the farm and harvest farm products directly from the field. These operations may also sell already harvested products from a roadside market in conjunction with the PYO operation. In such a case, the farm is considered using more than one direct marketing method.
- **Community-Supported-Agriculture (CSA) Operation:** requires customers to subscribe or purchase membership, where people buy "shares" at the beginning of the production season in exchange for a season's worth of products produced on the farm.
- **Catalog and Internet Sales:** does not involve a physical retail facility. Farm products are marketed to customers by catalogs or over the internet, and sales are conducted via phone, mail or internet. Products are generally delivered to customers' homes.
- **Other Methods:** includes direct custom orders, fairs, craft shows and clubs.

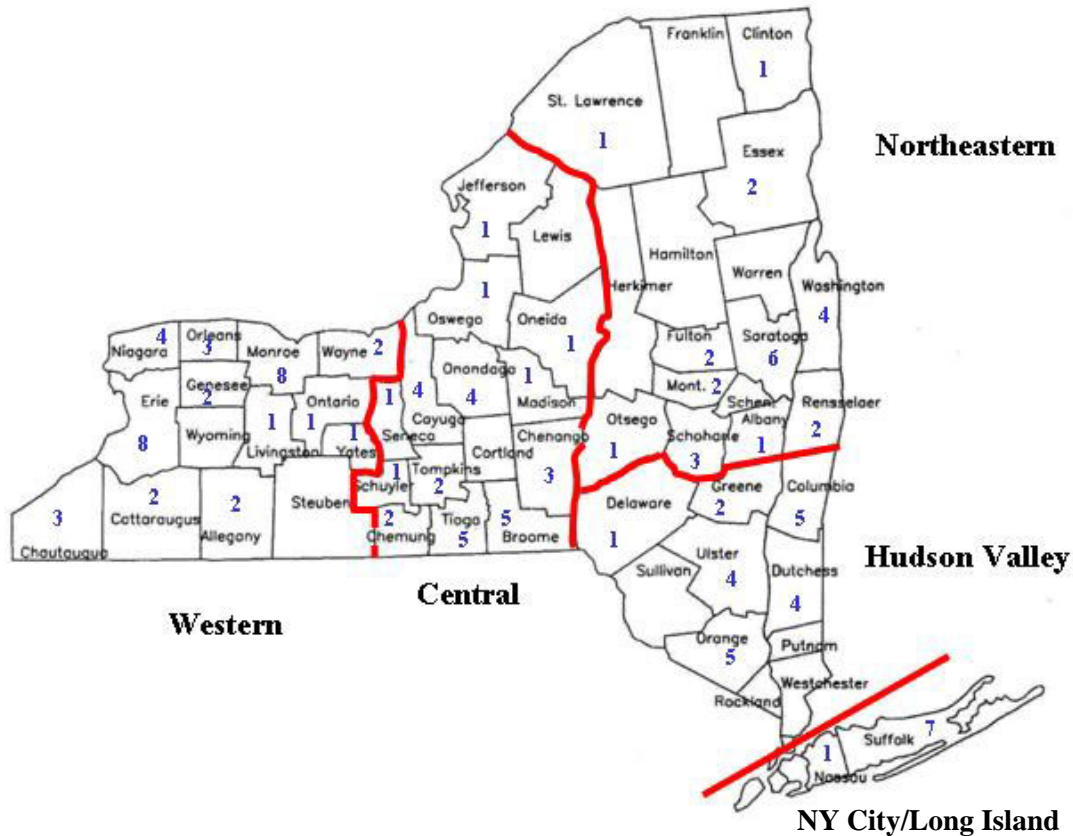
### III. RESULTS

The survey respondents were spatially distributed throughout New York State. As shown in Figure III-1, direct marketing vegetable farms from 44 of the 62 counties in New York are represented in this survey, and the responses were distributed across the four regions of the state as follows:

- ◆ Western NY 37 responses
- ◆ Central NY 31 responses
- ◆ Northeastern NY 25 responses
- ◆ Hudson Valley 21 responses
- ◆ New York City and Long Island 8 responses

Table III-1 shows that the surveyed respondents' retail sales pattern is similar to the surveys of fruit and vegetable direct marketing farms in Pennsylvania (Pennsylvania Dept. of Agriculture, 1997) and direct marketing operations in New Jersey (Nayga *et al.*, 1995). A chi-square goodness-of-fit test showed that the three direct marketer profiles are not statistically different (DF = 10, P-value = 0.438).

**Figure III-1. Distribution of Survey Respondents from New York Counties**



**Table III-1. Direct Marketer Profile Classified by Retail Sales, NY (2000), PA (1996) and NJ (1992)\***

<i>Survey respondents by retail sales</i>	<i>NY (N = 122)</i>	<i>PA (N = 406)</i>	<i>NJ (N = 409)</i>
	<i>% of survey respondents</i>		
Under \$10,000	24	28	31
\$10,000-24,999	20	19	14
\$25,000-49,999	13	17	12
\$50,000-99,999	14	14	10
\$100,000-249,999	20	13	15
\$250,000 and over	9	9	18
<b>All Farms</b>	<b>100</b>	<b>100</b>	<b>100</b>

\* A chi-square goodness-of-fit test showed that the NY, PA, NJ direct marketer profiles are not statistically different (DF = 10, P-value = 0.438).  
Sources: Pennsylvania Dept. of Agriculture (1997) and Nayga *et al.* (1995).

### Surveyed Respondent Profile

The 122 direct marketing vegetable farms surveyed had an overall average of \$123,612 in direct retail sales in 2000; however, one-half had less than \$30,000 (median) in retail sales. About a quarter (24 percent) of respondents had annual retail sales of less than \$10,000, and 20 percent ranged from \$10,000-24,999 and \$100,000-249,999 in annual retail sales (Table III-2).

Thirty-one percent of farms in this study had retail locations in urban areas (as defined in the previous section), and 69 percent of surveyed farms had retail locations in rural areas only. It should be noted that some surveyed farms had more than one retail location, and they could have both urban and rural retail locations.

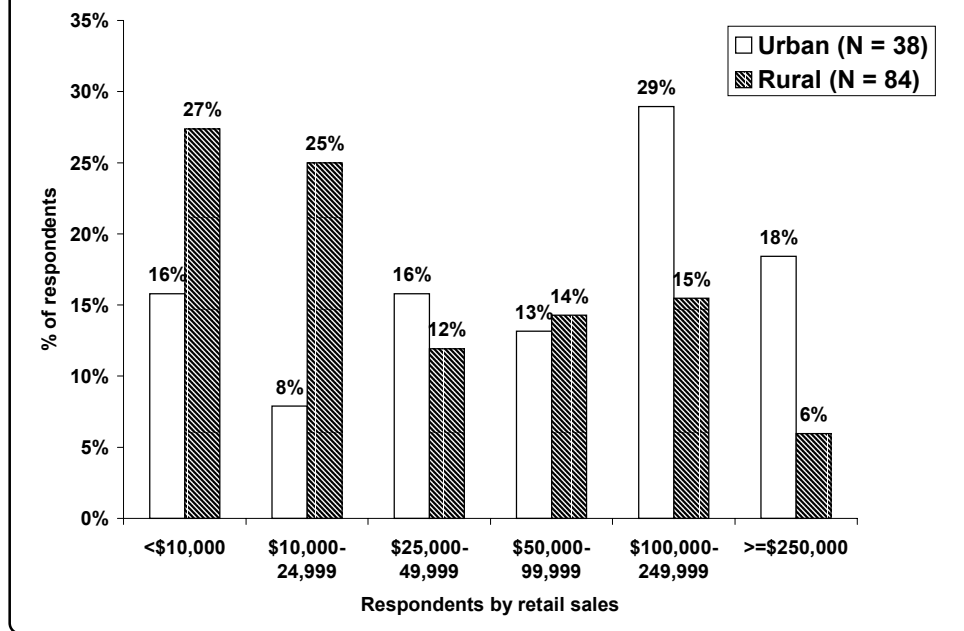
Direct marketing vegetable farms with urban retail locations were more likely to have higher

**Table III-2. Descriptive Statistics of the Surveyed Direct Marketing Vegetable Farms' Direct Marketing (Retail) Sales, by Size of Retail Sales<sup>a</sup>**

<i>Respondents by retail sales</i>	<i>% of Farms (%)</i>	<i>Average retail sales</i>	<i>Median</i>	<i>Min.</i>	<i>Max.</i>	<i>Standard deviation</i>
				----- (\$) -----		
Under \$10,000 (N=29)	24	4,944	5,000	850	9,800	2,783
\$10,000-24,999 (N=24)	20	15,587	15,000	10,000	24,000	4,868
\$25,000-49,999 (N=16)	13	32,660	30,000	25,000	45,500	6,888
\$50,000-99,999 (N=17)	14	70,147	65,500	50,000	92,000	13,354
\$100,000-249,999 (N=24)	20	158,413	145,000	100,000	240,000	44,594
\$250,000 and over (N=12)	9	781,010	650,000	325,000	1,641,612	143,065
<b>All Farms (N=122)</b>	<b>100</b>	<b>123,196</b>	<b>30,000</b>	<b>850</b>	<b>1,641,612</b>	<b>262,332</b>

<sup>a</sup> "Direct marketing (or retail) sales" refers to farms selling their products and services directly to individual consumers using various retail outlets. The products sold could include food and non-food items and encompass products grown or processed on the farm as well as products purchased for resale.

**Figure III-2. Distribution of Respondents by Retail Sales: Urban vs. Rural Retail Locations**



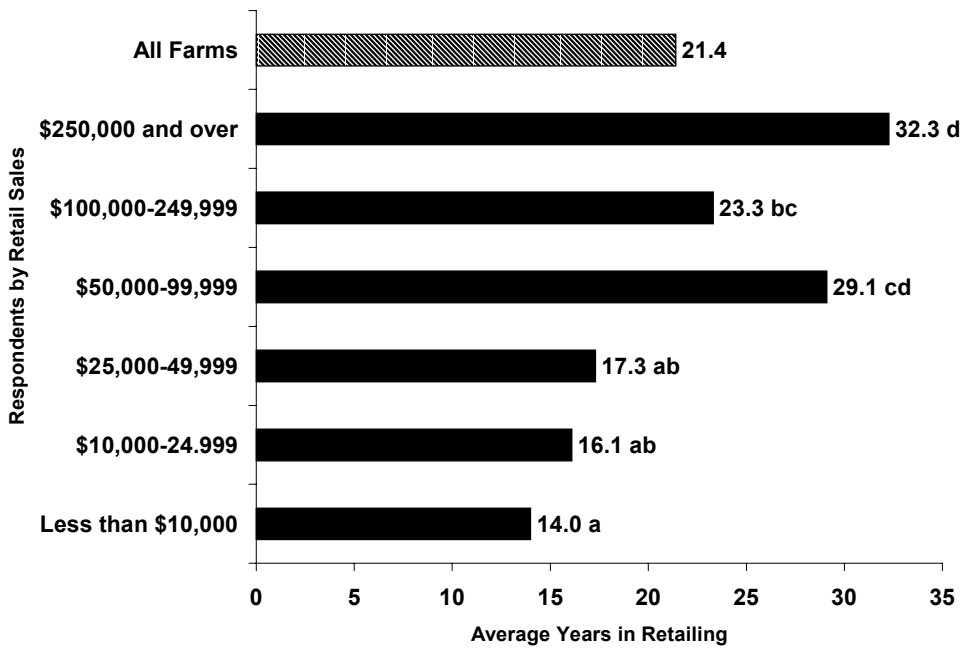
retail sales than direct marketers with only rural retail locations. The surveyed farms with retail locations in urban areas had average annual retail sales of \$248,523, of which 50 percent had \$105,000 (median) or more in retail sales, and farms with retail locations only in rural areas had average annual retail sales of \$69,703, and a median of \$21,900. Figure III-2 shows that more than half (52 percent) of respondents with only rural retail locations had less than \$25,000 in retail sales in 2000, whereas, only 24 percent of respondents using urban retail locations fell into that category. By contrast, while only 21 percent of respondents with rural retail locations generated more than \$100,000 in retail sales in 2000, almost half of the respondents (47 percent) with urban retail locations were in that sales category.

The surveyed farms had an average of 21.4 years of direct marketing experience. Thirty-seven percent of respondents had less than ten years of retailing experience, 22 percent had 11 to 20 years, 27 percent had 21 to 40 years, and 14 percent had more than 40 years of retailing experience. Farms with

higher retail sales had longer average direct marketing histories, except for businesses with \$50,000-99,999 annual retail sales (Figure III-3).

The majority of surveyed direct marketing vegetable farms produced additional products other than vegetables. Among the surveyed vegetable farms, 46 percent also produced fruits and berries, 45 percent also produced ornamental plants, and 17 percent of the businesses also produced other products, including Christmas trees, field crops, maple syrup, animal products, mushrooms, and honey. The direct marketing vegetable farms are equally likely to combine fruit or ornamental crops into their production. Twenty-eight percent of the respondents grew only vegetable crops in 2000, 26 percent grew vegetable and fruit crops, 26 percent grew vegetable and ornamental crops, and 20 percent grew all three major types of crops. Larger farms are more likely to diversify and grow a larger acreage of multiple types of crops for sale. In Appendix A, Tables V-1 and V-2 show the acreage and combination of crops (fruits, vegetables and ornamental plants) produced by different sized operations.

**Figure III-3. Years Involved in Direct Marketing, by Retail Sales\***



\*Average number of retailing years identified by different letters are significantly different from each other. Means are separated by LSD multiple comparison analysis ( $\alpha=0.05$ ).

### *The Role of Direct Market Sales to Farm Income*

For a majority of the surveyed direct marketing vegetable farms, direct marketing to consumers was an important source of farm income. Of the farms surveyed, the average total annual gross farm sales were \$274,311 in 2000 (Table III-3). Forty-five percent of total 2000 surveyed farm sales were from direct sales to consumers; however, large vegetable operations were less dependent on direct marketing sales for their farm income. The other marketing channels used by the surveyed farms will be discussed in the next section.

For 44 percent of the respondents, retail sales accounted for more than 90 percent of their total farm sales, compared with 7 percent of the respondents who attributed less than 10 percent of farm sales to retail. Figure III-4 shows that 69 percent of the respondents received more than half of their farm's gross sales from direct marketing to consumers. Retailing in urban or rural locations did not

affect the degree of reliance on retail sales to generate farm income.

### *Marketing Channels Used by Vegetable Farms with Direct Marketing Activities*

Although direct marketing was an important source of income, direct marketing vegetable farms generally did not depend on retail alone. Five marketing channels were identified in this survey:

- ◆ Wholesale to supermarkets
- ◆ Wholesale to other farm markets
- ◆ Wholesale to foodservice outlets
- ◆ Wholesale through other wholesale outlets (wholesalers, brokers, processors, auction, etc.)
- ◆ Direct marketing to consumers

The surveyed respondents used an average of 2.3 marketing channels to sell their products. The channel most commonly utilized by respondents to

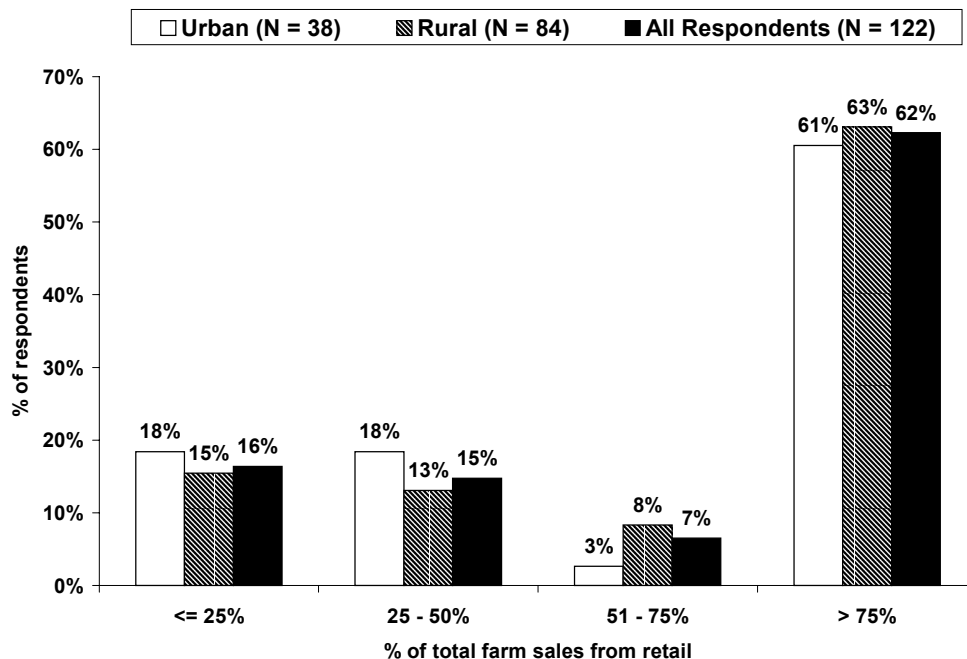


**Table III-3. Comparison of Annual Total Farm Gross Sales and Direct Marketing (Retail) Sales, by Total Farm Sales**

Respondents by total farm sales	% of farms	Average total gross sales	Average retail sales	% of retail contribution to total farm sales
	%	--- \$/year ---		\$
Under \$10,000 (N=25)	20	5,225	5,010	96
\$10,000-49,999 (N=32)	26	23,037	18,255	79
\$50,000-99,999 (N=11)	9	76,551	56,700	74
\$100,000-249,999 (N=25)	21	154,057	97,521	63
\$250,000-499,999 (N=7)	6	352,540	162,429	46
\$500,000-749,999 (N=7)	6	602,998	253,171	42
\$750,000-999,999 (N=4)	3	855,107	385,833	45
Over \$1,000,000 (N=11)	9	1,587,657	607,601	38
<b>All Farms (N=122)</b>	<b>100</b>	<b>274,311</b>	<b>123,612</b>	<b>45</b>

<sup>a</sup> "Direct marketing (or retail) sales" refers to farms selling their products and services directly to individual consumers using various retail outlets. The products sold could include food and nonfood items and encompass products grown or processed on the farm as well as products purchased for resale.

**Figure III-4. Percentage of Total Annual Farm Sales from Direct Marketing (Retail) Sales: Urban vs. Rural Retail Locations**



wholesale their products was 'wholesale to other farm markets' (48 percent), while the wholesale channel utilized the least by respondents was 'foodservice outlets' (only 22 percent). Among wholesale outlets, sales to 'other wholesale outlets' generated the highest sales volume. Although only 29 percent of the respondents wholesaled through 'other wholesale outlets', 29 percent of total surveyed farm sales were generated from this wholesale channel, compared with 14 percent from 'wholesale to other farm markets' reported by 48 percent of respondents (Table III-4).

farms is presented in Table V-3 in Appendix A.

### Direct Marketing Seasonality

New York vegetable farms with direct marketing activities generally only retail seasonally. About one quarter (24 percent) of respondents retailed less than 4 months of the year, 55 percent retailed between 5 to 8 months, and the remaining 21 percent retailed 9-12 months. Only 8 percent of the surveyed farms retailed all-year-round.

**Table III-4. Marketing Channels Used by NY Direct Marketing Vegetable Farms**

<i>Marketing channel</i>	<i>% of respondents</i>	<i>% of total surveyed farm sales from this channel</i>
Wholesale to supermarkets	36	8.3
Wholesale to other farm markets	48	13.7
Wholesale to foodservice outlets	22	4.1
Wholesale to other wholesale outlets <sup>a</sup>	29	29.1
Direct retail to consumers <sup>b</sup>	100	44.8

<sup>a</sup> Other wholesale outlets include wholesalers, brokers, processors, auction, etc.

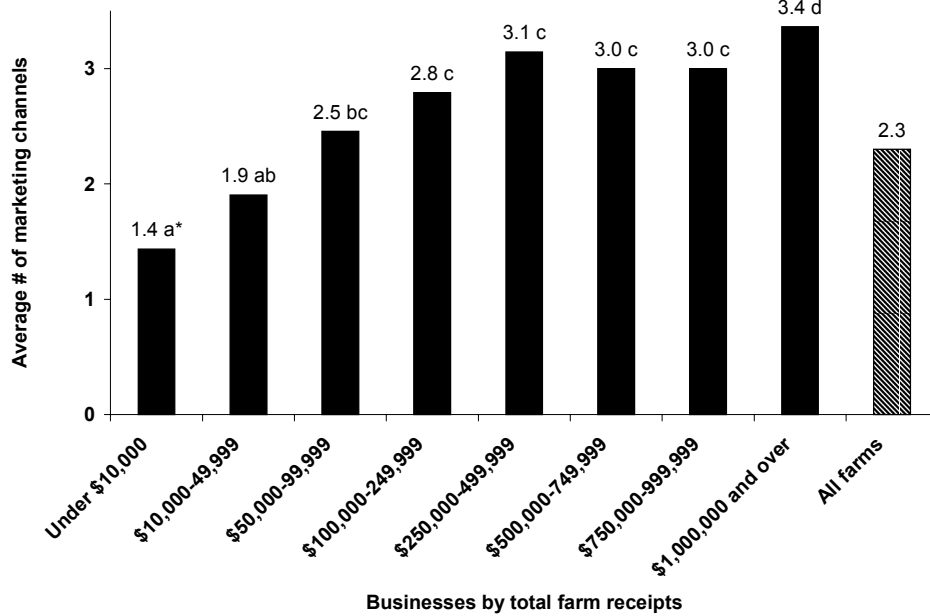
<sup>b</sup> "Direct marketing (or retail) sales" refers to farms selling their products and services directly to individual consumers using various retail outlets. The products sold could include food and nonfood items and encompass products grown or processed on the farm as well as products purchased for resale.

Farms with higher gross sales depend less on retail for income (Table III-4). Figure III-5 shows that large farms also tend to utilize more marketing channels. However, the average number of marketing channels used by farms with total gross sales between \$100,000 to 999,999 are not statistically different. As farm size increases, although most farms still wholesaled to other farm markets, sales to supermarkets and other wholesale outlets became more important to farm income. Small to medium size farms – farms with total gross sales of less than \$500,000 – tend to focus on a combination of two to three outlets to wholesale their products. Large farm operations – farms with total gross sales of more than \$500,000 – tend to concentrate a majority of their wholesale efforts on one type of wholesale outlet (often on other wholesale outlets) and supplement it by additional wholesale outlets (supermarkets and other farm markets). Detailed information comparing marketing outlets used by different size

The average number of months of retailing was 6.4 months in 2000. Operations with urban retail locations had a statistically longer direct marketing season (an average of 7.2 months) than operations with only rural retail locations (an average of 6 months). As seen in Figure III-6, operations with higher retail sales generally had a longer direct marketing season. This observation also applied to respondents within the urban and rural groups.

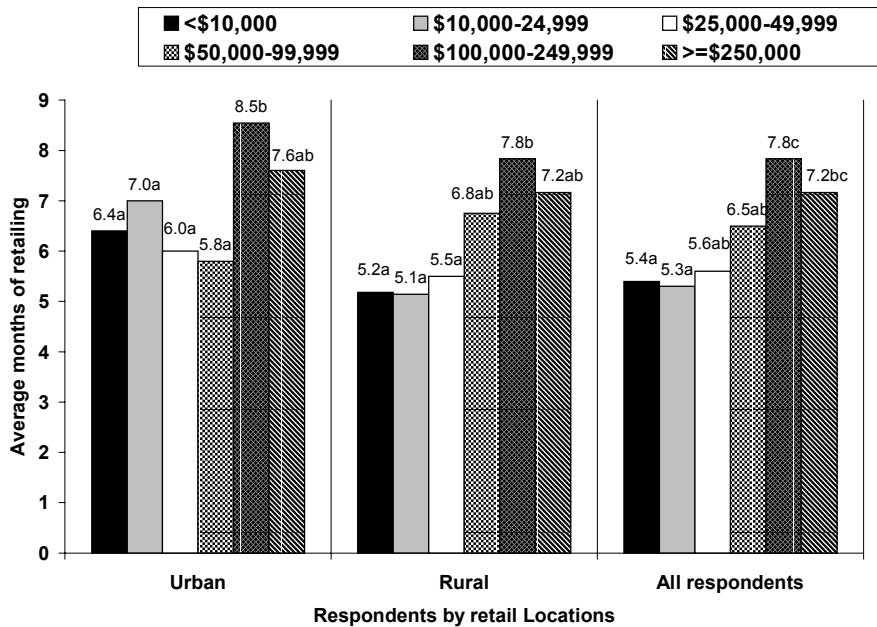
Figure III-7 shows that May through October is the most important sales season for farmer-to-consumer direct marketing activities. More than 80 percent of the total retail sales from the surveyed vegetable farms was generated during these six months. Fall sales were very important for New York direct marketers. October sales accounted for 17 percent of retail sales generated by surveyed farms in 2000, followed by May (16 percent). While the seasonal pattern is similar for operations with

**Figure III-5. Average Number of Marketing Channels Used by Survey Respondents**



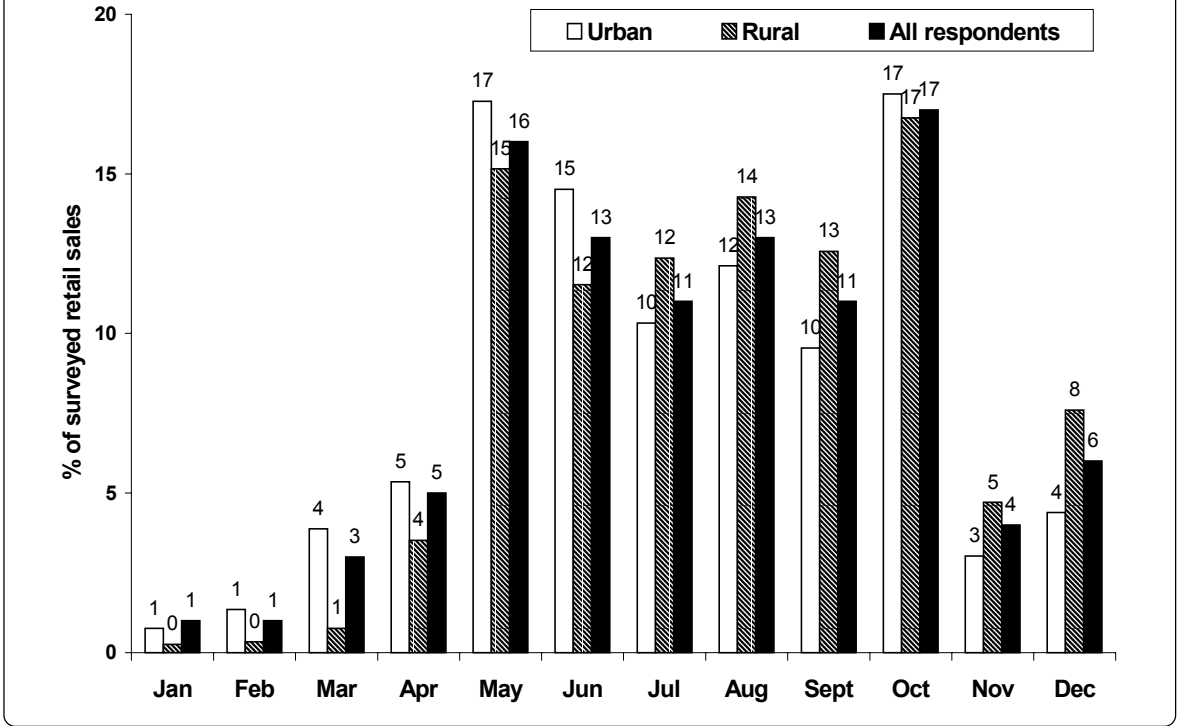
\*Average number of months of operation identified by different letters are significantly different from each other within each location category. Means are separated by LSD multiple comparison analysis ( $\alpha=0.05$ ).

**Figure III-6. Average Months of Retail Operation by Retail Sales: Urban vs. Rural Retail Locations**



\*Average number of months of operation identified by different letters are significantly different from each other within each location category. Means are separated by LSD multiple comparison analysis ( $\alpha=0.05$ ).

**Figure III-7. Sales Generated in Each Month as Percentage of Total Surveyed Retail Sales: Urban vs. Rural Retail Locations**



urban and rural retail locations, respondents with urban retail locations had earlier and stronger spring sales than respondents with only rural retail locations.

Businesses generally had 15 to 20 percent of their retail sales generated in each month between May and October. The average monthly retail sales for all respondents was the highest in May (\$38,055), followed by October (\$26,785). However, medium and large direct marketing farms (groups with \$25,000 or more retail sales) had their highest average monthly sales value in October. Moreover, more farms in this survey retailed in October than in May, regardless of size and location. Table V-4 in Appendix A shows the percentage of farms retailing in each month by retail sales and locations.

December is a month with high sales potential. Although only 6 percent of the total surveyed retail sales was generated in December, the 41 percent of businesses who retailed in December in 2000 generated an average of 14 percent of their retail sales in this month. While Table V-4 in Appendix A

shows farms with urban retail locations are more likely to retail in December, December presents a marketing opportunity for farms with only rural retail locations as well. Fifty-four percent of respondents with urban retail locations operated in December and generated 4 percent of this group’s total retail sales in this month. By contrast, 35 percent of farms with only rural retail locations operated in December, and their December sales accounted for 6 percent of total retail sales of this group.

Direct marketers tend to expand their season to November and December, not January and February. Few respondents operated their retail outlets in January (14 percent) and February (15 percent). For those who operated in these two months, they only generated an average of 4 and 5 percent of their retail sales in each of these two months. Smaller direct marketing farms (under \$50,000 retail sales) with only rural retail locations are more likely than their urban counterparts to operate in January and February. However, the situation is reversed for larger direct marketing farms (\$100,000 or more retail sales) in this survey.

## Direct Marketing Methods

New York direct marketing farms usually used multiple methods to retail their products. Direct marketing methods identified in this study include roadside markets, farmers' markets, pick-your-own (PYO), community supported agriculture (CSA), catalog sales, internet sales, and others – direct order, custom sales, fairs, and shows, etc. Among these, the surveyed farms used an average of 1.7 methods to retail their products. The number of methods utilized by different size direct marketing operations was not statistically different.

The three most commonly used methods were roadside markets, farmers' markets and PYO. Roadside markets were used by 77 percent of the respondents and generated 77 percent of the total surveyed retail sales. However, 40 percent of the respondents retailed at farmers' markets but generated only 8 percent of the total surveyed retail sales, and 38 percent retailed through PYO but generated only 9 percent of the total surveyed retail sales (Figure III-8). Table III-5 shows that roadside markets, PYO and farmers' markets had the highest average annual sales of \$123,787, \$27,717 and \$25,528, respectively. Larger retail operations had higher average sales for all marketing methods except for CSA.

Table V-5 in Appendix A presents direct marketing methods used by different size retail farms. Medium and large direct marketing veg-

etable farms (more than \$50,000 retail sales) depend mostly on roadside markets for retail revenue. For smaller retail farms (less than \$50,000 retail sales), farmers' markets are more important for retail income. By contrast, none of the respondents with more than \$500,000 in retail sales operated in farmers' markets. As seen in Table III-6, respondents who retailed in farmers' markets sell at farmers' markets an average of 2.3 times a week and generated an average of \$390 per farmers' market visit. Larger businesses (\$100,000-249,999 and \$250,000-499,999 retail sales) generated more than double the sales per farmers' market visit compared with smaller businesses. This could be because larger businesses sold more days at farmers' markets per week and had a more diversified product mix to expand sales and season. PYO is important to the retail revenue for small and medium farms (less than \$100,000 retail sales); however, larger size retail farms (\$100,000 and over retail sales) also often use PYO in conjunction with their roadside market operations. CSA was utilized more by smaller retail operations.

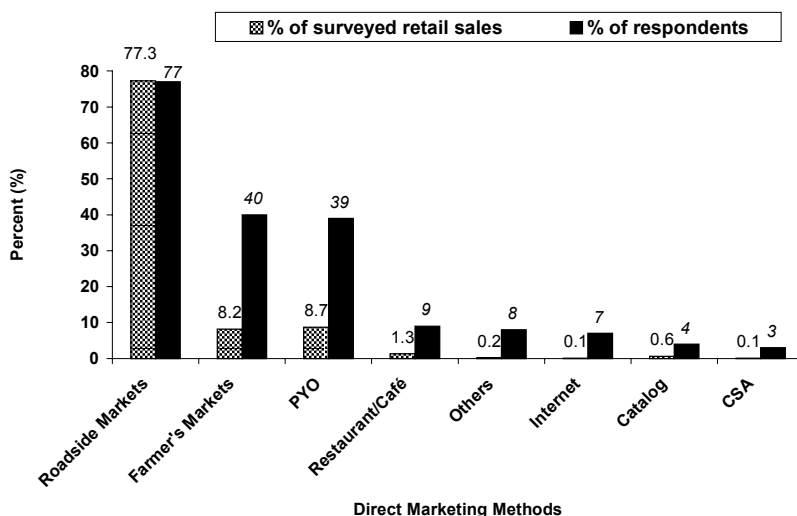
## Direct Marketing Product Enterprises

The direct marketing product enterprises included in this survey are fresh vegetables, fresh fruits, pumpkins, Christmas trees, processed products, gift and garden accessories, baked goods, ice cream, meat products, milk and cheese products, and other products (i.e. maple syrup, mushrooms, entertainment activities, furniture, wool, etc.). In addition to analyzing the tangible product lines, we also investigate the intangible and service aspects of direct marketing enterprises – entertainment activities, organic product offerings, and restaurant/café/deli.

### • Product Mix

Fresh vegetables, ornamental plants and fresh fruits were the top three items retailed by the surveyed farms. About 30 percent of total surveyed retail revenue was from sale of fresh vegetable products by 96

**Figure III-8. Direct Marketing Methods Used by Respondents and Percentage**



**Table III-5. Average Annual Direct Marketing (Retail) Sales for Different Direct Marketing Methods, by Retail Sales<sup>a</sup>**

Respondents by retail sales	Direct marketing methods						CSA	Others <sup>b</sup>
	Roadside markets	Farmers' markets	PYO	Catalog sales	Internet sales			
			----- \$ -----					
Less than \$10,000	3,456	3,222	3,382	750	475	600	1,300	
\$10,000-24,999	11,856	12,050	13,500	1,000	500	9,800	N/A	
\$25,000-49,999	21,483	20,980	11,067	N/A	200	1,000	N/A	
\$50,000-99,999	47,719	18,500	23,375	N/A	N/A	N/A	3,000	
\$100,000-249,999	125,625	74,333	25,250	33,500	2,333	2,000	10,000	
\$250,000 and over	672,909	80,000	81,436	12,000	3,000	N/A	N/A	
<b>Total</b>	<b>123,787</b>	<b>25,528</b>	<b>27,717</b>	<b>16,150</b>	<b>1,456</b>	<b>3,350</b>	<b>2,456</b>	

<sup>a</sup>“Direct marketing (or retail) sales” refers to farms selling their products and services directly to individual consumers using various retail outlets. The products sold could include food and nonfood items and encompass products grown or processed on the farm as well as products purchased for resale.

<sup>b</sup> Others include direct order and custom sales.

percent of the respondents. Fifty-one percent of the respondents marketed ornamental plants directly to consumers and accounted for 25 percent of total surveyed retail sales, and 65 percent of the respondents marketed fresh fruits, accounting for 17 percent of the total surveyed retail sales (Table III-7). Based on the product lines identified in Table III-6, the surveyed farms had an average of 4.8 product lines.

Although not statistically different, respondents with urban retail locations had a slightly higher number of product lines (5.4) than respondents with only rural retail locations (4.6). Figure III-9 demonstrates that larger operations had a broader product mix, and increasing product lines is crucial as farms expand their direct marketing operations in rural locations. Larger direct marketing

**Table III-6. Frequency of Selling at Farmers' Markets and Sales, by Retail Sales**

Respondents by retail sales	Avg. sales per day <sup>a</sup>	Avg. selling days per week	Avg. months of selling at farmers' markets
	\$	# of days	months
Under \$10,000 (N=29)	110	1.7	5.3
\$10,000-24,999 (N=24)	381	1.8	5.0
\$25,000-49,999 (N=16)	370	2.7	5.1
\$50,000-99,999 (N=17)	259	3.2	5.8
\$100,000-249,999 (N=24)	878	2.8	6.9
\$250,000 and over (N=12)	1,111	3.0	6.0
<b>Total (N=122)</b>	<b>390</b>	<b>2.3</b>	<b>5.6</b>

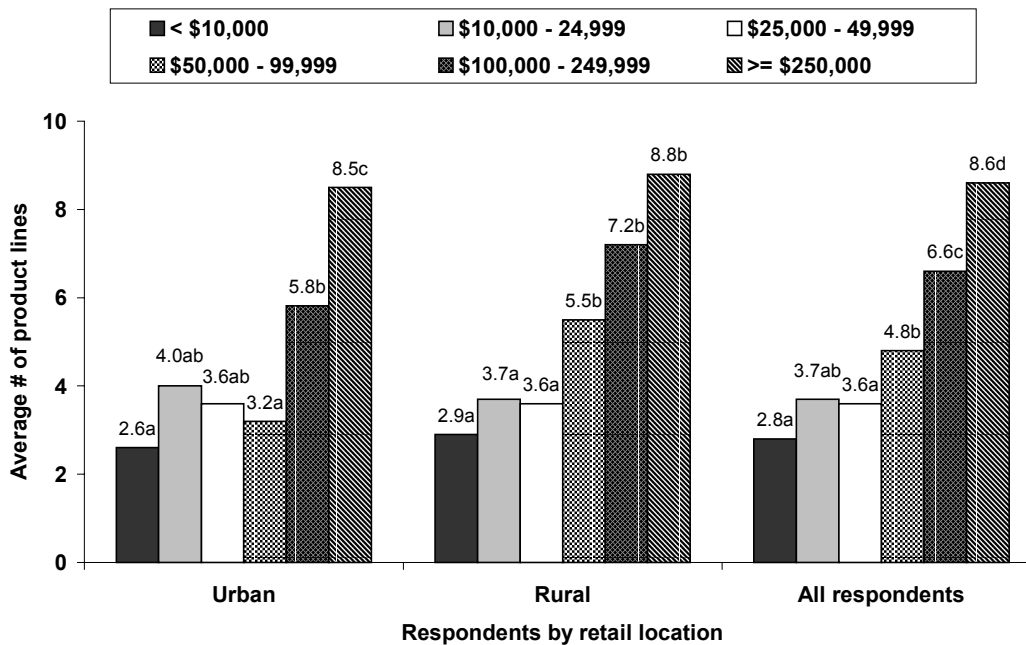
<sup>a</sup> Includes sales from marketing products and services directly to individual consumers. The products sold could include food and nonfood items and encompass products grown or processed on the farm as well as products purchased for resale.

**Table III-7. Percentage of Sales and Businesses by Product Line**

Product	% of Respondents	% of Total Surveyed Retail Sales
Fresh vegetables	96	29.7
Ornamentals	51	24.6
Fresh fruits	65	16.6
Pumpkins	59	6.7
Christmas trees	29	4.7
Processed products	44	4.3
Gifts and accessories	18	3.8
Entertainment activities	38	3.4
Baked goods	31	2.8
Other products <sup>a</sup>	11	1.2
Ice cream	5	0.9
Meat products	21	0.4
Milk and cheese products	11	0.3

<sup>a</sup> Others include maple syrup, mushrooms, entertainment activities, furniture, and wool.

**Figure III-9. Average Number of Product Lines by Retail Sales: Urban vs. Rural Retail Locations**



\* Average number of product lines identified by different letters are significantly different from each other within category. Means are separated by LSD multiple comparison analysis ( $\alpha=0.05$ ).

**Table III-8. Items Purchased for Resale by Product: Urban vs. Rural Retail Locations**

	<i>Respondents by retail locations</i>					
	<i>Urban</i>		<i>Rural</i>		<i>All respondents</i>	
	<i>Propensity of respondents to purchase this product for resale<sup>a</sup></i>	<i>Avg. % of sales generated from items purchased for resale<sup>b</sup></i>	<i>Propensity of respondents to purchase this product for resale<sup>a</sup></i>	<i>Avg. % of sales generated from items purchased for resale<sup>b</sup></i>	<i>Propensity of respondents to purchase this product for resale<sup>a</sup></i>	<i>Avg. % of sales generated from items purchased for resale<sup>b</sup></i>
	----- % -----		----- % -----		----- % -----	
Fresh vegetables	45	14	36	16	39	16
Ornamentals	60	26	60	25	60	25
Fresh fruits	61	41	52	26	53	31
Pumpkins	39	17	37	19	37	18
Christmas trees	92	85	62	49	74	63
Processed products	88	83	72	53	75	62
Gifts and accessories	100	100	93	66	95	77
Baked goods	35	59	62	44	55	50
Ice cream	100	100	80	61	83	68
Other <sup>c</sup>	75	63	50	30	55	44
Meat products	86	72	41	35	58	46
Milk and cheese	100	100	90	70	92	77

<sup>a</sup> The propensity of respondents to purchase this product for resale for each product line was calculated by respondents purchased items of a product line for resale as a percentage of respondents direct marketing that product line to consumers.  
<sup>b</sup> Averages were calculated by averaging the percentage of sales generated from items purchased for resale for each farm and not weighted based on size of businesses.  
<sup>c</sup> Other includes maple syrup, mushrooms, entertainment activities, furniture, and wool.

farms with only rural retail locations (\$50,000 or more retail sales) had higher average numbers of product lines than their counterparts with urban retail locations. Table V-6 in Appendix A shows the percentage of farms involved in each product line and the average sales from each product line for different sizes of direct marketing operations.

• **Items Purchased for Resale**

The surveyed farms retailed more items than those they produced. They purchased items for resale to expand the product line, increase variety, and supplement the volume of products for retail. Table III-8 illustrates that the surveyed farms were least likely to purchase fresh vegetables and pumpkins for resale. Among farms that retailed fresh vegetables (60 percent of surveyed respondents), 39 per-

cent also purchased fresh vegetables for resale, and they purchased an average of 16 percent of their fresh vegetables for resale. Only 35 percent of farms that retailed pumpkins purchased pumpkins to resell, and an average of 18 percent of their pumpkin sales were from items bought for resale. On the other hand, more than 50 percent of farms that retailed all other product lines identified in this study purchased some items in those product lines to resell. Over 90 percent of farms that retailed milk and cheese products and gift and accessory items purchased more than three-quarters of their products (77 percent) to resell.

For all product lines except baked goods, respondents with urban retail locations are more likely to purchase items for resale than farms with only rural retail locations. Larger farms are more likely to purchase more items for resale. Appendix



A Table V-5 summarizes the pattern of purchasing items for resale by product line for different size direct marketing operations.

- **Entertainment Activities**

More than one-third (38 percent) of the respondents offered on-farm entertainment activities, such as farm tours, hay rides, petting zoos, seasonal festivals, events, and parties, and generated 3.4 percent of total surveyed direct marketing sales. Nonetheless, half of the farms offering entertainment activities offered them for free. Farms with urban and rural retail locations had similar marketing patterns (Figure III-10). The surveyed farms had average sales of \$11,236 from entertainment activities in 2000. Although not statistically different, farms with urban retail locations had higher average sales from entertainment activities (\$15,389) than farms with only rural retail locations (\$9,494). The surveyed farms offered an average of three months of entertainment activities in 2000, most commonly in September and October.

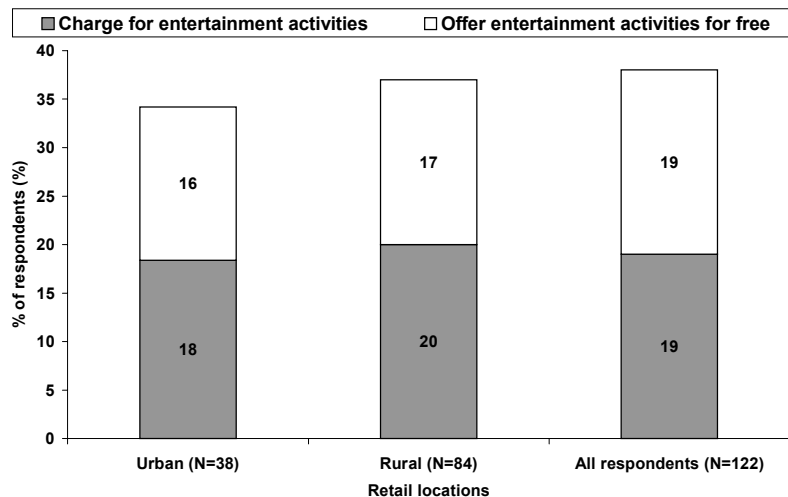
Table V-8 in Appendix A summarizes the on-farm entertainment activities offered by different size direct marketing vegetable farms. Larger farms were more likely to offer entertainment activities and charge for them. Seventy-five percent of farms

with \$250,000 or more retail sales offered entertainment activities. Although one-quarter of these farms did not charge for patronage of these activities, their average revenue from entertainment activities exceeded \$31,000 (\$31,652) in 2000. By contrast, almost of half (46 percent) of farms with annual retail sales between \$10,000-24,999 offered entertainment activities, but only 27 percent of them charged for their offerings and had an average revenue from entertainment activities of \$155 in 2000, the lowest among all direct marketing groups. The surveyed farms generally offered entertainment activities in two to three months, except for farms with \$250,000 or more retail sales which offered an average of 4.2 months of entertainment activities.

- **Organic Product Offerings**

Twenty-two percent of the surveyed direct marketing vegetable farms offered organic products to their retail customers with an average of four years' organic product direct marketing experience (Table III-9). Smaller retail operations were more likely to be involved in retailing organic products and had longer experience with organic product marketing. None of the surveyed respondents in the largest retail operation category (more than \$250,000 retail sales) was involved in marketing organic products. Retail location did not affect the marketing pattern.

**Figure III-10. Incidence of On-Farm Entertainment Activities and Charges: Urban vs. Rural Retail Locations**



- **Restaurant/Café/Deli**

Only 9 percent of the surveyed farms operated a restaurant, café or deli in 2000. They operated an average of 4.3 months in 2000 and had average annual sales of \$18,900. The average revenue from restaurant, café and deli operations is not significantly different between farms with urban retail locations (\$21,000) and farms with only rural retail locations (\$18,000). Nonetheless, farms with urban retail locations had a shorter operating season – an average of 2.3 months in 2000, mostly in the fall – compared with 5.1 months for farms with only rural retail locations. Large retail

**Table III-9. Organic Product Marketing by Retail Sales**

<i>Respondents by retail sales</i>	<i>% of respondents</i>	<i>Average years involved in retailing organic products</i>
	<b>%</b>	<b>years</b>
Under \$10,000 (N=29)	43	4.2
\$10,000-24,999 (N=24)	26	6.5
\$25,000-49,999 (N=16)	19	4.5
\$50,000-99,999 (N=17)	12	3.5
\$100,000-249,999 (N=24)	22	1.5
\$250,000 and over (N=12)	0	0.0
<b>Total (N=122)</b>	<b>22</b>	<b>4.0</b>

operations are more likely to operate a restaurant, café or deli and had higher average sales (Figure III-11).

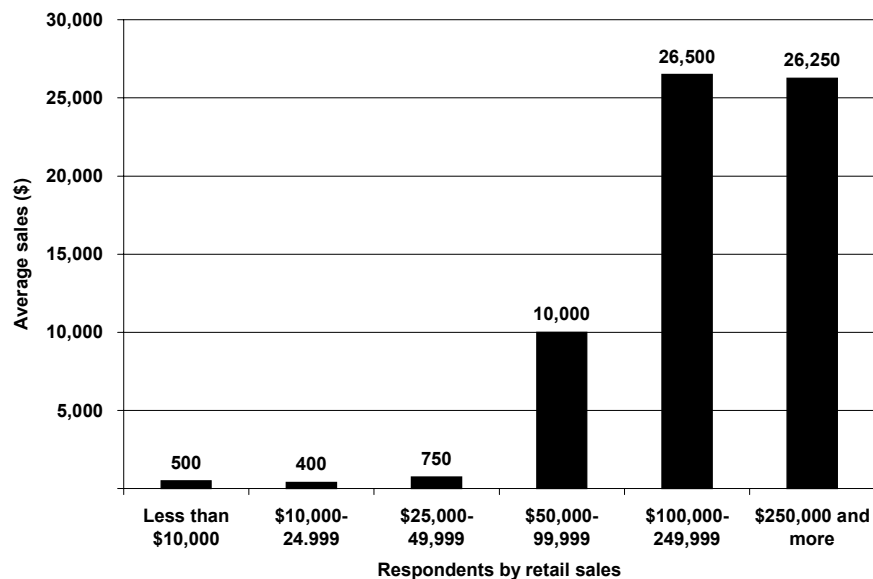
**Future Plans**

The surveyed New York direct marketing vegetable farms were asked to identify changes they foresee for different direct marketing components in their operation in the next five years. Figure III-12 shows that most of the respondents were planning to expand one or more direct marketing components.

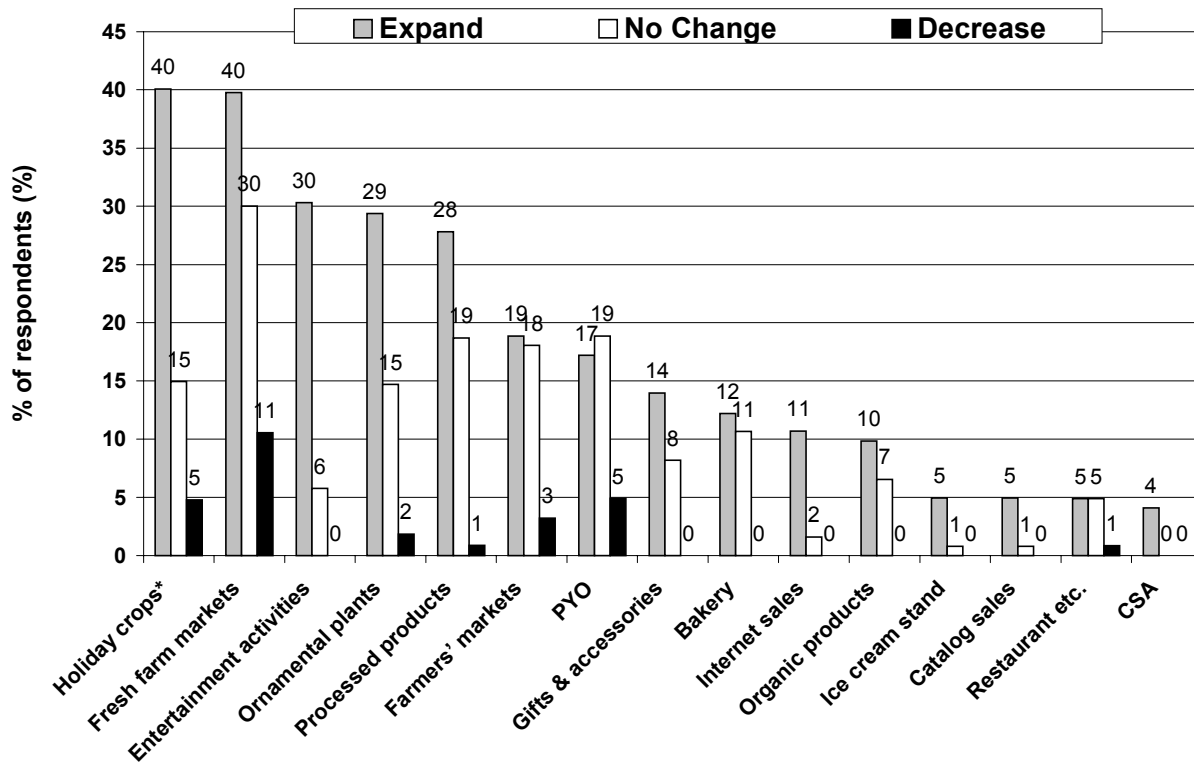
The components identified by most respondents for future expansion are holiday crops (pumpkins and Christmas trees) and fresh farm markets (40 percent), followed by entertainment activities (30 percent), ornamental plants (29 percent), and processed products (28 percent). Some potential growth trends to watch for include CSA, internet sales, ice cream stands and catalog sales. Although only relatively few respondents foresaw changes in these direct marketing components in the near future, the majority of them were planning for expansion.

Table V-9 in Appendix A shows future plans

**Figure III-11. Average Revenue from Restaurant, Cafe, and Deli Operations, by Retail Sales**



**Figure III-12. Future Plans for Different Direct Marketing Enterprises**

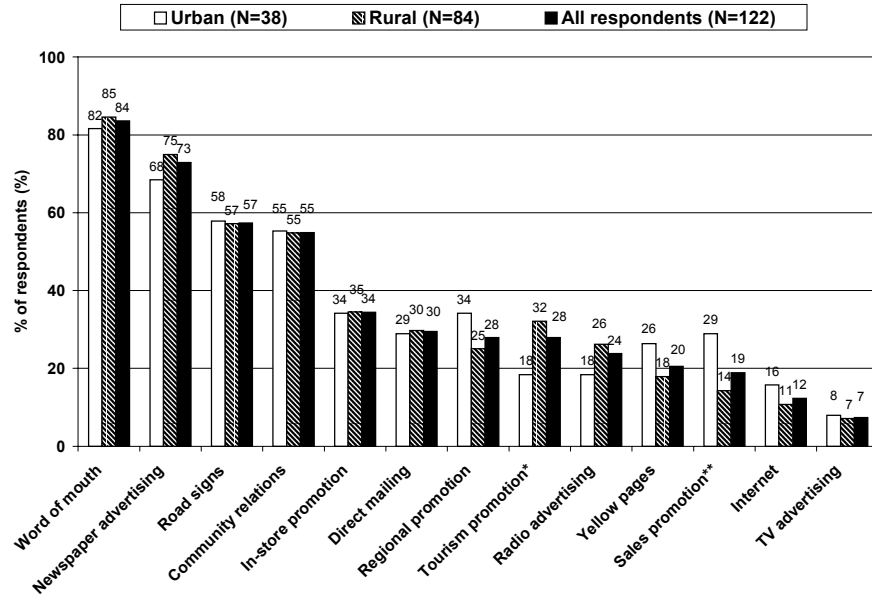


for different direct marketing components by different size surveyed farms. Farms with less than \$10,000 retail sales were most likely to focus on expanding in fresh farm markets, farmers' markets and entertainment activities. Farms with \$10,000-24,999 and \$25,000-49,999 retail sales were most likely to continue to expand their fresh farm markets and entertainment activities, as well as holiday crop sales. For farms with \$50,000-99,999 and \$100,000-249,999 retail sales, although many were still planning to expand their farm fresh market sales, an increased percentage of them expected no changes or even a reduction in this component. The planned directions for expansion for farms in these two categories were evenly spread over many areas based on individual marketing strategies. The largest farms category (\$250,000 or more retail sales) are most likely to expand into holiday crops, ornamental plants and entertainment activities.

### Marketing Tools

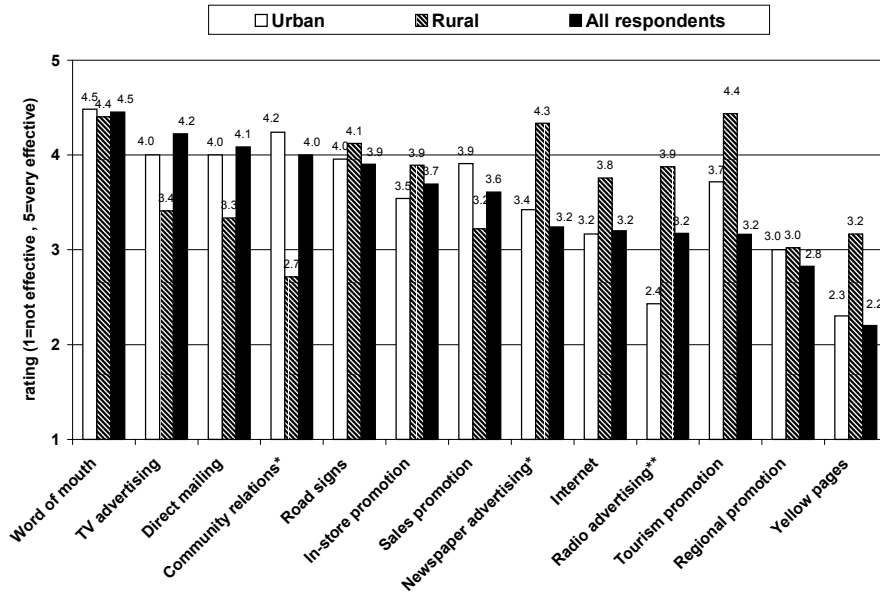
The respondents were asked to identify marketing tools they used to promote retail sales and rate the effectiveness of these marketing tools on a 1 to 5 scale, where 1 is not effective and 5 is very effective (Figures III-13 and 14). The marketing tools rated included newspaper advertising, TV advertising, radio advertising, road signs (include billboards), direct mailing, sales promotion (coupons, special discounts, etc.), internet marketing, in-store promotion (free samples, point-of-purchase displays, brochures, etc.), community relationships (sponsoring community events), participating in locally-grown promotion programs, participating in tourism programs, and word-of-mouth. The most commonly used marketing tools are "word-of-mouth" by 84 percent of the respondents, followed by "newspapers" (73 percent), "road signs" (57 percent), and "community relations" (55 percent). Respondents with urban retail locations were more likely to use

**Figure III-13. Respondents' Utilization of Different Marketing Tools, by Retail Location**



\*, \*\* Respondents with urban retail locations and respondents with only rural retail locations are significantly different at  $P < 0.1$  or  $0.05$ , respectively.

**Figure III-14. Effectiveness Rating of Different Marketing Tools, by Retail Location**



\*, \*\* Respondents with urban retail locations and respondents with only rural retail locations are significantly different at  $P < 0.1$  or  $0.05$ , respectively.

regional promotion, yellow pages, sales promotion, and internet to market their businesses and products than respondents with only rural retail locations. On the other hand, respondents with only rural retail locations were more likely to use newspapers, tourism, and radio promotion than their urban counterparts. However, tourism promotion and sales promotion are the only two marketing techniques utilized significantly differently by the two groups. Additional marketing tools identified under "other" included attending trade shows and hosting tours.

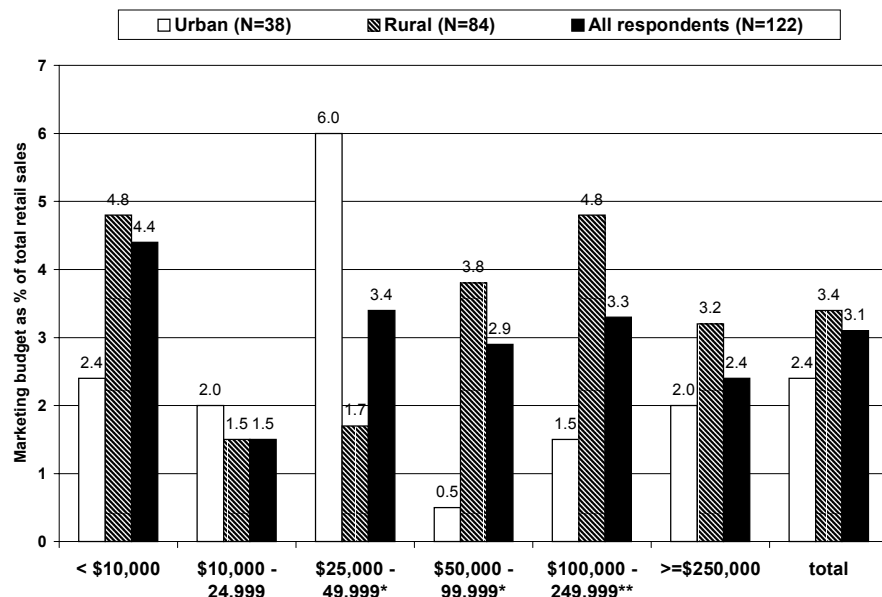
The overall rating was the highest for word-of-mouth (4.5) which was also used by most farms (84 percent). The second highest rated marketing tool was TV advertising (4.2); however, it was only used by 7 percent of the respondents. The marketing tools receiving third and fourth highest ratings were direct mailing (4.1) and community relations (4.0), used by 30 percent and 55 percent of respondents, respectively. Although newspaper advertising was the second most frequently used marketing tool, it only received an average 3.2 effectiveness rating. Respondents with urban retail locations gave higher ratings to TV advertising, direct mailing, sales promotion, and community relationships than respondents with only rural retail locations. By contrast, respondents with only rural retail locations gave higher ratings to yellow pages, newspaper advertising, radio advertising, internet, in-store promotion, and tourism promotion. Only ratings for newspaper advertising, radio advertising, and community relations are statistically different. Although businesses with urban locations were more likely to use internet promotion, businesses with only rural locations found internet promotion to be a more effective marketing tool.

Figures V-1, V-2, and V-3 in Appendix A present the effectiveness of different mar-

keting tools rated by different size retail businesses. Word-of-mouth is rated as very effective by all farm categories except the largest retail farms (\$250,000 or more). Most commonly used marketing tools are word-of-mouth, road signs and newspapers. Smaller farms (less than \$10,000, \$10,000-24,999 and \$25,000-49,999) also stressed community relations. Larger farms (\$10,000-249,999 and more than \$250,000) utilized more marketing tools. In-store promotion was used by more than half of the farms in these two categories, and farms with more than \$250,000 annual retail sales also frequently used sales promotion, tourism promotion and TV advertising.

The surveyed farms spent an average of 3.1 percent of retail sales on promoting their retail operations and products (Figure III-15). Respondents with only rural retail locations generally spent a higher percentage of their retail sales on marketing compared with respondents with urban retail locations, except businesses with \$10,000-24,999 and \$25,000-49,999 retail sales. Overall, respondents with only rural retail locations spent an average of 3.4 percent of their retail sales on marketing and respondents with urban retail locations spent an average of 2.4 percent of retail sales on marketing.

**Figure III-15. Annual Marketing Budget as Percentage of Retail Sales**



\*, \*\* Respondents with urban retail locations and respondents with only rural retail locations are significantly different at P<0.1 or 0.05, respectively.

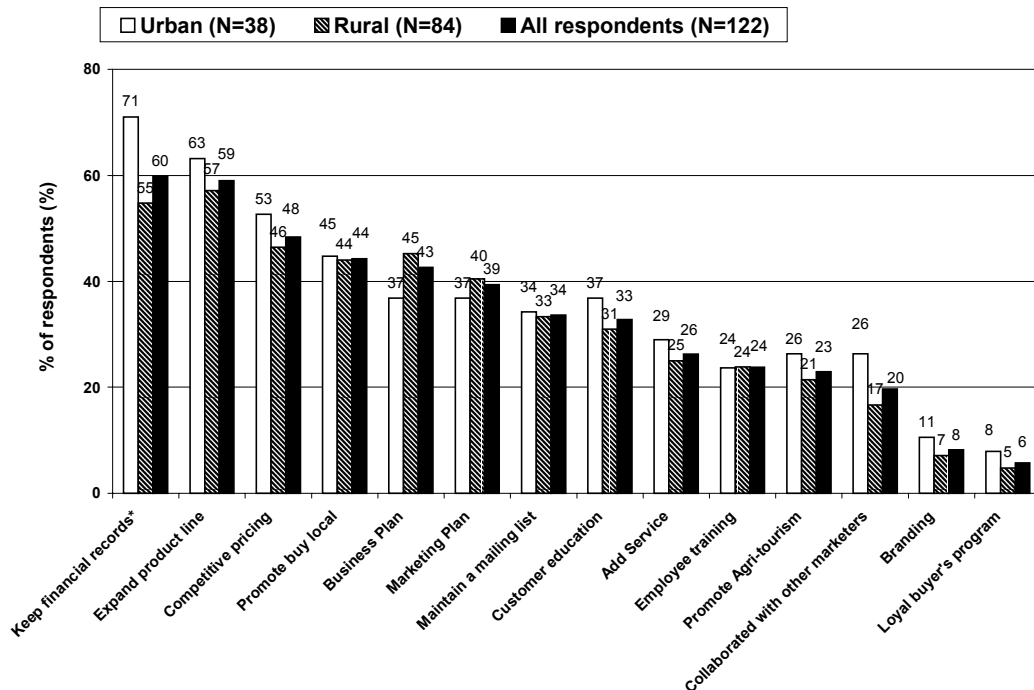
## Business Management Strategies Used to Improve Profitability

Respondents were also asked to identify business management strategies they used to improve the profitability of their retail operations and rate how effective those tools were on a 1 to 5 scale, where 1 is not effective and 5 is very effective. Business management strategies identified in the survey include developing a business plan, developing a marketing plan, expanding product lines (value-added, organic, new products and varieties, etc.), adding services, competitive pricing, branding, utilizing loyal buyers' programs, providing customer education, maintaining a mailing list, promoting agri-tourism, collaborating with other marketers, promoting 'buy local', keeping financial records for decision-making, and providing training for employees. As seen in Figure III-16, keeping financial records for decision-making was utilized by most respondents (60 percent), followed by expanding product lines (59 percent), competitive pricing (48 percent), promoting buy local (44 percent), business plan (43 percent), marketing plan (39 percent), maintain a mailing list (34 percent), customer education (33 percent), add service (26 percent), employee training (24 percent), promote agri-tourism (23 percent), collaborated with other marketers (20 percent), branding (8 percent), and loyal buyer's program (6 percent).

percent), and promoting buy local (44 percent). Respondents with urban retail locations were more likely to use many of the business management strategies than respondents with only rural retail locations, especially keeping financial records and collaborating with other marketers. On the other hand, respondents with only rural retail locations were more likely to develop business and marketing plans than their urban counterparts.

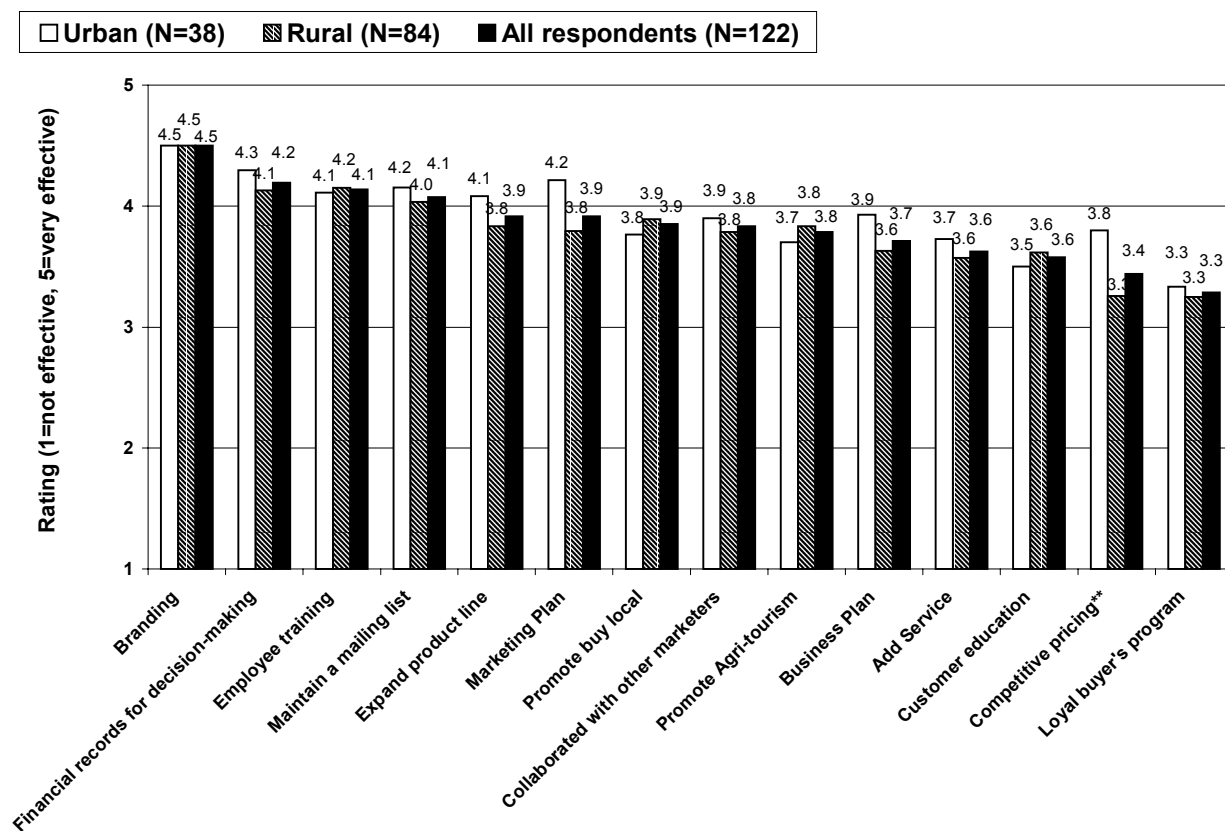
Figure III-17 shows that branding was rated as most effective overall (4.5); however, it was used by only 8 percent of the respondents. Keeping financial records to support decisions had the second highest rating of 4.2 and used by most respondents (60 percent), followed by continuous employee education (4.1) and maintaining a mailing list (4.1) by 24 percent and 34 percent of the respondents, respectively. Although competitive pricing was used by 48 percent of the respondents, the effectiveness rating came in second to last (3.4), only higher than loyal buyers' programs. While respondents with urban and rural locations generally had similar ratings for

**Figure III-16. Respondents' Utilization of Different Business Management Tools, by Retail Sales**



\*Respondents with urban retail locations and respondents with only rural retail locations are significantly different at P<0.1.

**Figure III-17. Effectiveness Rating of Different Business Management Tools, by Retail Location**



\*\*Respondents with urban retail locations and respondents with only rural retail locations are significantly different at P<0.05.

business management tools identified in this survey, farms with urban retail locations rated competitive pricing as significantly more effective than did farms with only rural retail locations, and they rated developing marketing plans, developing business plans and expanding product lines as slightly more effective than did farms with only rural retail locations. Other business management tools identified by respondents include minimizing costs, becoming more efficient, diversifying investment, and hard work and long hours.

Figures V-5, V-6, and V-7 in Appendix A present the effectiveness of different business management strategies rated by different size retail farms. Continuous education was rated as more effective (4.5 or greater) by small and medium size farms (less than \$10,000, \$25,000-49,999, and

\$50,000-99,999) except farms with \$10,000-24,999 annual retail sales. Collaborating with others is rated as more effective (4.5 or greater) by medium and larger farms (\$25,000-49,999, \$50,000-99,999, and \$250,000 or more) except farms with \$100,000-249,999 annual retail sales. Adding services was rated the highest by most of the largest direct marketers (\$250,000 or more).

Different size farms had different resources and management skills. They also focused on different management strategies. The most commonly used strategy by farms with less than \$10,000 annual retail sales to improve profitability was expanding product lines, identified by 50 percent of the farms and rated only 3.2; no other strategies were rated higher than 50 percent by the farms in this category. The most commonly used strategies by farms with

\$10,000 – 24,999 annual retail sales were keeping financial records (65 percent) and expanding product lines (61 percent), rated 4.3 and 4.4, respectively. The other strategies identified by more than half of the farms in this size category were developing a marketing plan (52 percent, rated 3.9) and developing a business plan (52 percent, rated 3.8). The only business management strategy used by more than 50 percent of the farms with \$25,000 – 49,999 annual retail sales was promoting buy local (53 percent) and rated only 3.4.

As farms grew larger, the need for keeping financial records was recognized by more farm operators. Seventy-one percent of farms with \$50,000-99,999 annual retail sales and 83 percent of farms with \$100,000-249,999 annual retail sales found that keeping financial records helped them improve profitability. The effectiveness was rated 4.3 and 4.4, respectively. Expanding product lines was the second most commonly used strategies by farms in these two categories (65 percent and 74 percent), and it was rated only 3.5 by farms with \$50,000-99,999 annual retail sales and 4.3 by farms with \$100,000-249,999 annual retail sales. The most commonly used strategies by large farms (\$250,000 or more annual retail sales) were adding services (73 percent) and developing a business plan (73 percent), and the effectiveness on improving profitability was 5.0 and 3.5, respectively. Additional strategies used by more than half of the farms in this category included 73 percent for maintaining a mailing list and 55 percent for collaborating with others, promoting agri-tourism, branding, and expanding product lines.

### ***Direct Marketers' Views on Barriers, Opportunities and Training Needs***

In their own words, respondents identified the top three barriers or problems facing their direct marketing operations and the top three opportunities for the future success of their direct marketing operations. Table III-10 shows that competition in a saturated market and labor related challenges are the top barriers to success in many direct marketing operators' minds. Concerns include competition from supermarkets, discount stores, import goods, and other farm markets, and labor related challenges including lack of labor pool and hard-to-find seasonal help, difficulty in finding good labor and keeping qualified labor, and high costs of labor. Other top barriers were location, limited resources (capital, land and products), changing market and consumer

demand (one-stop shopping and year-round supply), and regulations and community development pressure. Limited resources and marketing skills were bigger concerns for farms with only rural retail locations, and farms with urban locations worried more about changing market demands. While direct marketing vegetable farms in most size categories identified competition in the market as the number one barrier, the farms with the smallest retail operations (under \$10,000 annual retail sales) saw limited resources as their top barrier; moreover, the largest retail operations (\$250,000 or more retail sales) perceived high operating costs as their topmost barrier to success (Appendix A Table V-10).

While the top opportunity identified by the respondents was definitely diversification and expansion, farms have many different visions on how they want to expand and diversify their retail businesses. Their plans included expanding product lines, developing entertainment activities and agritourism, diversifying marketing outlets and methods (additional direct marketing methods and wholesale outlets), extending season, and increasing farm size and operating hours. Respondents also were striving for farm fresh to provide high quality and fresh products as well as good service to help future success. More marketing is another important opportunity identified by respondents. Other opportunities include good retail locations, market and consumer trends on eating more fresh fruits and vegetables and desire to buy from local farmers. Direct marketers with urban retail locations see more emphasis on marketing as a greater opportunity than direct marketers with only rural retail locations. On the other hand, direct marketers with only rural retail locations see providing freshness and quality products, having a good retail location, maintaining a farm image, consumer trends on eating more fruits and vegetables and buying from local farmers as greater opportunities than their urban counterparts. Respondents in different retail size categories all felt that expanding and diversifying is the top opportunity for their direct marketing operation (Appendix A Table V-11).

Respondents also identified the top three training or publications topics they would like to see available to them or their employees to help their direct marketing operation success. The results were summarized in Table III-12. Marketing strategy related topics were identified by most respondents as including effective promotion strategies, sales strategies, store design and layout, differentiation strate-



gies, development of new products and markets, customer relations and services, and internet marketing. Production and post-harvesting topics came in second, including small scale harvesting and cultivating techniques, product variety and seed selection, and techniques to improve shelf-life. Customer education is also on the top of direct marketers' minds. Topics requested in this category include information on how to use seasonal vegetables, how to take care of products at home, sustainable agriculture and buying local. Information on the economics environment and market trends, employee training and motivation, obtaining grants and funding support, and government standards and regulations are other important education topics. Besides marketing

related training, respondents with urban retail locations focused on information for customer education, and respondents with only rural retail locations looked for production techniques related training. Respondents of different size operations generally requested marketing related topics as their top training and education needs. Nonetheless, respondents with \$25,000-49,999 annual retail sales ranked information on customer education higher than marketing related topics. Moreover, few of the respondents in the largest direct marketing group (\$250,000 or more) identified any training or education needs, and the ones who did identified employee training and market analysis as the most important (Appendix A V-12).

**Table III-10. Ranking of Top Barriers Facing Direct Marketing Operations, by Retail Location**

	Respondents with urban retail locations			Respondents with only rural retail locations			All respondents					
	Rank 1	Rank 2	Rank 3	Weighted sum*	Rank 1	Rank 2	Rank 3	Weighted sum*	Rank 1	Rank 2	Rank 3	Weighted sum*
Competition	5	4	4	27	21	7	9	86	26	11	13	113
Labor related challenges	10	3	2	38	13	13	1	66	23	16	3	104
Location	6	3	0	24	7	4	2	31	13	7	2	55
Limited resources	0	1	2	4	10	6	3	45	10	7	5	49
Market demand and prices and consumer trends	2	7	3	23	2	5	4	20	4	12	7	43
Regulation and community development pressure	3	1	2	13	5	4	3	26	8	5	5	39
High operating costs	1	3	3	12	1	8	5	24	2	11	8	36
Production and technology challenges	1	3	3	12	3	5	3	22	4	8	6	34
Personal time and management skills	1	1	3	8	5	3	3	24	6	4	6	32
Marketing skills	N/A	N/A	N/A	N/A	5	4	3	26	5	4	3	26
Weather	1	1	1	6	1	2	7	14	2	3	8	20
Business transition	2	1	0	8	2	2	0	10	4	3	0	18

\* Weighted Sum was calculated by 3 \* number of rank 1 + 2 \* number of rank 2 + 1 \* number of rank 3.

	Respondents with Urban Retail Locations				Respondents with Only Rural Retail Locations				All Respondents			
	Rank 1	Rank 2	Rank 3	Weighted sum	Rank 1	Rank 2	Rank 3	Weighted sum	Rank 1	Rank 2	Rank 3	Weighted sum
	-----Number of respondents-----											
Expansion and Diversification	13	10	8	67	26	27	22	154	39	37	30	221
•Expanding product lines	7	4	3	32	13	9	9	66	20	13	12	98
•Diversifying marketing outlets	1	3	3	12	4	7	6	32	5	10	9	44
•Expanding entertainment activities and promote agri-tourism	4	2	0	16	3	3	6	21	7	5	6	37
•Expanding size of business, production and growing season	1	1	1	6	5	8	0	31	6	9	1	37
•Purchasing more items for resale	0	0	1	1	1	0	1	4	1	0	2	5
Provide service, freshness, and quality products	2	1	0	8	9	9	3	48	11	10	3	56
More marketing	7	2	1	26	6	1	1	21	13	3	2	47
Good locations	3	1	1	12	8	3	1	31	11	4	2	43
Market and consumer trends	0	1	0	2	3	4	1	18	3	5	1	20
Farm image & reputation	N/A	N/A	N/A	N/A	2	5	1	17	2	5	1	17
Spending more time in managing the business	0	3	0	6	3	0	1	10	3	3	1	16
Customer loyalty	1	1	0	5	1	0	4	7	2	1	4	12
Competitive in every way	1	2	0	7	1	1	0	5	2	3	0	12
Agricultural education	0	2	0	4	1	0	1	4	1	2	1	8
Off-farm employment	0	0	1	1	0	0	1	1	0	0	2	2

\* Weighted sum was calculated by 3 \* number of rank 1 + 2 \* number of rank 2 + 1 \* number of rank 3.

**Table III-12. Ranking of Top Training Needs for Direct Marketing Operations, by Retail Location**

	Respondents with urban retail locations			Respondents with only rural retail locations			All respondents			
	Rank 1	Rank 2	Rank 3	Rank 1	Rank 2	Rank 3	Rank 1	Rank 2	Rank 3	Weighted sum
Marketing strategy related topics	7	6	3	17	11	7	26	17	10	122
Production related training	0	1	1	5	4	1	24	5	5	27
Customer education	4	1	1	1	1	2	7	2	3	22
Market analysis and trend information	1	1	0	3	3	0	15	4	4	20
Employee training and motivation	2	1	1	0	3	1	7	4	2	16
Grants and funding assistance	--	--	--	3	0	3	12	0	3	12
Regulations	1	0	0	2	0	2	8	0	2	11
Financial planning and management	0	0	1	1	1	0	5	1	1	6
Networking, collaborating	0	1	0	1	0	3	6	1	3	8
Small farms	1	0	0	2	0	0	0	0	0	3
Pricing	0	1	1	1	1	2	7	2	3	10
Succession planning	--	--	--	0	2	0	4	2	0	4

\* Weighted sum was calculated by 3 \* number of rank 1 + 2 \* number of rank 2 + 1 \* number of rank 3.

## IV. CONCLUSION

The results of this survey provide a profile of direct marketing vegetable farms in New York and their direct marketing activities and strategies. The findings show that direct marketing is an effective value-added strategy for vegetable farms in New York, and an important source of income for these farms. Moreover, it demonstrates that the scope of direct retail sales conducted by New York vegetable farms is much greater than just food products sold for human consumption and crops produced on the farm as defined in the Census of Agriculture.

According to the 1997 Census of Agriculture, 879 of 1,585 vegetable farms in New York generated total sales of \$13.2 million from selling agriculture products directly to individuals for human consumption in 1997, which is an average of \$15,017 per farm. However, when using the broader definition of direct farm-to-consumer marketing sales as defined in this study, the average "direct marketing sales" of survey respondents in this study reached \$123,000, and 50 percent of respondents had direct marketing sales more than \$30,000 in 2000. Therefore, the total economic impact of direct marketing activities performed by New York vegetable farms is much greater than demonstrated by the Census of Agriculture data. This also implies that diversifying to nonfood products and services and purchasing products to resell could potentially increase direct

marketing vegetable farms' income significantly. Hence, farmer-to-consumer direct marketing activities are becoming ever more diversified and sophisticated. Moreover, this study indicated that direct marketing vegetable farms in New York are also expanding to other marketing channels. As a result, it is important for direct marketers to enhance their marketing knowledge and skills as well as business management competency and access to quality wholesale products to satisfy different sectors of customers and improve profitability.

While this study showed that New York's direct marketing vegetable farms face diverse challenges in the market, they also enjoy many opportunities. Many of the direct marketing farms are considering expansion and are optimistic about the market. However, collecting information and identifying opportunities alone will neither improve markets nor answer all questions for direct marketers. More attention to marketing and business management will be necessary to ensure future profitability and success. Results from this survey also showed that vegetable farms with direct marketing are a very diversified group, and the needs for each group to expand, improve and succeed are different. Additional marketing and business management research or educational programs need to be developed and tailored to the specific needs of each group.

---

## REFERENCES

- Bills, N., M. Roth, and J. Maestro-Scherer. 2000. *Direct Marketing Today: Challenges and Opportunities*. U.S. Department of Agriculture. National Agricultural Statistics Service. Washington, D.C.
- Bond, M.C. 1941. *Selling Farm Products Through Roadside Markets*. Cornell Extension Bulletin 466, Cornell University, Ithaca, NY. June.
- Bureau of Marketing Development, Pennsylvania Dept. of Agriculture. 1997. *Results of the Pennsylvania Direct Marketing Survey*. Harrisburg, PA. June.
- Eiler, D.A. and D.G. Rosenfeld. 1973. *Customers at Selected New York State Roadside Markets*. A.E. Res. 73-12, Dept. of Agricultural Economics, Cornell University, Ithaca, NY.
- How, R.B. 1980. *Developing Direct Programs for Both Farmers and Consumers*. A.E. Staff Paper 80-24, Dept. of Agricultural Economics, Cornell University, Ithaca, NY.
- New York Agricultural Statistics Service. 1988. *New York Direct Marketing Survey, 1988*. New York Dept. of Agriculture and Markets. Albany, NY.

Nayga, R.M., M.S. Fabian, D.W. Thatch, and M.N. Wanzala. 1995. "Farmer-to-Consumer Direct Marketing: Sales and Advertising Aspects of New Jersey Operations." *Journal of Food Distribution Research*, 26(1): 38-52.

Stuhlmiller, E.M. and R.B. How. 1978. *Selected Characteristics of Direct Marketing Businesses, Six Counties, New York, 1976*. A.E. Res. 78-7, Dept. of Agricultural Economics, Cornell University, Ithaca, NY.

Stuhlmiller, E.M., R.B. How, and K.W. Stone. 1976. *Consumer Use and Experience with Home Gardens and Produce Purchased Directly from Farmers*. A.E. Res. 76-20, Dept. of Agricultural Economics, Cornell University, Ithaca, NY.

USDA. 1999. *1997 Census of Agriculture*. U.S. Department of Agriculture, National Agricultural Statistics Service, Washington, D.C.

---



## V. APPENDIX A

**Table V-1. Areas of Crop Produced, by Total Farm Receipts**

<i>Respondents by total farm receipts</i>	<i>Vegetables</i>		<i>Fruits</i>		<i>Ornamentals</i>	
Under \$10,000	100	2.7	48	2.3	22	938
\$10,000-49,999	100	13.3	29	3.5	39	17,500
\$50,000-99,999	100	20.2	30	17.2	40	29,479
\$100,000-249,999	100	27.2	61	37.3	65	30,962
\$250,000-499,999	100	84.1	57	77.8	43	18,520
\$500,000-749,999	100	116.0	71	6.6	43	30,733
\$750,000-999,999	100	101.7	50	23.5	50	29,000
Over \$1,000,000	100	131.0	64	29.9	65	54,765
<b>All farms</b>	<b>100</b>	<b>37.9</b>	<b>46</b>	<b>22.7</b>	<b>45</b>	<b>32,837</b>

**Table V-2. Crops Produced by New York Direct Marketing Vegetable Farms, by Total Farm Receipts**

<i>Respondents by total farm receipts</i>	<i>Vegetables only</i>	<i>Vegetables &amp; fruits</i>	<i>Vegetables &amp; ornamentals</i>	<i>Vegetables, fruits &amp; ornamentals</i>	<i>Total</i>
	----- % of farms -----				
Under \$10,000	39	39	13	9	100
\$10,000-49,999	45	16	26	13	100
\$50,000-99,999	50	10	20	20	100
\$100,000-249,999	13	22	26	39	100
\$250,000-499,999	14	43	29	14	100
\$500,000-749,999	0	57	29	14	100
\$750,000-999,999	0	25	25	50	100
Over \$1,000,000	9	27	27	36	100
<b>All farms</b>	<b>28</b>	<b>26</b>	<b>26</b>	<b>20</b>	<b>100</b>



Respondents by total farm receipts	Supermarket			Other retail farm markets			Food service outlets			Other wholesale outlets			Retail		
	% of farms	Avg. % of farm sales	% of total surveyed sales	% of farms	Avg. % of farm sales	% of total surveyed sales	% of farms	Avg. % of farm sales	% of total surveyed sales	% of farms	Avg. % of farm sales	% of total surveyed sales	% of farms	Avg. % of farm sales	% of total surveyed sales
Under \$10,000	17	6.0	1.5	17	8.8	2.2	4	5.0	0.3	4	2.0	0.1	100	97.1	95.9
\$10,000-49,999	26	17.3	5.9	32	25.5	7.9	19	15.3	3.7	13	20.0	3.4	100	81.8	79.2
\$50,000-99,999	45	18.4	10.0	55	12.5	7.2	18	3.0	0.7	27	26.7	8.0	100	77.0	74.1
\$100,000 -249,999	42	28.5	11.9	58	15.3	9.2	29	11.0	2.6	50	26.3	13.0	100	62.8	63.3
\$250,000-499,999	57	38.8	23.0	71	21.6	16.6	43	30.7	11.7	43	5.7	2.6	100	46.9	46.1
\$500,000-749,999	57	6.5	3.4	57	35.0	19.6	29	6.0	1.6	57	56.3	33.3	100	42.4	42.0
\$750,000-999,999	67	40.5	25.7	100	28.0	28.6	33	2.0	0.6	0	0.0	0.0	100	44.3	45.1
\$1,000,000 & over	36	17.8	4.2	100	11.2	11.2	27	27.0	4.7	73	53.1	41.7	100	36.8	38.3
<b>All farms</b>	<b>36</b>	<b>20.6</b>	<b>8.3</b>	<b>48</b>	<b>17.5</b>	<b>13.7</b>	<b>22</b>	<b>14.2</b>	<b>4.1</b>	<b>29</b>	<b>32.7</b>	<b>29.1</b>	<b>100</b>	<b>71.7</b>	<b>44.8</b>

**Table V-4. Average Percentage of Retail Income Generated in Each Month, by Retail Sales**

Respondents by retail sales	Month											
	Jan.	Feb.	March	April	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.
	----- % of Respondents -----											
Urban (N=6)	40	40	20	20	40	80	80	80	80	80	40	40
Rural (N=23)	4	9	13	22	39	61	87	83	74	61	26	17
All (N=29)	11	14	14	21	39	64	86	82	75	64	29	21
Urban (N=3)	0	0	50	50	50	100	100	100	100	50	100	50
Rural (N=21)	24	16	19	29	29	49	67	67	71	67	38	38
All (N=24)	22	17	22	30	30	48	70	70	74	65	43	39
Urban (N=5)	0	0	20	20	40	80	100	100	100	100	20	20
Rural (N=11)	10	10	10	0	40	50	80	100	100	80	40	30
All (N=15)	7	7	13	7	40	60	87	100	100	87	33	27
Urban (N=5)	0	0	0	0	80	80	80	80	100	100	40	20
Rural (N=12)	17	17	33	42	58	92	92	92	92	75	33	33
All (N=17)	12	12	24	35	65	88	88	88	94	82	35	29
Urban(N=11)	27	36	36	45	64	100	100	100	100	100	73	73
Rural (N=12)	8	8	8	50	83	92	100	100	100	100	75	58
All (N=24)	17	22	22	48	74	96	100	100	100	100	74	65
Urban (N=8)	14	14	14	71	100	100	100	100	100	100	86	86
Rural (N=4)	0	0	25	50	100	100	100	100	100	100	75	75
All (N=12)	9	9	18	55	100	100	100	100	100	100	77	77
<b>Urban (N=38)</b>	<b>17</b>	<b>20</b>	<b>23</b>	<b>37</b>	<b>71</b>	<b>94</b>	<b>100</b>	<b>100</b>	<b>100</b>	<b>97</b>	<b>60</b>	<b>54</b>
<b>Rural (N=84)</b>	<b>12</b>	<b>12</b>	<b>17</b>	<b>29</b>	<b>50</b>	<b>68</b>	<b>87</b>	<b>88</b>	<b>87</b>	<b>77</b>	<b>41</b>	<b>35</b>
<b>All (N=122)</b>	<b>14</b>	<b>15</b>	<b>19</b>	<b>32</b>	<b>56</b>	<b>76</b>	<b>91</b>	<b>92</b>	<b>92</b>	<b>83</b>	<b>47</b>	<b>41</b>

**Table V-5. Direct Marketing Methods Used by New York Vegetable Farms and Retail Sales Generated by Each Marketing Method**

	Respondents by Retail Sales											
	Under \$10,000 (N=29)		\$10,000-24,999 (N=24)		\$25,000-49,999 (N=16)		\$50,000-99,999 (N=17)		\$100,000-249,999 (N=24)		\$250,000 and over (N=12)	
	% of farms	% of surveyed retail sales	% of farms	% of surveyed retail sales	% of farms	% of surveyed retail sales	% of farms	% of surveyed retail sales	% of farms	% of surveyed retail sales	% of farms	% of surveyed retail sales
Roadside markets	57	40	70	56	75	48	94	66	87	72	100	86
Farmers' markets	54	35	26	21	63	39	35	9	39	19	9	2
PYO	21	15	22	20	38	12	71	24	43	7	64	8
Catalog sales	4	1	4	0 <sup>b</sup>	0	0	0	0	9	2	9	1
Internet sales	7	1	4	0 <sup>b</sup>	6	0 <sup>b</sup>	0	0	13	0 <sup>b</sup>	9	2
CSA	4	0 <sup>b</sup>	4	3	6	0 <sup>b</sup>	0	0	4	0 <sup>b</sup>	0	0
Others <sup>a</sup>	25	7	0	0	0	0	6	0 <sup>b</sup>	4	0 <sup>b</sup>	4	0

<sup>a</sup> Others include direct order, custom sales, fairs, and shows.

<sup>b</sup> Rounded to zero due to less than 0.5%

**Table V-6. Average Retail Sales and Percentage of Respondents Offering Each Product Line, by Retail Sales**

	Respondents by retail sales											Total (N=122)		
	Under \$10,000 (N=29)	\$10,000- 24,999 (N=24)	\$25,000- 49,000 (N=16)	\$50,000- 99,999 (N=17)	\$100,000- 249,999 (N=24)	\$250,000- and over (N=12)								
	% of farms	Avg. sales \$	% of farms	Avg. sales \$	% of farms	Avg. sales \$	% of farms	Avg. sales \$	% of farms	Avg. sales \$	% of farms		Avg. sales \$	
Fresh vegetables	100	2,207	96	7,444	96	18,536	95	32,000	96	56,355	100	195,828	96	42,445
Ornamentals	29	1,660	35	5,756	56	7,350	50	16,883	74	38,894	91	261,417	51	59,206
Fresh fruits	43	2,234	43	4,870	63	12,760	75	20,385	91	27,624	100	124,037	65	31,482
Pumpkins	21	675	48	3,600	63	3,260	56	7,250	91	15,886	100	43,917	59	13,992
Christmas trees	11	2,000	22	6,680	19	10,733	13	1,367	48	9,909	82	54,889	28	19,962
Processed products	25	1,829	39	2,667	31	1,550	50	3,131	65	18,740	82	30,300	45	11,987
Gift & accessories	11	950	0	N/A	6	2,000	25	4,188	17	16,250	82	50,889	18	25,933
Baked goods	7	1,200	17	3,500	19	2,200	31	3,075	57	13,932	82	19,948	30	11,161
Ice Cream	0	N/A	0	N/A	0	N/A	6	3,750	13	9,000	18	40,000	5	18,458
Others*	14	1,225	9	3,000	0	N/A	13	8,500	13	25,267	18	37,500	11	13,746
Meat products	14	1,763	26	2,050	6	2,000	13	900	26	1,850	36	5,625	20	2,402
Milk & cheese products	0	N/A	4	600	0	N/A	19	750	26	1,717	27	12,333	11	3,858

\* Others include maple syrup, mushrooms, entertainment activities, furniture, and wool.

**Table V-7. Items Purchased for Resale for Each Product Line, by Retail Sales**

	Respondents by retail sales											
	Under \$10,000 (N=29)	\$10,000-24,999 (N=24)		\$25,000-49,999 (N=16)		\$50,000-99,999 (N=17)		\$100,000-249,999 (N=24)		\$250,000 and over (N=12)		
	% farms sell the item also resale	Avg. % sales from resale	% farms sell the item also resale	Avg. % sales from resale	% farms sell the item also resale	Avg. % sales from resale	% farms sell the item also resale	Avg. % sales from resale	% farms sell the item also resale	Avg. % sales from resale		
Fresh vegetables	9	6	33	15	31	16	53	21	55	18	82	26
Ornamentals	3	11	75	43	13	1	78	22	76	40	80	21
Fresh fruits	3	8	40	29	56	34	77	39	57	25	91	63
Pumpkins	50	40	36	34	30	13	40	16	43	12	27	12
Christmas trees	33	33	60	41	67	67	67	34	82	75	89	78
Processed products	57	50	56	50	50	50	100	73	80	60	89	82
Gift & accessories	67	50	N/A	N/A	100	80	100	74	100	49	100	100
Baked goods	0	0	75	61	50	35	67	50	85	39	89	76
Ice Cream	N/A	N/A	N/A	N/A	N/A	N/A	100	5	67	67	100	100
Others*	75	0	50	0	N/A	N/A	50	0	67	50	100	95
Meat products	0	0	50	34	0	0	100	67	67	50	100	100
Milk & cheese products	N/A	N/A	100	100	N/A	N/A	100	67	83	67	100	100

\* Others include maple syrup, mushrooms, entertainment activities, furniture, and wool.

**Table V-8. On-farm Entertainment Activity Offerings and Charges by Retail Sales**

Respondents by retail sales	Respondents offering entertainment activities		Among respondents offering entertainment activities, % charging fees for them		Average sales from entertainment activities
	#	(%)	%		\$
Under \$10,000 (N=29)	7	(24%)	43%		371
\$10,000-24,999 (N=24)	11	(46%)	27%		155
\$25,000-49,999 (N=16)	3	(19%)	67%		1,000
\$50,000-99,999 (N=17)	5	(29%)	40%		3,400
\$100,000-249,999 (N=24)	9	(38%)	56%		7,833
\$250,000 and over (N=12)	9	(75%)	75%		31,652
<b>Total (N=122)</b>	<b>38</b>		<b>50%</b>		<b>11,236</b>

**Table V-9. Future Plans for Different Direct Marketing Components, by Retail Sales**

Direct Mktg. Enterprise	Respondents by Retail Sales											
	Under \$10,000			\$10,000-24,999			\$25,000-49,999			\$50,000 and over		
	Expand	No Change	Decrease	Expand	No Change	Decrease	Expand	No Change	Decrease	Expand	No Change	Decrease
	----- % respondents -----											
Fresh farm market	32*	21	0	48*	17	13	40*	33	13			
Processed products	18	29	4	26	4	0	13	7	0			
Organic products	14	21	0	13	4	0	7	0	0			
Ornamental plants	18	7	0	18	13	0	20	27	0			
Holiday crops <sup>a</sup>	18	11	4	39	13	4	40*	20	7			
Bakery	11	0	0	4	13	0	0	13	0			
Ice cream stand	0	0	0	0	0	0	7	0	0			
Gift & accessories	15	0	0	8	0	0	0	0	0			
Entertainment activities	25	0	0	34	9	0	27	7	0			
PYO	18	11	0	13	13	0	7	7	20			
Restaurant etc.	4	0	0	0	4	4	13	7	0			
Catalog sales	4	4	0	8	0	0	0	0	0			
Internet sales	11	4	0	18	0	0	7	0	0			
CSA	4	0	0	8	0	0	7	0	0			
Farmers' markets	25	21	4	22	13	0	20	40	0			
	----- % respondents -----											
	\$50,000 - 99,999			\$100,000 - 249,999			\$250,000 and over					
	Expand	No Change	Decrease	Expand	No Change	Decrease	Expand	No Change	Decrease	Expand	No Change	Decrease
Fresh farm market	29*	59	6	52	17	22	27	64	9			
Processed products	18	24	0	39	22	0	27	36	0			
Organic products	12	0	0	8	4	0	0	0	0			
Ornamental plants	24	24	0	43	13	9	73	18	0			
Holiday crops <sup>a</sup>	24	29	12	57*	13	4	82*	9	0			
Bakery	6	18	0	39	0	0	36	45	0			
Ice cream stand	0	0	0	13	4	0	18	0	0			
Gift & accessories	12	6	0	26	9	0	18	64	0			
Entertainment activities	18	6	0	26	4	0	64	18	0			
PYO	24	35	18	26	17	0	18	45	0			
Restaurant etc.	0	6	0	4	0	0	9	27	0			
Catalog sales	0	0	0	9	0	0	9	0	0			
Internet sales	6	0	0	4	4	0	27	0	0			
CSA	0	0	0	4	0	0	0	0	0			
Farmers' markets	30	0	12	9	30	0	0	0	0			

<sup>a</sup> Holiday crops include pumpkins and Christmas trees.

\* The direct marketing component identified by most respondents for expansion

**Table V-10. Ranking of Top Barriers Facing Direct Marketing Operations, by Retail Business**

Ranking	Under \$10,000	\$10,000-24,999	\$25,000-49,999	\$50,000-99,999	\$100,000-249,999	\$250,000 and over
Competition	3	3	4	5	8	3
1	3	3	4	5	8	3
2	2	1	1	5	2	0
3	1	2	1	2	4	2
<b>Weighted sum</b>	<b>14</b>	<b>13</b>	<b>15</b>	<b>27</b>	<b>32</b>	<b>11</b>
Labor challenges	3	2	2	3	4	2
1	3	2	2	3	4	2
2	3	3	3	0	3	3
3	0	0	0	0	0	1
<b>Weighted sum</b>	<b>15</b>	<b>12</b>	<b>12</b>	<b>9</b>	<b>18</b>	<b>13</b>
Retail locations	4	3	1	2	3	0
1	4	3	1	2	3	0
2	2	0	2	1	2	0
3	0	1	1	0	0	0
<b>Weighted sum</b>	<b>16</b>	<b>10</b>	<b>8</b>	<b>8</b>	<b>13</b>	<b>0</b>
Limited resources	6	2	1	1	0	0
1	6	2	1	1	0	0
2	2	2	1	0	1	1
3	1	1	1	1	0	0
<b>Weighted sum</b>	<b>23</b>	<b>11</b>	<b>6</b>	<b>4</b>	<b>2</b>	<b>2</b>
Market demand, prices and consumer trends	0	1	1	2	3	2
1	0	1	1	2	3	2
2	1	1	0	4	2	0
3	1	1	0	1	2	0
<b>Weighted sum</b>	<b>3</b>	<b>6</b>	<b>3</b>	<b>15</b>	<b>15</b>	<b>6</b>
Regulations and community development pressure	1	3	0	0	1	1
1	1	3	0	0	1	1
2	0	1	0	2	0	3
3	1	1	0	1	0	0
<b>Weighted sum</b>	<b>4</b>	<b>12</b>	<b>0</b>	<b>5</b>	<b>3</b>	<b>9</b>
High operating costs	2	0	0	0	0	4
1	2	0	0	0	0	4
2	3	2	0	3	3	1
3	1	1	1	1	1	2
<b>Weighted sum</b>	<b>13</b>	<b>5</b>	<b>1</b>	<b>7</b>	<b>7</b>	<b>16</b>
Production challenges	1	1	0	0	1	1
1	1	1	0	0	1	1
2	3	2	0	0	2	1
3	3	0	0	1	1	1
<b>Weighted sum</b>	<b>12</b>	<b>7</b>	<b>0</b>	<b>1</b>	<b>8</b>	<b>6</b>
Personal time and management skills	2	2	0	2	0	0
1	2	2	0	2	0	0
2	3	0	0	1	0	0
3	2	2	0	0	1	1
<b>Weighted sum</b>	<b>14</b>	<b>8</b>	<b>0</b>	<b>8</b>	<b>1</b>	<b>1</b>
Weather, short growing season	0	1	0	0	1	0
1	0	1	0	0	1	0
2	1	1	1	0	0	0
3	1	3	1	2	6	4
<b>Weighted sum</b>	<b>3</b>	<b>8</b>	<b>3</b>	<b>2</b>	<b>9</b>	<b>4</b>
Business transition	0	2	0	0	1	0
1	0	2	0	0	1	0
2	0	2	0	0	0	0
3	0	0	0	0	2	1
<b>Weighted sum</b>	<b>0</b>	<b>10</b>	<b>0</b>	<b>0</b>	<b>5</b>	<b>1</b>
Marketing skills	1	2	1	0	1	0
1	1	2	1	0	1	0
2	1	2	0	0	2	0
3	1	0	1	1	0	0
<b>Weighted sum</b>	<b>6</b>	<b>10</b>	<b>4</b>	<b>1</b>	<b>7</b>	<b>0</b>

\* Weighted sum was calculated by 3 \* number of rank 1 + 2 \* number of rank 2 + 1 \* number of rank 3.



**Table V-11. Ranking of Top Opportunities for Direct Marketing Operations, by Retail Business**

Ranking		Under \$10,000	\$10,000- 24,999	\$25,000-49,999	\$50,000-99,999	\$100,000-249,999	\$250,000-and over
Expansion and diversification	1	11	5	4	5	7	7
	2	9	8	2	2	11	5
	3	10	6	2	2	5	4
	<b>Weighted sum</b>	<b>61</b>	<b>37</b>	<b>18</b>	<b>21</b>	<b>48</b>	<b>35</b>
Provide service, fresh and quality products	1	1	1	3	3	3	0
	2	0	3	2	0	4	1
	3	0	2	0	1	0	0
	<b>Weighted sum</b>	<b>3</b>	<b>11</b>	<b>13</b>	<b>10</b>	<b>17</b>	<b>2</b>
More marketing	1	4	3	1	0	4	1
	2	2	1	0	0	0	0
	3	0	0	1	0	1	0
	<b>Weighted sum</b>	<b>16</b>	<b>11</b>	<b>4</b>	<b>0</b>	<b>13</b>	<b>3</b>
Good retail locations	1	2	4	0	2	0	1
	2	2	1	0	1	0	0
	3	1	0	0	0	0	0
	<b>Weighted sum</b>	<b>11</b>	<b>14</b>	<b>0</b>	<b>8</b>	<b>0</b>	<b>3</b>
Market and consumer trends	1	0	0	1	1	0	1
	2	0	0	1	3	1	0
	3	0	0	1	0	0	0
	<b>Weighted sum</b>	<b>0</b>	<b>0</b>	<b>6</b>	<b>9</b>	<b>2</b>	<b>3</b>
Farm image, reputation	1	0	0	0	0	2	2
	2	0	2	1	1	0	1
	3	0	1	0	0	1	0
	<b>Weighted sum</b>	<b>0</b>	<b>5</b>	<b>2</b>	<b>2</b>	<b>7</b>	<b>8</b>
More time in managing business	1	1	3	0	0	2	0
	2	0	0	0	0	0	0
	3	1	0	0	0	0	1
	<b>Weighted sum</b>	<b>4</b>	<b>9</b>	<b>0</b>	<b>0</b>	<b>6</b>	<b>1</b>
Customer loyalty and good customer relation	1	0	0	1	0	1	0
	2	0	0	0	1	0	0
	3	0	1	2	0	0	1
	<b>Weighted sum</b>	<b>0</b>	<b>1</b>	<b>5</b>	<b>2</b>	<b>3</b>	<b>1</b>
Being competitive	1	0	1	0	1	0	0
	2	0	0	0	1	1	1
	3	0	0	0	0	0	0
	<b>Weighted sum</b>	<b>0</b>	<b>3</b>	<b>0</b>	<b>5</b>	<b>2</b>	<b>2</b>
Agricultural education	1	0	1	0	0	0	0
	2	0	0	0	0	2	0
	3	0	0	0	0	0	1
	<b>Weighted sum</b>	<b>0</b>	<b>3</b>	<b>0</b>	<b>0</b>	<b>4</b>	<b>1</b>
Off-farm employment	1	0	0	0	0	0	0
	2	0	0	0	0	0	0
	3	0	0	0	0	1	0
	<b>Weighted sum</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>1</b>	<b>0</b>

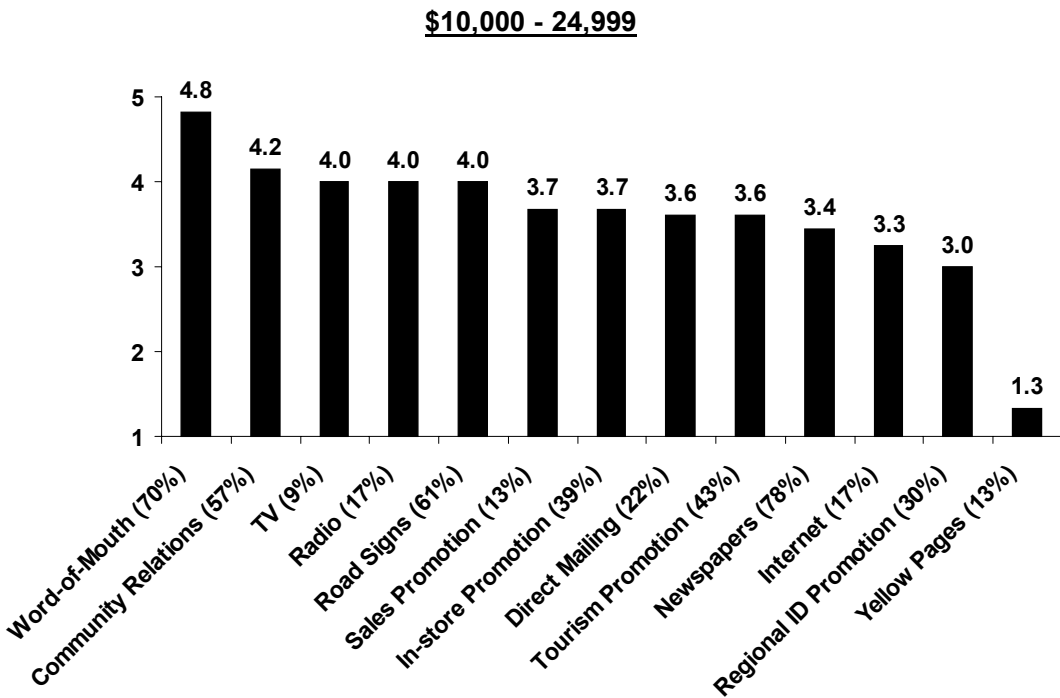
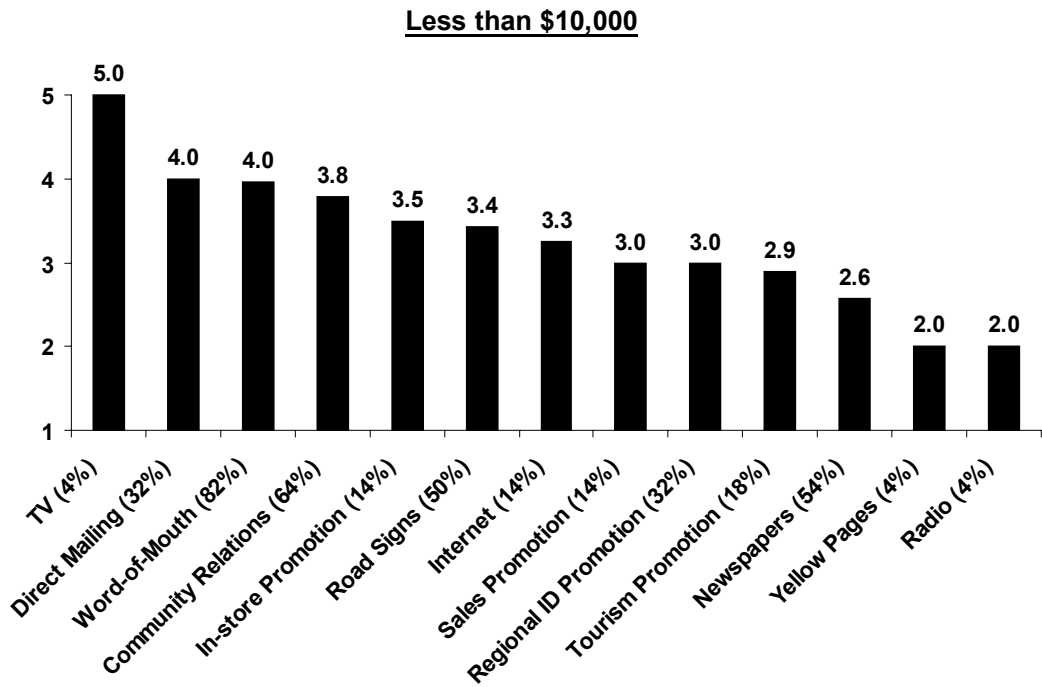
\* Weighted sum was calculated by 3 \* number of rank 1 + 2 \* number of rank 2 + 1 \* number of rank 3.

**Table V-12. Ranking of Top Training Needs for the Direct Marketing Operations, by Retail Business**

Ranking	Under \$10,000	\$10,000- 24,999	\$25,000-49,999	\$50,000-99,999	\$100,000-249,999	\$250,000-and over
Marketing related topics						
1	9	4	2	5	7	0
2	8	3	0	3	5	0
3	4	1	1	1	5	0
<b>Weighted sum</b>	<b>47</b>	<b>20</b>	<b>7</b>	<b>22</b>	<b>36</b>	<b>0</b>
Production related topics						
1	3	3	0	0	0	0
2	1	3	0	0	1	0
3	1	1	0	0	0	0
<b>Weighted sum</b>	<b>12</b>	<b>16</b>	<b>0</b>	<b>0</b>	<b>2</b>	<b>0</b>
Customer education						
1	0	1	2	0	2	0
2	1	0	1	0	0	0
3	1	0	1	1	0	0
<b>Weighted sum</b>	<b>3</b>	<b>3</b>	<b>9</b>	<b>1</b>	<b>6</b>	<b>0</b>
Market analysis and trend information						
1	1	1	0	1	0	1
2	1	0	0	1	1	1
3	0	0	0	0	0	0
<b>Weighted sum</b>	<b>5</b>	<b>3</b>	<b>0</b>	<b>5</b>	<b>2</b>	<b>5</b>
Employee training						
1	0	0	0	0	0	2
2	0	0	1	2	0	1
3	0	1	0	0	1	0
<b>Weighted sum</b>	<b>0</b>	<b>1</b>	<b>2</b>	<b>4</b>	<b>1</b>	<b>8</b>
Grant & funding assistance						
1	0	1	1	0	1	0
2	0	0	0	0	0	0
3	0	1	0	1	1	0
<b>Weighted sum</b>	<b>0</b>	<b>4</b>	<b>3</b>	<b>1</b>	<b>4</b>	<b>0</b>
Regulations						
1	2	0	0	0	1	0
2	0	0	0	0	0	0
3	1	1	0	0	0	0
<b>Weighted sum</b>	<b>7</b>	<b>1</b>	<b>0</b>	<b>0</b>	<b>3</b>	<b>0</b>
Financial planning and management						
1	0	0	0	0	1	0
2	0	1	0	0	0	0
3	1	0	0	0	0	0
<b>Weighted sum</b>	<b>1</b>	<b>2</b>	<b>0</b>	<b>0</b>	<b>3</b>	<b>0</b>
Networking and collaborating with others						
1	0	1	0	0	0	0
2	1	0	0	0	0	0
3	1	0	0	0	2	0
<b>Weighted sum</b>	<b>3</b>	<b>3</b>	<b>0</b>	<b>0</b>	<b>2</b>	<b>0</b>
Small farm management						
1	1	0	0	0	0	0
2	0	0	0	0	0	0
3	0	0	0	0	0	0
<b>Weighted sum</b>	<b>3</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>
Succession planning						
1	0	0	0	0	0	0
2	1	0	0	0	1	0
3	0	0	0	0	0	0
<b>Weighted sum</b>	<b>2</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>2</b>	<b>0</b>

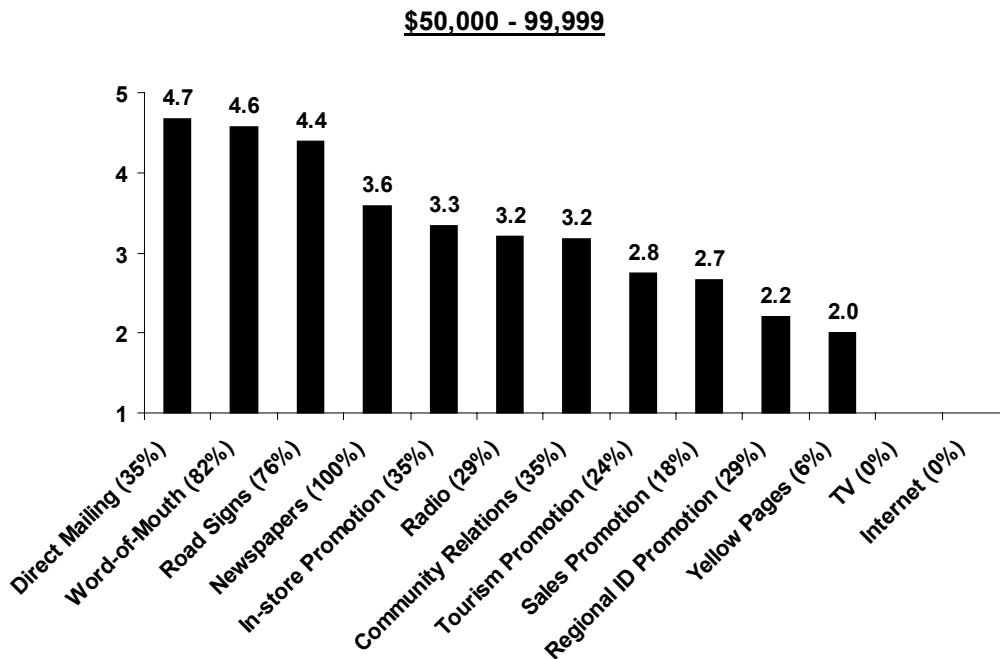
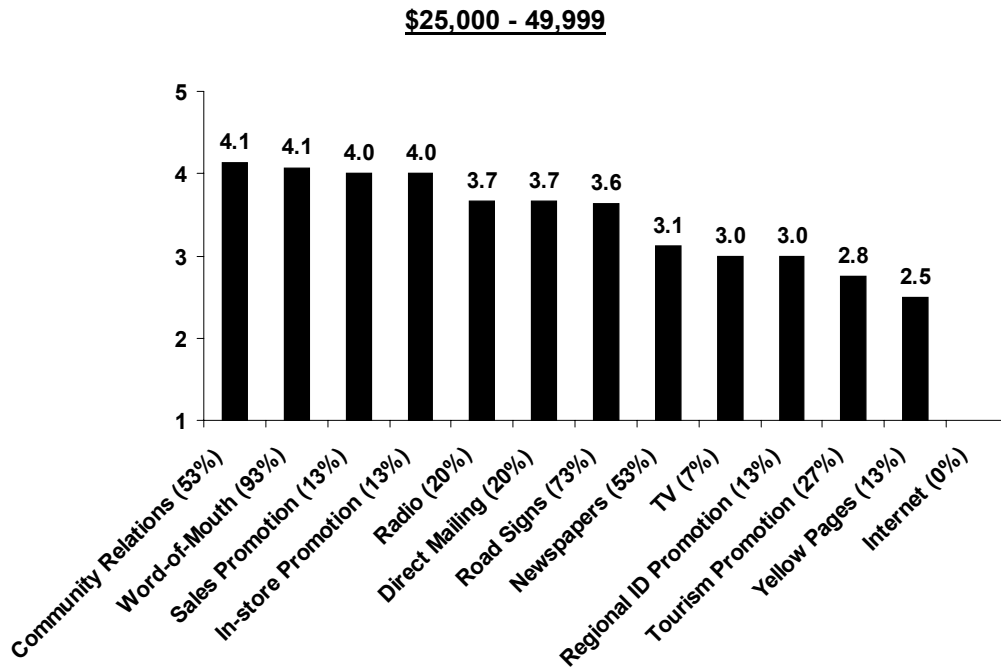
\* Weighted sum was calculated by 3 \* number of rank 1 + 2 \* number of rank 2 + 1 \* number of rank 3.

**Figure V-1. Effectiveness of Different Marketing Tools\*, by Retail Sales**



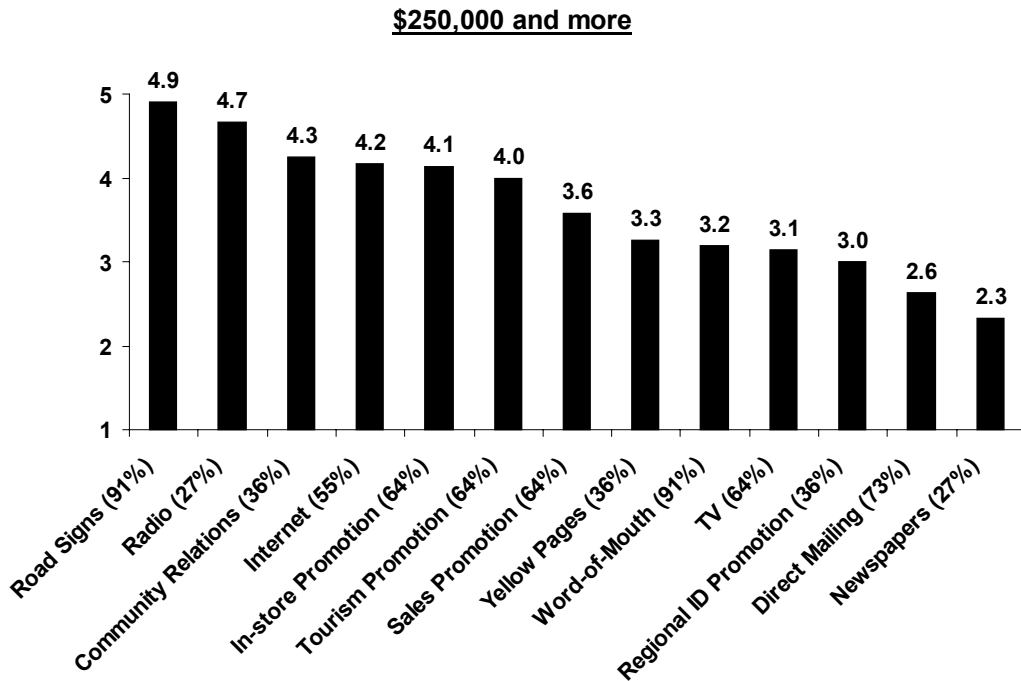
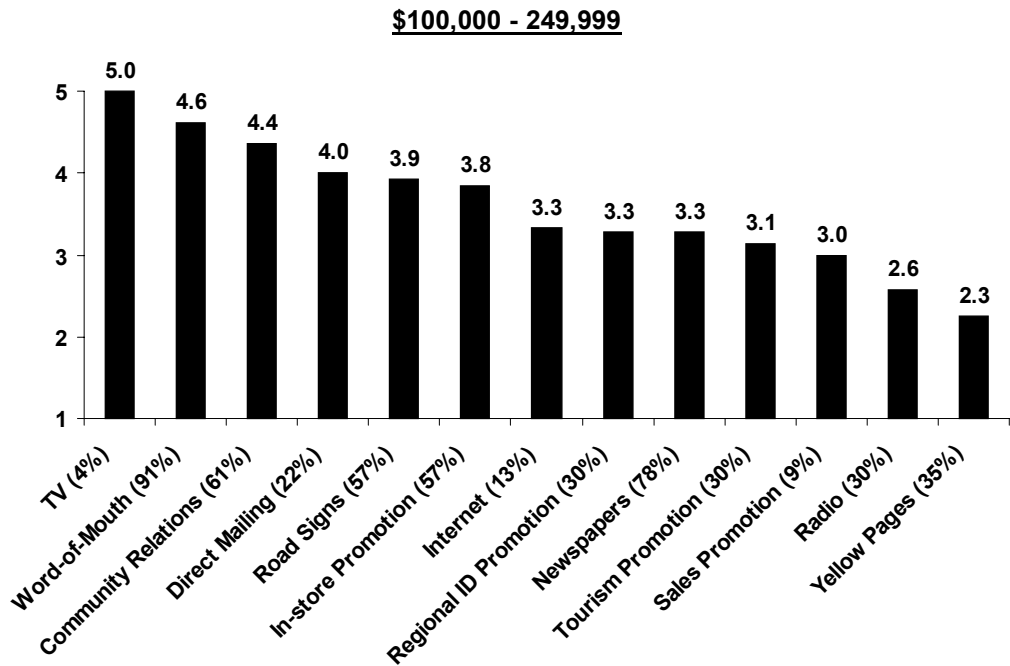
\*On a scale of 1 to 5, where 1 is not effective and 5 is very effective. Percentage of respondents in parentheses ( ).

**Figure V-2. Effectiveness of Different Marketing Tools\*, by Retail Sales**



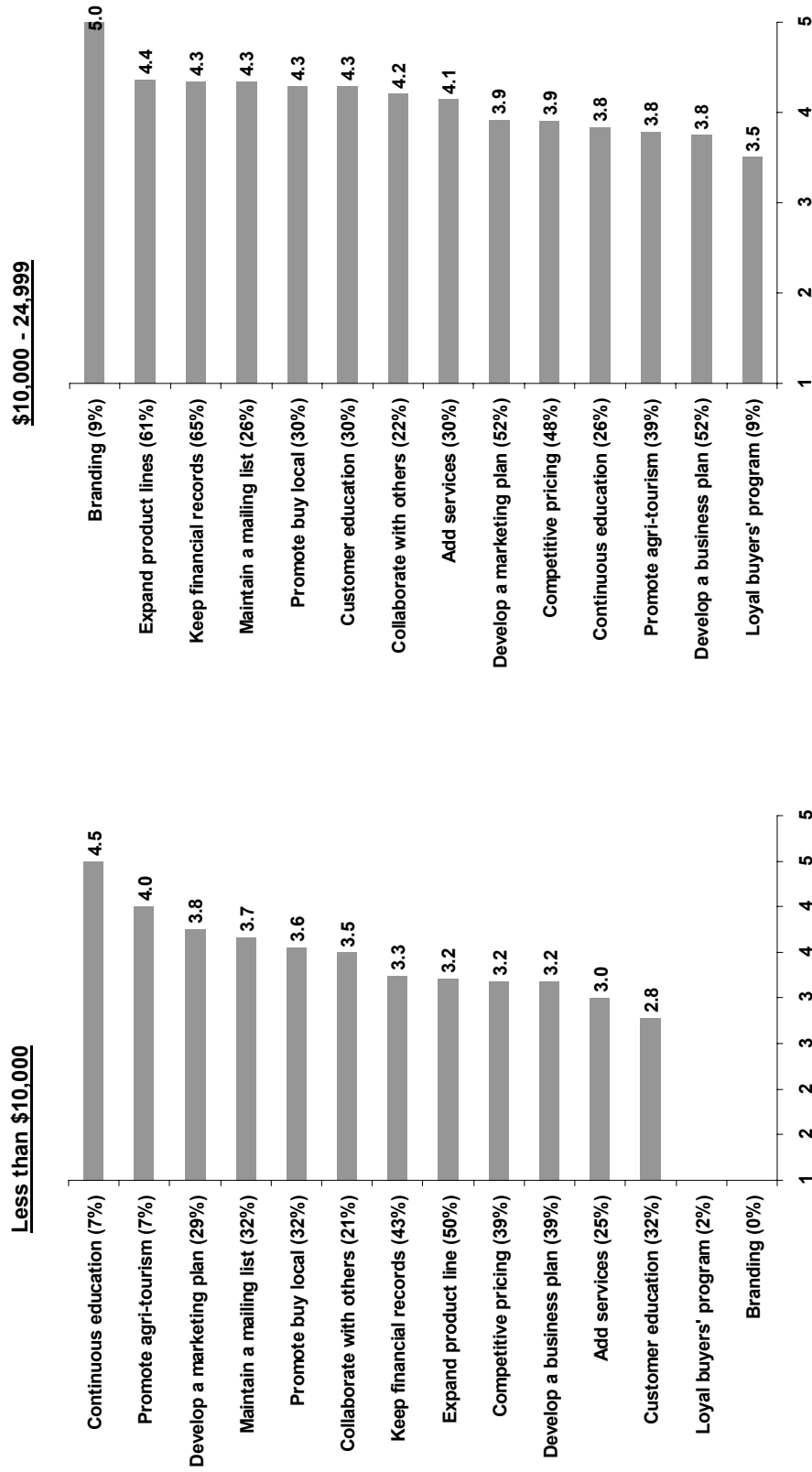
\*On a scale of 1 to 5, where 1 is not effective and 5 is very effective. Percentage of respondents in parentheses ( ).

**Figure V-3. Effectiveness of Different Marketing Tools\*, by Retail Sales**



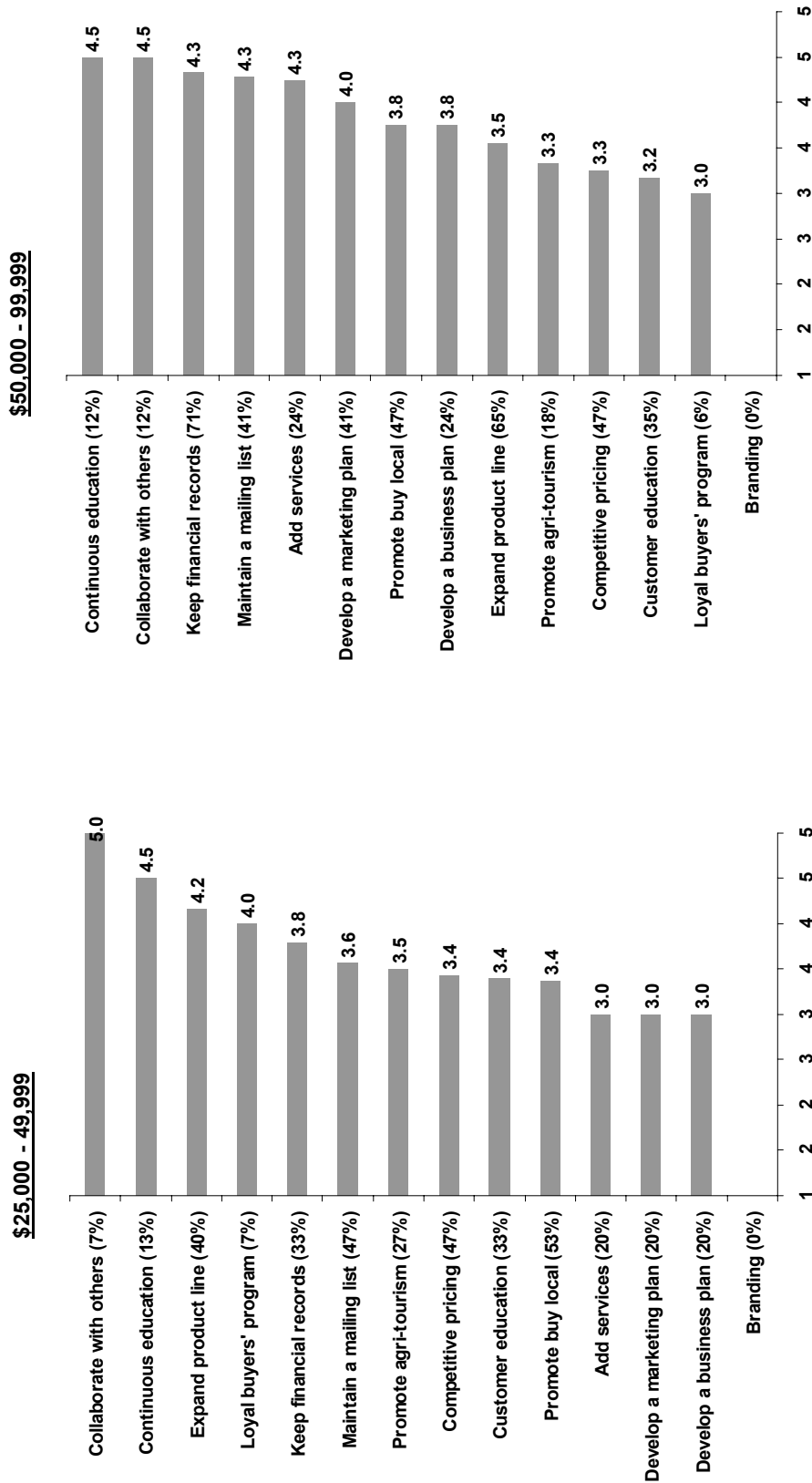
\*On a scale of 1 to 5, where 1 is not effective and 5 is very effective. Percentage of respondents in parentheses ( ).

**Figure V-4. Effectiveness of Business Management Strategies, by Retail Sales**



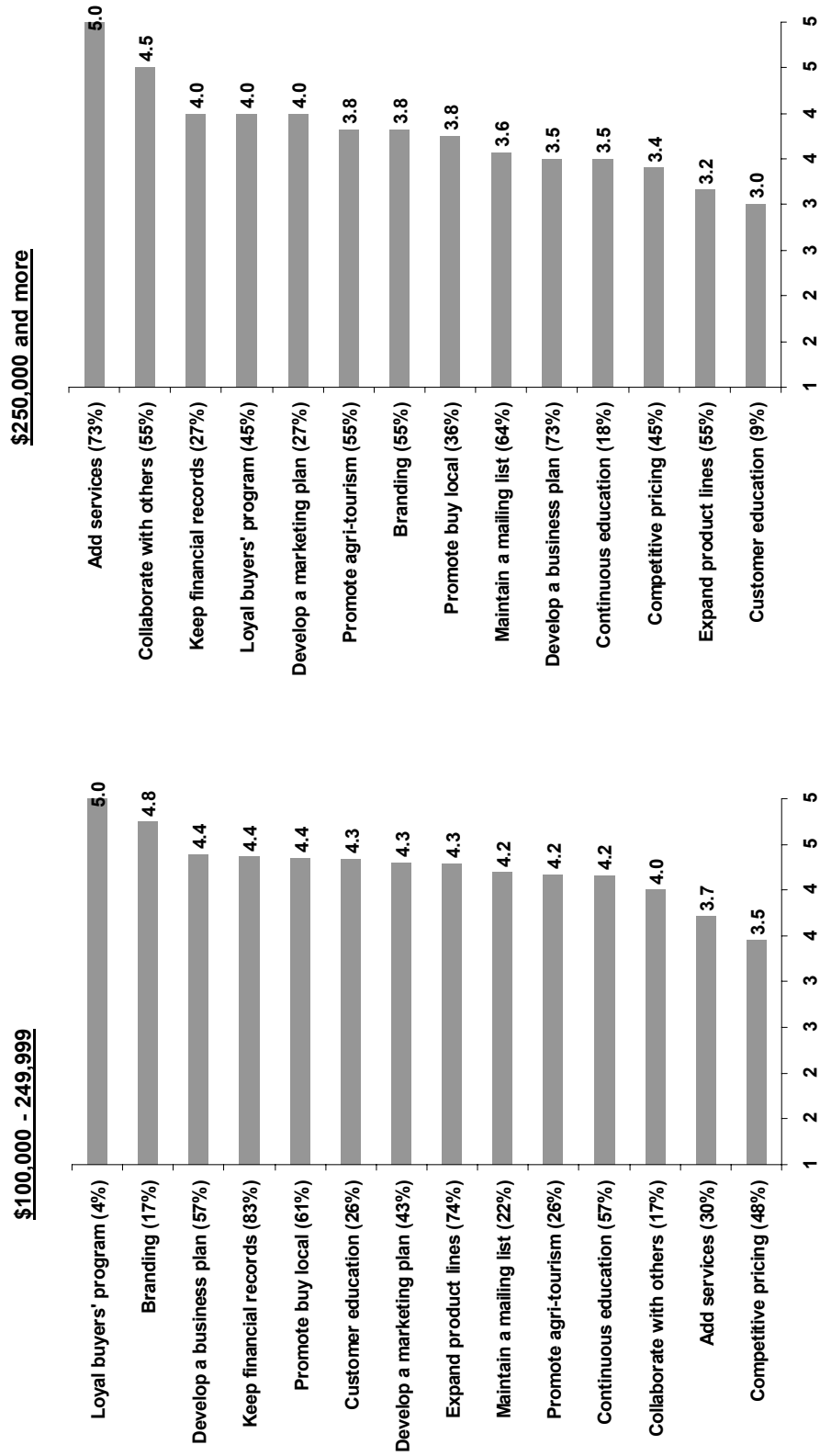
\*On a scale of 1 to 5, where 1 is not effective and 5 is very effective. Percentage of respondents in parentheses ( ).

**Figure V-5. Effectiveness of Business Management Strategies, by Retail Sales**



\*On a scale of 1 to 5, where 1 is not effective and 5 is very effective. Percentage of respondents in parentheses ( ).

**Figure V-6. Effectiveness of Business Management Strategies, by Retail Sales**



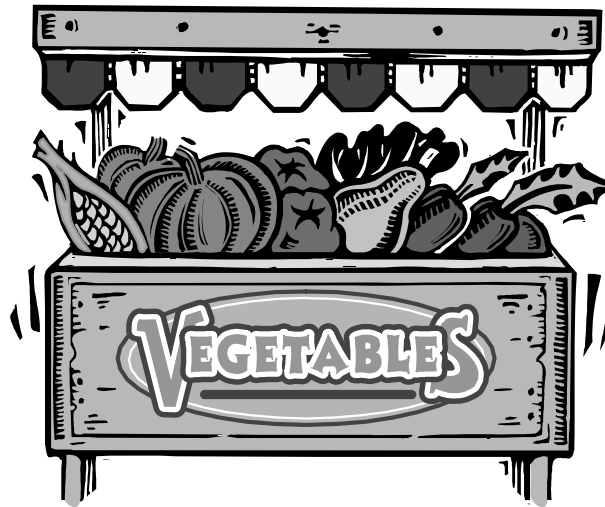
\*On a scale of 1 to 5, where 1 is not effective and 5 is very effective. Percentage of respondents in parentheses ( ).





## **APPENDIX B -- SURVEY INSTRUMENT**

# **New York Vegetable Grower Direct Marketing Survey**



January 2001

This project is sponsored by

Horticultural Business Management and Marketing Program  
Department of Applied Economics and Management  
Cornell University

New York State Vegetable Growers Association

New York State Farmers Direct Marketing Association

This survey is part of a study to assess the economic importance and complexity of direct marketing activities performed by New York vegetable growers and their importance to New York's economy.

- ***Confidentiality is guaranteed.***
- Please include all the direct retailing to consumer activities on your farm in **2000**.
- Please provide your **best estimates** if book figures are not available.
- Please return the questionnaire in the ready-to-mail envelope.

1. What crops did you produce on your farm in 2000?

<p>√ <b>ALL</b> that apply</p> <p>____ Vegetables</p> <p>____ Fruits and berries</p> <p>____ Nursery and greenhouse crops</p> <p>____ <b>Others: please specify</b> _____</p>	<p><b><u>Production total</u></b></p> <p>_____ acres</p> <p>_____ acres</p> <p>_____ ft<sup>2</sup> or acres</p> <p>_____</p>
---	---

2. Do you retail directly to consumers (including roadside markets, pick-your-own operations, farmers' markets, etc.)?

Please check one:            Yes \_\_\_\_\_    No \_\_\_\_\_

**\* IF NO, please stop here and return the survey.**

**\* IF YES, please continue.**

**Thank you.**



1. The county where your farm is located: \_\_\_\_\_
2. The county(ies) where you retail to consumers (if different from above):  
\_\_\_\_\_
3. Total years your farm has been involved in direct retailing to consumers: \_\_\_\_\_ years
4. Please **check one** of the following that best indicates your farm's total annual gross sales in 2000 (include all sales - wholesale, retail sales and purchased for resale).
 

____ Under \$10,000	____ \$500,000 - \$749,999
____ \$10,000 - \$49,999	____ \$750,000 - \$999,999
____ \$50,000 - \$99,999	____ \$1,000,000 - \$2,499,999
____ \$100,000 - \$249,999	____ \$2,500,000 - \$4,999,999
____ \$250,000 - \$499,999	____ Over \$5,000,000

5. Please indicate ALL of the marketing methods that describe your operations in 2000:

	<i><b>% of total farm sales</b></i>
<b><u>Wholesale:</u></b>	
Supermarkets & grocery stores	_____ %
Other retail farm markets	_____ %
Food service (restaurants, etc.)	_____ %
Other outlets (shipper/packer, broker, processor, etc.)	_____ %
<b><u>Direct retail to consumers:</u></b>	_____ %
	<b>100%</b>

***Please consider the following questions based on your retail operation only.***

6. How would you describe your **retail** location(s)? (Check ALL that apply)

- \_\_\_\_\_ Urban (a central city area with populations of at least 50,000 or more and a density of at least 1,000 people per square mile)
- \_\_\_\_\_ Suburb: \_\_\_\_\_ miles to the closest central city area (population of 50,000 +)
- \_\_\_\_\_ Rural: \_\_\_\_\_ miles to the closest population center (population of 5,000 +)
- \_\_\_\_\_ Near or at a tourist region
- \_\_\_\_\_ Off a major U.S. interstate or state highway: \_\_\_\_\_ miles off the highway

7. What is the size of your total retail area? \_\_\_\_\_ *ft<sup>2</sup> or acres*  
 What were your total retail sales in 2000? \$ \_\_\_\_\_

8. Please describe the seasonality of your retail operation:

***Monthly retail sales as % of total retail sales (Total = 100%)***

_____ % Jan.	_____ % May	_____ % Sept.
_____ % Feb.	_____ % June	_____ % Oct.
_____ % March	_____ % July	_____ % Nov.
_____ % April	_____ % August	_____ % Dec.

9. Please indicate ALL the products you **retailed** direct to consumers in 2000:

<input checked="" type="checkbox"/> <b>ALL that apply</b>	<b>Annual gross sales</b>	<b>% Purchased for resale</b>
<input type="checkbox"/> Fresh vegetables (including potatoes)	\$ _____	⇒ _____ %
<input type="checkbox"/> Fresh fruits, berries & melons	\$ _____	⇒ _____ %
<input type="checkbox"/> Nursery and greenhouse crops (bedding and potted plants, flowers, trees, etc.)	\$ _____	⇒ _____ %
<input type="checkbox"/> Pumpkins	\$ _____	⇒ _____ %
<input type="checkbox"/> Christmas trees	\$ _____	⇒ _____ %
<input type="checkbox"/> Meat, poultry and eggs	\$ _____	⇒ _____ %
<input type="checkbox"/> Dairy products (milk, cheese, etc.)	\$ _____	⇒ _____ %
<input type="checkbox"/> Valued-added/processed food products (Cider, juice, wine, preserves, honey, maple products, snack food, etc.)	\$ _____	⇒ _____ %
<input type="checkbox"/> Baked goods	\$ _____	⇒ _____ %
<input type="checkbox"/> Ice cream	\$ _____	⇒ _____ %
<input type="checkbox"/> Gift and other gardening accessories	\$ _____	⇒ _____ %
<input type="checkbox"/> <b>Others: please specify</b> _____	\$ _____	⇒ _____ %

10. Please check and describe all direct marketing methods used in your operation in 2000:

<input checked="" type="checkbox"/> <b>ALL that apply</b>	<b>Annual gross sales</b>
<input type="checkbox"/> Retail farm store, roadside stand	\$ _____
<input type="checkbox"/> Entertainment activities: farm tours, hay rides, petting zoo, festivals, parties, etc.	\$ _____
<input type="checkbox"/> Pick-your-own fields	\$ _____
<input type="checkbox"/> Restaurant/café/deli	\$ _____
<input type="checkbox"/> Catalog sales	\$ _____
<input type="checkbox"/> Internet sales	\$ _____
<input type="checkbox"/> Community supported agriculture (CSA)	\$ _____
<input type="checkbox"/> Farmers' market stands (_____ times/wk.)	\$ _____
<input type="checkbox"/> <b>Others- please specify:</b> _____	\$ _____

11. Please check which direct marketing aspects are included in your retail business and indicate their importance to your operation. (1=not important; 5=very important.)

√ **ALL that apply**

	<b>Circle One</b>				
	<i>Not important</i>			<i>Very important</i>	
<input type="checkbox"/> Fresh farm product market: vegetables, fruits, meat, dairy, etc.	1	2	3	4	5
<input type="checkbox"/> Processed & value-added food market	1	2	3	4	5
<input type="checkbox"/> Organic products	1	2	3	4	5
<input type="checkbox"/> Garden center: bedding & garden plants	1	2	3	4	5
<input type="checkbox"/> Pumpkin and christmas tree sales	1	2	3	4	5
<input type="checkbox"/> Bakery	1	2	3	4	5
<input type="checkbox"/> Ice cream stand	1	2	3	4	5
<input type="checkbox"/> Gardening accessory and gift shop	1	2	3	4	5
<input type="checkbox"/> Entertainment activities: farm tours, hay rides, petting zoo, festivals, parties, etc.	1	2	3	4	5
<input type="checkbox"/> Pick-your-own fields	1	2	3	4	5
<input type="checkbox"/> Restaurant/café/deli	1	2	3	4	5
<input type="checkbox"/> Catalog sales	1	2	3	4	5
<input type="checkbox"/> Internet sales	1	2	3	4	5
<input type="checkbox"/> Community supported agriculture (CSA)	1	2	3	4	5
<input type="checkbox"/> Farmers' market stands	1	2	3	4	5

12. Please indicate the months each department is in operation.

√ **ALL that apply**

	<i>Months in operation (month) - (month)</i>
<input type="checkbox"/> Fresh farm product market: vegetables, fruits, meat, dairy, etc.	_____ - _____
<input type="checkbox"/> Processed & value-added food market	_____ - _____
<input type="checkbox"/> Garden center: bedding & garden plants	_____ - _____
<input type="checkbox"/> Pumpkin and christmas tree sales	_____ - _____
<input type="checkbox"/> Bakery	_____ - _____
<input type="checkbox"/> Ice cream stand	_____ - _____
<input type="checkbox"/> Gardening accessory and gift shop	_____ - _____
<input type="checkbox"/> Entertainment activities: farm tours, hay rides, petting zoo, festivals, parties, etc.	_____ - _____
<input type="checkbox"/> Pick-your-own fields	_____ - _____
<input type="checkbox"/> Restaurant/café/deli	_____ - _____
<input type="checkbox"/> Catalog sales	_____ - _____
<input type="checkbox"/> Internet sales	_____ - _____
<input type="checkbox"/> Community supported agriculture (CSA)	_____ - _____
<input type="checkbox"/> Farmers' market stands	_____ - _____

13. How many years has the farm been involved in each direct marketing aspect, and what changes do you foresee for each department in the next five years?

√ **ALL that apply**

	<u>Yrs. in operation</u>	<u>Expected changes in next 5 years (circle one)</u>				
		<u>Start -up</u>	<u>Expand</u>	<u>No change</u>	<u>Reduce</u>	<u>Eliminate</u>
___ Fresh farm product market: veg., fruits, meat, dairy, etc.	___ yrs	1	2	3	4	5
___ Processed & value-added food market	___ yrs	1	2	3	4	5
___ Organic product	___ yrs	1	2	3	4	5
___ Garden center: bedding & garden plants	___ yrs	1	2	3	4	5
___ Pumpkin & christmas tree sales	___ yrs	1	2	3	4	5
___ Bakery	___ yrs	1	2	3	4	5
___ Ice cream stand	___ yrs	1	2	3	4	5
___ Gardening access. & gift shop	___ yrs	1	2	3	4	5
___ Entertainment activities: farm tours, hay rides, petting zoo, festivals, parties, etc.	___ yrs	1	2	3	4	5
___ Pick-your-own fields	___ yrs	1	2	3	4	5
___ Restaurant/café/deli	___ yrs	1	2	3	4	5
___ Catalog sales	___ yrs	1	2	3	4	5
___ Internet sales	___ yrs	1	2	3	4	5
___ Community supported ag (CSA)	___ yrs	1	2	3	4	5
___ Farmers' market stands	___ yrs	1	2	3	4	5
___ Others- please specify: _____	___ yrs	1	2	3	4	5

14. Please indicate which marketing tools you used to promote your direct marketing operation and rate their effectiveness. (Scale: 1 = not effective; 5 = very effective.)

√ **ALL that apply**

	<u>Not effective</u>					<u>Very effective</u>
	1	2	3	4	5	
___ Yellow pages of phone directory	1	2	3	4	5	
___ Newspaper advertising	1	2	3	4	5	
___ TV advertising	1	2	3	4	5	
___ Radio advertising	1	2	3	4	5	
___ Road signs, billboards advertising	1	2	3	4	5	
___ Direct mailing	1	2	3	4	5	
___ Sales promo. (coupons, discounts, etc.)	1	2	3	4	5	
___ Internet (Web-site, e-mail)	1	2	3	4	5	
___ In-store promotion (free samples, product display & signs, info. brochures)	1	2	3	4	5	
___ Community relations	1	2	3	4	5	

5

14. *Marketing tools (cont.)*

<input checked="" type="checkbox"/> <b>ALL that apply</b>	<b>Not effective</b>			<b>Very effective</b>	
<input type="checkbox"/> Participate in regional/ state-grown promotional programs	1	2	3	4	5
<input type="checkbox"/> Participate in tourism promotional program, i.e. brochures	1	2	3	4	5
<input type="checkbox"/> Word of mouth					
<input type="checkbox"/> Other: please specify _____	1	2	3	4	5

15. What percentage of sales was your promotional budget?

\_\_\_\_\_ % of total retail sales

16. Please indicate the tools you've used to improve the profitability of your retail operation and rate how effective they were. (Scale: 1 = not effective; 5 = very effective.)

<input checked="" type="checkbox"/> <b>ALL that apply</b>	<b>Not effective</b>			<b>Very effective</b>	
<input type="checkbox"/> Developed a business plan	1	2	3	4	5
<input type="checkbox"/> Developed a marketing plan	1	2	3	4	5
<input type="checkbox"/> Expanded product lines (value-added, organic, added new products or varieties, etc.)	1	2	3	4	5
<input type="checkbox"/> Added services (delivery, guarantee, extnd. hrs., etc.)	1	2	3	4	5
<input type="checkbox"/> Competitive pricing	1	2	3	4	5
<input type="checkbox"/> Branding	1	2	3	4	5
<input type="checkbox"/> Utilized frequent buyer's program	1	2	3	4	5
<input type="checkbox"/> Provided customer edu. (newsletter, handouts, etc.)	1	2	3	4	5
<input type="checkbox"/> Maintained a mailing list	1	2	3	4	5
<input type="checkbox"/> Promoted agri-tourism	1	2	3	4	5
<input type="checkbox"/> Collaborated w/other farms & marketers (buying, advertising, etc.)	1	2	3	4	5
<input type="checkbox"/> Promoted "buy locally grown"	1	2	3	4	5
<input type="checkbox"/> Kept financial records and made management decisions based on them	1	2	3	4	5
<input type="checkbox"/> Provided continuous training for mngrs./staff	1	2	3	4	5
<input type="checkbox"/> Other: please specify _____	1	2	3	4	5



17. What are the top three **barriers/problems** facing your retail operation?

*Most important barrier/problem:*

\_\_\_\_\_

*Second:*

\_\_\_\_\_

*Third:*

\_\_\_\_\_

18. What are the top three **opportunities** for the future success of your retail operation?

*Most important opportunity:*

\_\_\_\_\_

*Second:*

\_\_\_\_\_

*Third:*

\_\_\_\_\_

19. What are the top three **training or publication topics** you would like to see available to you and your employees to help you market successfully.

*Most important topic:*

\_\_\_\_\_

*Second:*

\_\_\_\_\_

*Third:*

\_\_\_\_\_

20. Other comments:

**Thank you very much for your assistance. Please return this survey, in the envelope provided, to :**

Dr. Wen-fei Uva  
Department of Applied Economics and Management  
456 Warren Hall  
Cornell University  
Ithaca, New York 14853-7801

**OTHER A.E.M. RESEARCH BULLETINS**

<b>RB No</b>	<b>Title</b>	<b>Fee (if applicable)</b>	<b>Author(s)</b>
2002-02	Impact of Generic Milk Advertising on New York State Markets, 1986-2000		Kaiser, K. M. and C. Chung
2002-01	What Successful Small Farmers Say: A Series of Reports on a Survey of Successful Small Farm Operators	(\$12.00)	Cuykendall, C., E. LaDue, and R. D. Smith
2001-06	Dairy Farm Management: Business Summary, New York State, 2000	(\$12.00)	Knoblauch, W. A., L. D. Putnam, and J. Karszes
2001-05	Supply Chain Management in the Produce Industry		Perosio, D. J., E. W. McLaughlin, S. Cuellar and K. Park
2001-04	Promotion Checkoffs, Why So Controversial? The Evolution of Generic Advertising Battles		Crespi, J.
2001-03	Community Collaboration Among Small Business Support Organizations: Attributes of Effectiveness		Schlough, C. and D. Streeter
2001-02	Information Technology and Credit Scoring at Agricultural Banks in the Northeast and Eastern Corn Belt		LaDue, E.L., C. Cuykendall, and J. Stokes
2001-01	Identifying the Extensive and Intensive Effects of Generic Advertising on the Household Demand for Fluid Milk and Cheese		Schmit, T., C. Chung, D. Dong, H.M. Kaiser and B. Gould
2000-05	A Multimarketing Analysis of Cashew Production in Mozambique		Kyle, S. and O. Negiz
2000-04	The Decision to Enter Consumer Direct Initiatives by Supermarket Companies	(\$25 ea.)	Park, K. and J.L. Park
2000-03	Business Summary New York State 1999	(\$12 ea.)	Knoblauch, W.A., L.D. Putnam and J. Karszes
2000-02	Impact of Generic Fluid Milk and Cheese Advertising on Dairy Markets, 1984-99		Kaiser, H.

Paper copies are being replaced by electronic Portable Document Files (PDFs). To request PDFs of AEM publications, write to (be sure to include your e-mail address): Publications, Department of Applied Economics and Management, Warren Hall, Cornell University, Ithaca, NY 14853-7801. If a fee is indicated, please include a check or money order made payable to Cornell University for the amount of your purchase. Visit our Web site (<http://aem.cornell.edu/research/resbulletin3.html>) for a more complete list of recent bulletins.