Factors Affecting Consumer Purchases *of* Fall Nursery Products

RALEIGH AREA

Fall 1997 Consumer Survey

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Acknowledgments

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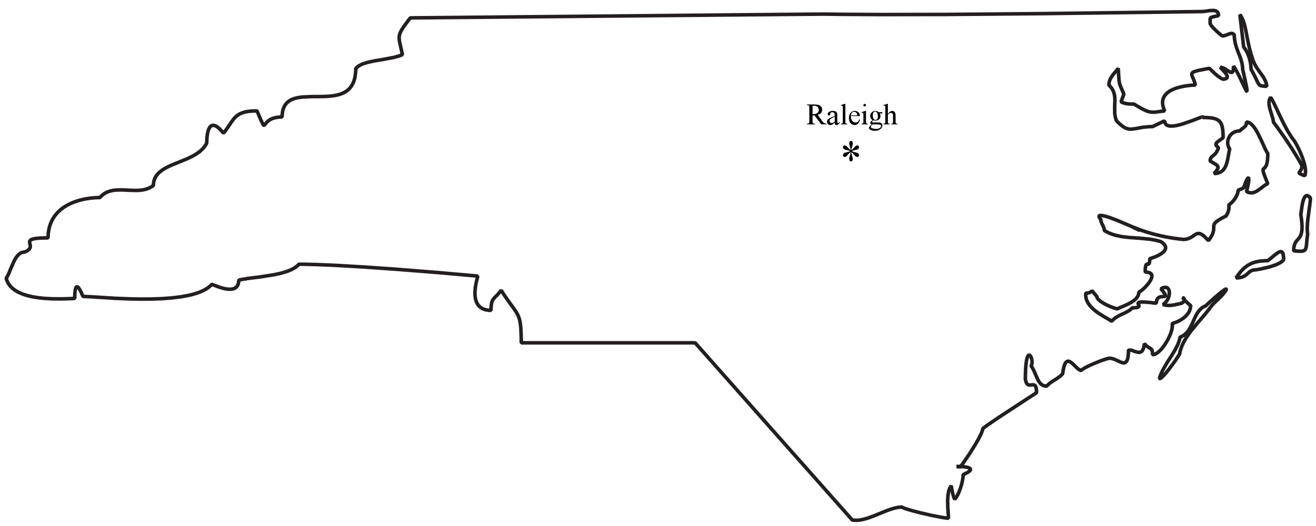
Garden Center Survey Locations



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Introduction

A consumer survey was conducted during the 1996 fall marketing season to assess the effectiveness of advertising programs conducted by retail nursery operators (Safley, Wohlgenant and Rezitis, 1998). Prior to the survey, few, if any, research studies focused on garden center promotion efforts. The specific focus of the 1996 survey and the lack of comparable published findings made it difficult to verify the survey results.

The primary goal of this study was to validate the conclusions and recommendations obtained from the 1996 consumer survey by conducting a follow-up survey in the fall of 1997. In particular, the intent of the study was to corroborate findings and conclusions concerning the effectiveness of advertising and promotional programs conducted by independent garden centers. A second goal was to collect selected data omitted from the earlier survey. For example, several managers asked for recommendations concerning the type of radio station that should be used to promote their business while other operators wanted to know additional information concerning the composition of typical shopping parties. To achieve these goals, three specific study objectives were identified:

1. Determine if repetitive advertising would improve the effectiveness of a garden center's promotional program on influencing customers to shop at a garden center and to purchase specific products.
2. Discover the proportion of garden center customers that subscribe to Raleigh's local newspaper and identify their favorite radio stations.
3. Identify and characterize garden center customers, their purchase intentions and actual purchases.

Methodology

Survey results from 1996 indicated that garden center managers who repeatedly focused advertising on a specific event, such as a storewide sale or a plant festival, recorded the highest response rates. To verify this finding, a manager of an independent garden center in Raleigh, North Carolina permitted researchers to test the survey during the fall festival and storewide sale that he planned for the end of the 1997 marketing season.

The primary type of advertisement the manager planned to use to promote the festival was newspaper ads. He agreed to dedicate a portion of each ad purchased three weeks before the festival to promote this event. In addition, he agreed to increase the amount of the space used to promote the festival at least twice during the test period.

The festival was scheduled for Saturday, November 1st and Sunday, November 2nd, so all ads were published in October. The man-

Figure 1. Garden Center Advertisement Published in the *Raleigh News and Observer* on Saturday, October 11, 1997

Figure 2. Garden Center Advertisement Published in the *Raleigh News and Observer* on Saturday, October 18, 1997.

Figure 3. Garden Center Advertisement Published in the *Raleigh News and Observer* on Saturday, October 25, 1997.

Figure 4. Garden Center Advertisement Published in the *Raleigh News and Observer* on Friday, October 31, 1997.

Note: The figure is not to scale. The size of the advertisement was 2 columns by 10".

ager purchased a total of 50 column inches for four ads published in the *Raleigh News and Observer's* (N&O) home and garden section. The first three ads were 10 column inches and appeared in the N&O's Saturday editions (Figures 1 – 3). The last ad was 20 column inches and was published the Friday before the festival (Figure 4).

The first ad comprised about 7 percent of the total space, including the space allocated for the company logo and address, to promote the festival while the next two ads devoted about 19 percent of the available space. All space in the last advertisement was used to promote the festival and storewide sale. This advertisement listed categories of plants and merchandise available as well as the fact that plant experts would be available for advice. The ad also noted that food and prizes would be given away.

The manager planned to use a sales coupon to help promote the festival. The coupon was to be included in a local "shopping newspaper" the week of October 26th. Unfortunately, a scheduling error resulted in most coupons being distributed the week after the sale with only a limited number available before the festival.

Finally, the manager displayed additional signage along the street in front of the garden center to help promote the fall festival and sale. On the first day of the festival, he added balloons to the signs and a clown was hired to draw passing motorists' attention to the special event.

Similar to previous surveys, the questionnaire was divided into two parts. The first segment was administered before the customers entered the store in order to determine what they intended to buy and what type of advertisement, if any, prompted their visit to the garden center. The second part of the survey was conducted as the customers left the store in order to identify the plants purchased, favorite radio stations, the amount of money spent and obtain consumer socioeconomic characteristics. A total of 172 customers completed entrance interviews, but only 139, or 81 percent, returned to complete the exit survey.

Results and Discussion

Customer Profile

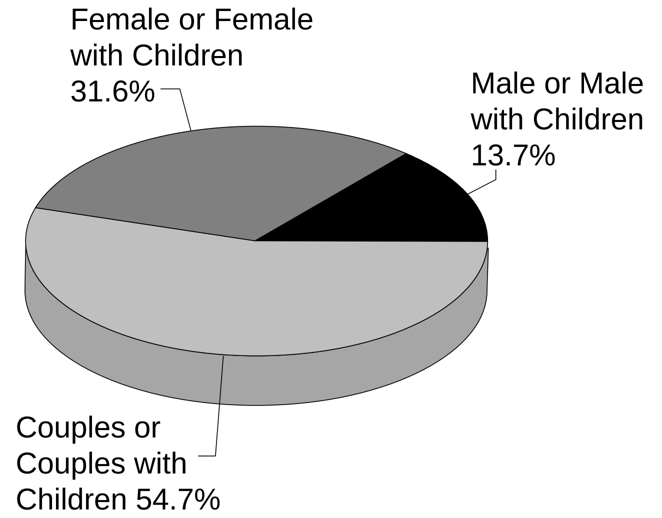
Like previous garden center surveys (Safley and Wohlgenant, 1994 and Safley, Wohlgenant and Rezitis,

Table 1. **Selected Demographic and Residential Information for Surveyed Customers, Fall 1996 and 1997 Survey**

	1997 Survey		1996 Survey
	Frequency	*Percent*	*Percent*
Age:			
Less than 18	0	0.0	0.0
18-24	1	0.7	1.1
25-44	66	47.5	44.8
45-54	35	25.2	25.7
55-64	21	15.1	12.6
65 or older	11	7.9	12.2
Missing Observations	6	3.6	3.6
Household Income:			
Less than $15,000	1	0.7	1.3
$15,000 - $29,999	3	2.2	4.6
$30,000 - $44,999	13	9.4	10.7
$45,000 - $59,999	21	15.1	14.4
$60,000 - $74,999	33	23.7	18.2
$75,000 or more	61	43.9	40.2
Missing Observations	7	5.0	10.6
Adults Working 40 or More Hours Per Week:			
None	15	10.8	15.9
1	55	36.7	42.6
2	66	47.5	39.2
3 - 4	0	0.0	1.4
Missing Observations	7	5.0	0.9
Type of Residence:			
Detached House	134	96.4	94.1
Condo/Apt/Duplex	5	3.6	5.1
Mobile Home	0	0.0	0.1
Missing Observations	0	0.0	0.7
Owner	139	99.3	95.5
Renter	1	0.7	3.7
Missing Observations	0	0.0	0.7
Value of Residence:			
Less than $100,000	6	4.3	25.3
$100,000 - $149,999	47	33.8	26.0
$150,000 - $199,999	42	30.2	31.8
$200,000 or more	43	30.9	11.2
Missing Observations	1	0.7	5.7
Years at Current Residence:			
Less than 5	68	48.9	46.5
5 – 8	31	22.3	17.1
More than 8	40	28.8	35.5
Missing Observations	0	0.0	0.9

1998), the "typical" customer was between 25 and 44 years old, worked 40 or more hours per week, had an annual household income of $75,000 or more and owned a home valued between $150,000 to $199,999 (Table 1). The second largest age group was between 45 to 54 years old and the second most frequent income category was between $60,000 to $74,000 per year.

Composition of Shopping Parties, Fall 1997



Only 12.3 percent of the garden center customers surveyed earned less than $45,000 while 15.1 percent made between $45,000 and $59,999. In addition, 30.9 percent of the customers valued their homes at $200,000 or more and 30.2 percent valued their home between $150,000 and $199,000. Only 4.3 percent of the customers placed the value of their home at less than $100,000. Almost 49 percent of the respondents had lived in their current residence less than 5 years, while over 29 percent lived in their homes more than 8 years and 22.3 percent had lived in their homes between 5 and 8 years. The vast majority of these dwellings were single detached houses and were owned by the customer.

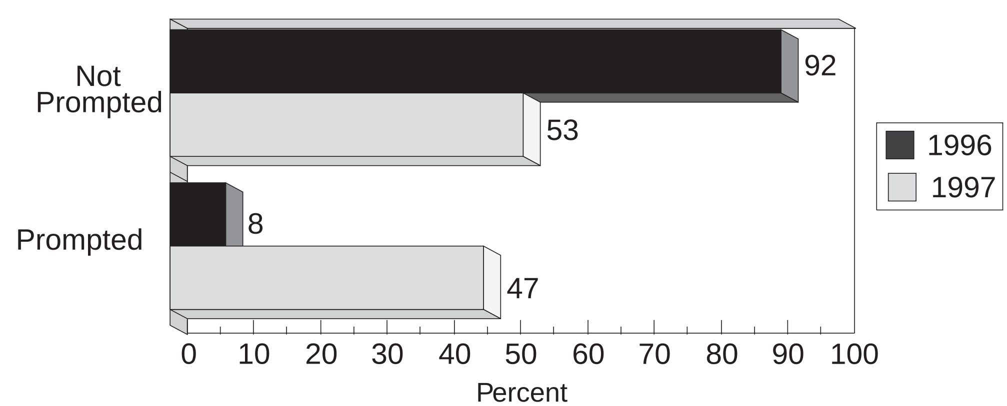
Most of the shopping parties, 54.7 percent, were couples either shopping alone or with children. Females or females shopping with children, comprised 31.6 percent of the shoppers while males or males with children, accounted for 13.7 percent.

Factors Influencing Garden Center Selection

When asked what prompted their visit to the garden center, 47.1 percent of the respondents said that advertising influenced their decision. This was significantly higher than the 8.4 percent of the customers in the 1996 survey who said their shopping trip was influenced by an ad. The percentage of customers whose shopping decision was not influenced by advertising in this survey was 52.9 percent compared to 91.6 percent in 1996.

Each customer whose visit was not motivated by advertising was presented a list of possible reasons for selecting a garden center. They were asked to select the primary reason that influenced their decision to stop at the business. Approximately one in four shoppers (24 per-

Customers Whose Visit Was Prompted by the Garden Center's Advertisement



cent) selected the store's large selection of plant material as the main reason for choosing the garden center (Table 2). Convenient location was the second most important reason, chosen by 18.7 percent of the consumers, while referrals by family members or friends was third, picked by 17.6 percent.

Customers who happened to be driving by the store and decided to stop was the fourth most important reason, accounting for 15.4 percent of the shoppers. This response was significantly higher than the previous North Carolina surveys where 3.6 and 6.2 percent of the customers were driving by and decided to stop. Plant quality and service tied for the fifth most important factor, influencing the shopping decision of 4.4 percent of the consumers. Two people went to the garden looking for free advice while one person said that the hours of operation influenced his decision.

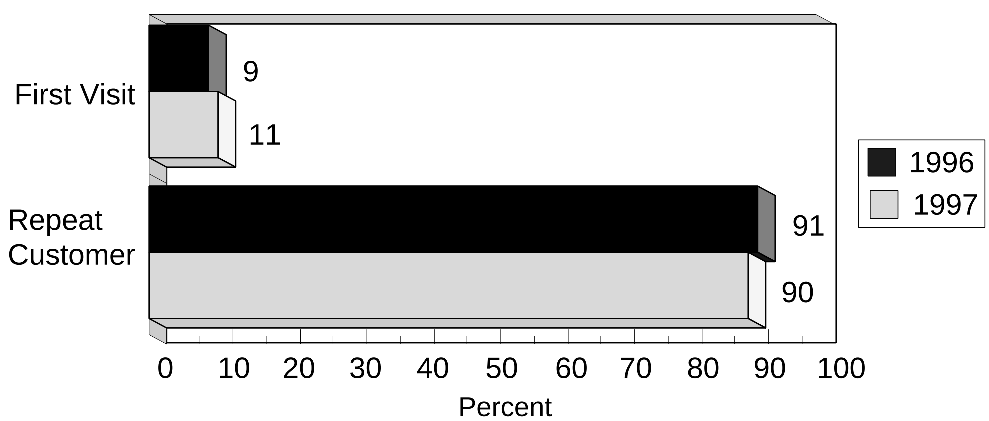
Table 2. **Reasons Customers Visit Garden Centers When Not Prompted by an Advertisement**

	Percent	
Plant Selection	24.2	14.5
Convenient Location	18.7	35.1
Referral by Friend	17.6	10.2
Drove By & Decided to Stop	15.4	3.6
Plant Quality	4.4	15.0
Customer Service	4.4	8.3
Free Advice or Information	2.2	1.0
Hours of Operation	1.1	0.0
Regular Customer	0.0	5.0
Likes Owner or Employees	0.0	2.7
Plant prices	0.0	1.1
Other	12.1	3.5

Note: *The Triad marketing area includes Greensboro, Winston-Salem and High Point, North Carolina.*

Overall, only 10.5 percent of the customers said they were visiting the garden center for the first time and 89.5 percent were repeat shoppers. This is similar to the 1996 survey where 9 percent of the shoppers were visiting the store for the first time and 91 percent were repeat customers.

Customers Visits to Garden Center, Fall 1996, 1997



Advertising Effectiveness

Almost 8 percent of the survey respondents subscribed to the *Raleigh News and Observer* (Table 3). Consequently, it was not surprising that newspaper advertisements had the largest impact, prompting 53.2 percent of the interviewed customers to visit the garden center. Newsletters, published before the study period, influenced another 2.9 percent of the shoppers. One person responded to the sales coupon included in the shopping newspaper and the store's outdoor signs influenced another. One customer said he remembered a radio advertisement even though radio ads were not used during the study period.

Overall, 36 percent of the customers said the information about the plant sale in the advertisements had the largest impact on their decision to shop at the garden center (Table 4).

Garden Center Customers Who Subscribed to the *News and Observer*, 1997

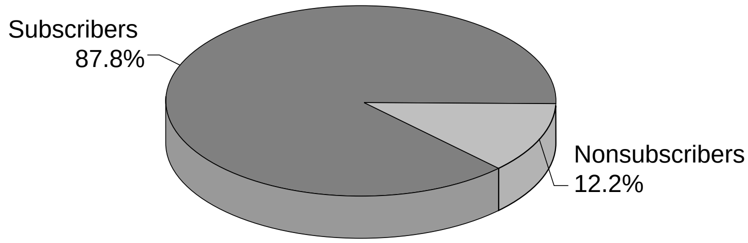


Table 3. Customer Response Rate by Type of Advertisement

Type of Advertisement	Customers Who Responded to an Advertisement		Total Customers Interviewed
	Number	*Percent*	*Percent*
Newspaper Advertisement	74	91.4	53.2
Newsletters	4	4.9	2.9
Radio Advertisement	1	1.2	0.7
Sign or Billboard	1	1.2	0.7
Sales Coupon	1	1.2	0.7
Yellow Pages Advertisement	0	0.0	0.0
Sign or Billboard	0	0.0	0.0

The storewide sale persuaded another 3.6 percent of the shoppers to visit the store while both plant selection and the information about the fall festival convinced 2.9 percent of the shoppers to visit the store.

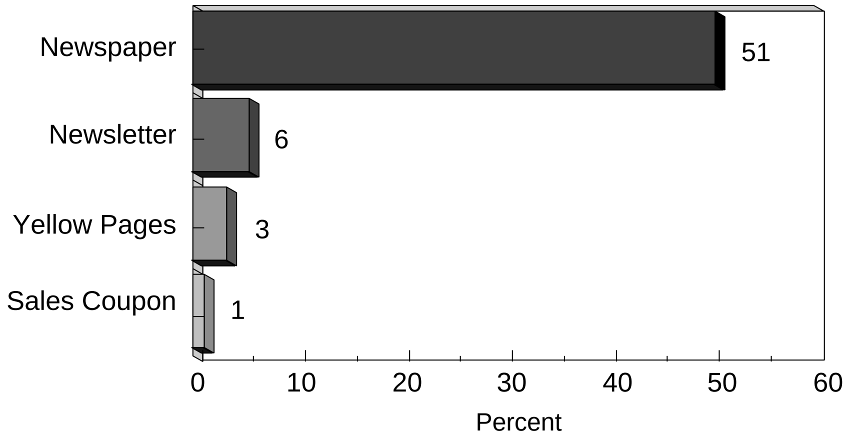
Table 4. Information in the Advertisement that Attracted Customers to the Garden Center

Information in the Advertisement	Customers Who Responded to an Advertisement		Total Customers Interviewed
	Number	*Percent*	*Percent*
Plant Sale	50	61.7	36.0
Storewide Sale	5	6.2	3.6
Plant Selection	4	4.9	2.9
Fall Festival	4	4.9	2.9
Plant Prices	2	2.5	1.4
Seminar or Workshop	2	2.5	1.4
Bird House & Bird Seed	2	2.5	1.4
Sales Coupon	1	1.2	0.7
Hardware sale	1	1.2	0.7
Hours of Operation	1	1.2	0.7
Supply Sale	1	1.2	0.7
Rock sale	1	1.2	0.7
Other	7	8.6	5.0

Customers who said their shopping trip was not influenced by advertising were asked if they remembered seeing any advertisement within the last month promoting the garden center. Slightly more than 57 percent of the customers could recall at least one advertisement while almost 43 percent could not remember a specific ad.

Newspaper advertisements also had the highest recall rate with half of the shoppers (50.5 percent) remembering the ads. Another 5.5 percent of the customers could recall the garden center's fall newsletter they had received in the mail and the store's yellow pages advertisement was remembered by 3.3 percent of the respondents. Only one shopper could remember the sales coupon in the shopping newspaper.

Type of Advertisement Recalled by Customers



Radio Stations

As was previously discussed one goal of this survey was to determine the types of radio stations listened to by the garden center customers (Table 5). During the entrance interviews, the 172 respondents said they listened to a total of 27 different radio stations, 19 FM stations and 8 AM stations. The top radio station was WRAL FM, which plays soft rock and was listened to by 22.6 percent of the customers. The second most popular station was WUNC FM and accounted for 16.7 percent of the customers. WUNC FM is the local public radio station and does not sell advertising, however local businesses can make donations to sponsor specific shows.

WDCG FM, which plays contemporary music, was listened to by 14.5 percent of the customers while WPTF AM, the only talk radio station that was listed in the top ten, was a favorite of 12.8 percent of the shoppers. WCPE FM, a classical music radio station, was the fifth most popular station accounting for 12.2 percent of the respondents.

Table 5. **Top Ten Radio Stations Listened to by the Garden Center Customers**

Radio Station	Type of Station	Number	Percentage
WRAL FM	Soft Rock	39	22.6
WUNC FM	Public Radio	29	16.7
WDCG FM	Contemporary	25	14.5
WPTF AM	Talk Radio	22	12.8
WCPE FM	Classical Music	21	12.2
WRTG FM	Oldies	16	9.3
WRDU FM	Classic Rock	16	9.3
WRSN FM	Classic Rock	11	6.4
WQDR FM	Country	9	5.2
WKIX FM	Country	8	4.7

Overall, slightly more than 47 percent of the customers listened to a total of 8 radio stations that played oldies and soft rock music. Public service and classical music stations, as a group, was the second most popular type of radio station listened to by 31.4 percent of the respondents. Contemporary and talk radio were the third and fourth most popular with 16.3 and 15.1 percent, respectively, of the shoppers listing these types of radio stations. Country music stations were listed by 10.5 percent of the consumers while 7.6 percent of the customers said that they did not listen to any radio station.

Talk radio had the oldest listeners with an average age of 51.2 years old while contemporary radio had the youngest audience with an average age of 40.8 years old (Table 12). Public service and classical radio stations had the second oldest listeners, 46.5 years old, and classic rock stations had the second youngest audience, 41.75 years old.

Almost 62 percent of the customers who listened to talk radio had an annual household

Type of Radio Stations Listened to by Garden Center Customers, Fall 1997

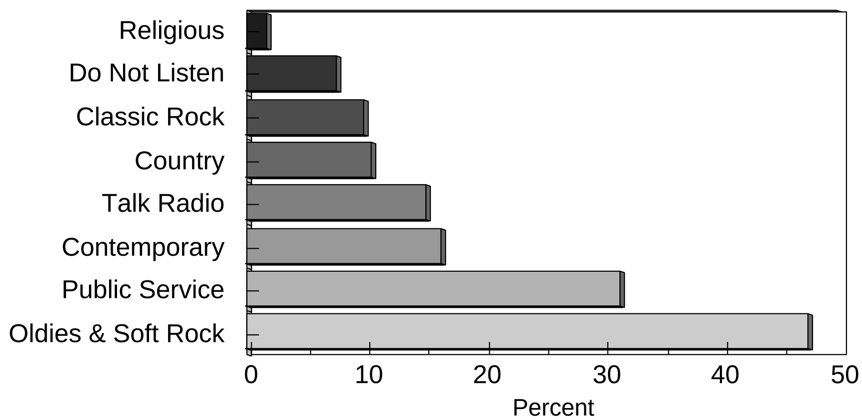


Table 6. **Selected Demographic and Residential Information for Surveyed Customers by Type of Radio Station**

	Oldies & Soft Rock	Public Service & Classical	Contemporary	Talk Radio	Country	Classic Rock
			Percent			
Age:						
Less than 18	0.0	0.0	0.0	0.0	0.0	0.0
18-24	0.0	0.0	0.0	0.0	0.0	0.0
25-44	50.7	25.6	79.1	28.6	31.2	66.7
45-54	26.9	35.9	16.7	42.9	50.0	20.0
55-64	16.4	25.6	0.0	23.8	18.8	6.7
65 or older	6.0	12.8	4.2	4.7	0.0	6.7
Average Age	43.4	46.5	40.8	51.2	45.0	41.75
Household Income:						
Less than $15,000	1.5	0.0	4.2	0.0	0.0	6.7
$15,000 - $29,999	1.5	2.6	0.0	0.0	12.5	6.7
$30,000 - $44,999	10.4	15.4	0.0	9.5	0.0	0.0
$45,000 - $59,999	16.4	17.9	12.5	9.5	31.2	6.7
$60,000 - $74,999	20.9	28.2	37.5	19.0	12.5	46.7
$75,000 or more	49.3	35.9	45.8	61.9	43.8	33.5
Adults Working 40 or More Hours Per Week:						
None	13.4	17.9	12.5	23.8	6.2	13.3
1	41.8	41.0	25.0	23.8	56.3	40.0
2	44.8	41.0	62.5	52.4	37.5	46.7
Type of Residence:						
Detached House	98.5	94.9	95.8	100.0	100.0	100.0
Condo/Apt/Duplex	1.5	5.1	4.2	0.0	0.0	0.0
Mobile Home		0.0	0.0	0.0	0.0	0.0
Owner	98.5	97.4	100.0	100.0	100.0	100.0
Renter	1.5	2.6	0.0	0.0	0.0	0.0
Value of Residence:						
Less than $100,000	4.5	7.7	4.2	14.3	0.0	0.0
$100,000 - $149,999	37.3	25.6	33.3	42.9	50.0	46.7
$150,000 - $199,999	32.8	33.3	12.5	23.8	25.0	33.3
$200,000 or more	25.4	33.3	50.0	19.0	25.0	20.0
Years at Current Residence:						
Less than 5	44.8	46.2	50.0	38.1	43.7	73.3
5 or More	55.2	53.8	50.0	61.9	56.3	26.7
Total Exit Interviews	67	39	24	21	16	15

Note: Percentages are based on the number of exit interviews.

income of $75,000 or more compared to a low of 33.5 percent of the customers who liked stations that played classic rock. Country music and public service and classical music stations, on the other hand, had the largest percentage of customers who earned less than $60,000, 43.7 percent and 35.9 percent, respectively.

Talk radio and public service and classical music stations were listened to by the largest percentage of retirees accounting for 23.8 and 17.9 percent, respectively, of these customers. Contemporary radio stations had the highest percentage of households comprised of two working adults, 62.5 percent, while country music stations accounted for the largest percentage of homes where only one adult worked 40 or more hours per week, 56.3 percent.

Over 57 percent of the customers who listened to talk radio and half of the shoppers who favored country music stations owned homes that were valued less than $150,000. Fifty percent of the shoppers who enjoyed contemporary radio stations, on the other hand, owned residences valued at $200,000 or more.

Purchases of Plants and Supplies

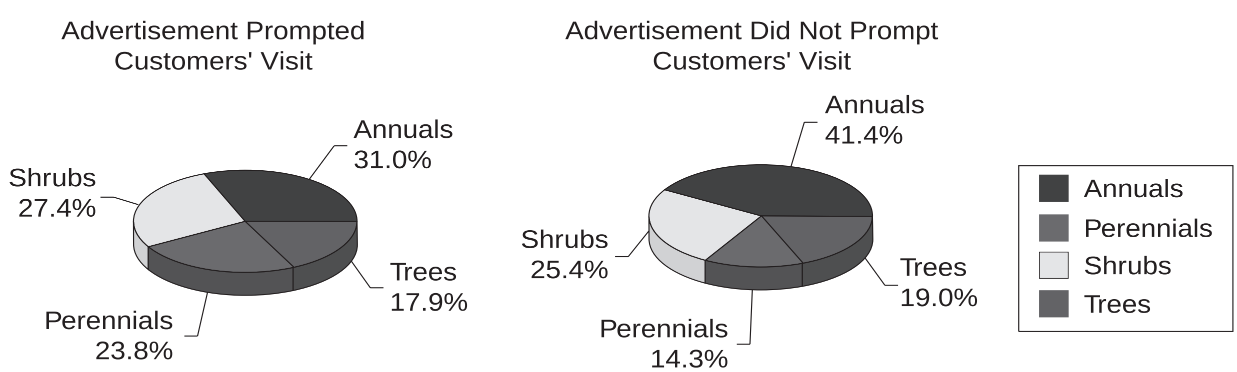
As expected, most consumers went to the garden center to buy plants. Specifically, 32.6 percent wanted to buy annuals, 22.7 percent wanted to purchase shrubs, 18.0 percent wanted to buy perennials and 16.3 percent wanted to purchase trees (Table 7). Another 20.9 percent of the customers were browsing, 9.9 percent were shopping for gardening supplies and 5.8 percent were seeking information. Only 3.5 percent of the shoppers were looking for hardware and 1.7 percent wanted to buy grass seed or stones.

A higher percentage of the customers who responded to an advertisement in this study came to the garden center to buy shrubs, perennials or trees compared to those who said they were not influenced by an ad. More customers whose shopping trip was not inspired by an advertisement expected to purchase annuals.

Table 7. **Primary Purpose Customers Visited the Garden Center**

Purpose of Visit	1997 Survey		1996 Survey
	Number	*Percent*	*Percent*
Purchase Annuals	56	32.6	28.3
Purchase Shrubs	39	22.7	16.7
Browse	36	20.9	19.1
Purchase Perennials	31	18.0	23.5
Purchase Trees	28	16.3	7.7
Purchase Supplies	17	9.9	11.1
Looking for Information	10	5.8	3.5
Purchase Hardware	6	3.5	0.9
Purchase Grass Seed	3	1.7	8.9
Purchase Stones	3	1.7	N/A
Purchase Bulbs	2	1.2	N/A
Purchase Gifts/Presents	2	1.2	N/A
Fall Festival	2	1.2	N/A
Compare Prices	1	0.6	1.8
Other	13	7.6	N/A

Purchase Intentions of Garden Center Customers, Fall 1997



When entering the garden center, 133 customers anticipated buying plants (Table 8) [4]. Exit interviews, however, revealed that 119 customers actually purchased plants. Like the 1996 survey, ground covers had the largest increase between anticipated and actual purchases. No one expected to buy ground covers but 12 shoppers in fact bought this type of plant. Bulbs accounted for the second greatest gain with 11 shoppers deciding to buy bulbs after entering the store. Perennials experienced the largest reduction with a net decrease of 13 customers deciding not to buy this type of plant.

Table 8. **Types of Plants Customers Anticipated Buying Compared to the Types of Plants They Actually Purchased**

Type of Plant	Anticipated Purchases			Actual Purchases			Difference
	Ad Prompted Visit	Ad Did Not Prompt Visit	Total	Ad Prompted Visit	Ad Did Not Prompt Visit	Total	
Annuals	21	26	47	18	22	40	- 7
Perennials	16	9	25	6	6	12	- 13
Shrubs	18	16	34	14	12	26	- 8
Trees	12	12	24	6	7	13	- 11
Ground Covers	0	0	0	7	5	12	+ 12
House Plants	0	0	0	0	2	2	+ 2
Bulbs	1	2	3	8	6	14	+ 11
Total	68	65	133	59	60	119	- 14

Notes:Difference = Actual purchases - Anticipated purchases.

Annuals were bought by 40 customers and were easily the “best selling” type of plants purchased during this study (Table 9). Shrubs accounted for the second largest number of sales with 26 consumers and bulbs ranked third with purchases by 14 shoppers. Thirteen, 12, and 12 customers bought trees, ground covers and perennials, respectively. Only two people purchased houseplants.

Table 9. **Types of Plants Consumers Actually Purchased**

Type of Plant	Total Customers	Percentage of Customers	Percentage of Purchases
		(Percent of 119)	*(Percent of 139)*
Annuals	40	33.6	28.8
Shrubs	26	21.8	18.7
Bulbs	14	11.8	10.1
Trees	13	10.9	9.4
Ground Covers	12	10.1	8.6
Perennials	12	10.1	8.6
Houseplants	2	1.7	1.4

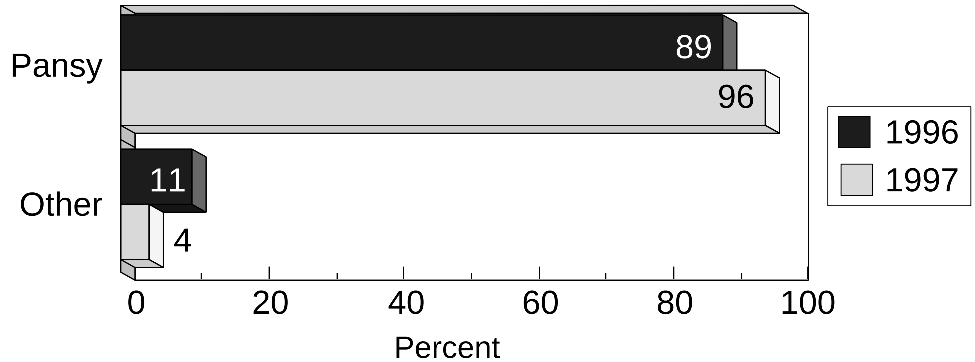
Note: 119 customers accounted for plant purchases.

Pansies accounted for over 95 percent of the annuals sold, sedum accounted for over 12.5 percent of the perennial sales and azaleas accounted for 11.1 of the shrub sales. Three customers bought maples while two purchased spruces.

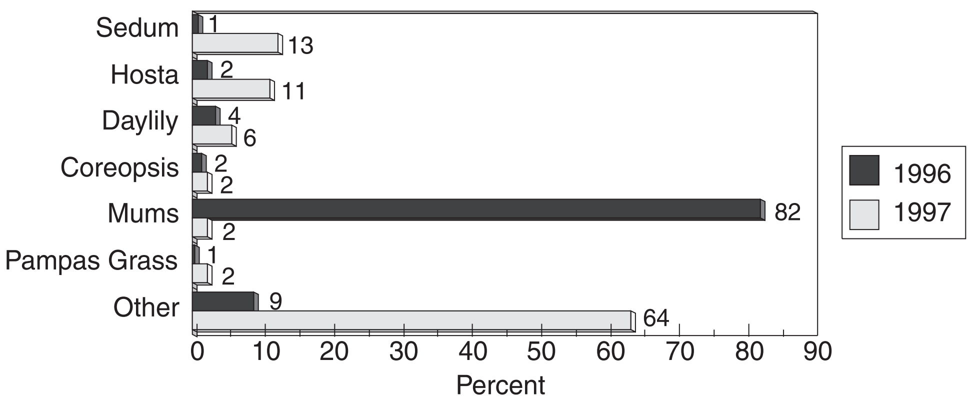
Among the ground covers bought by consumers, liriope and ivy accounted for 44.4 and 31.8 percent of the sales. Daffodils made up 51.8 percent of the bulb sales while crocus and tulips accounted for 20.1 and 17.9 percent, respectively, of the total sales.

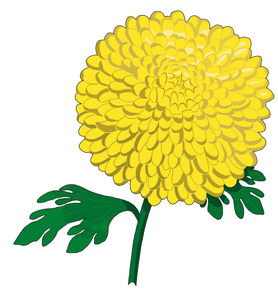
[4] *Data only includes customers who completed exit interviews.*

Major Annuals Purchased

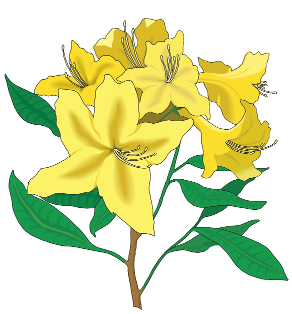


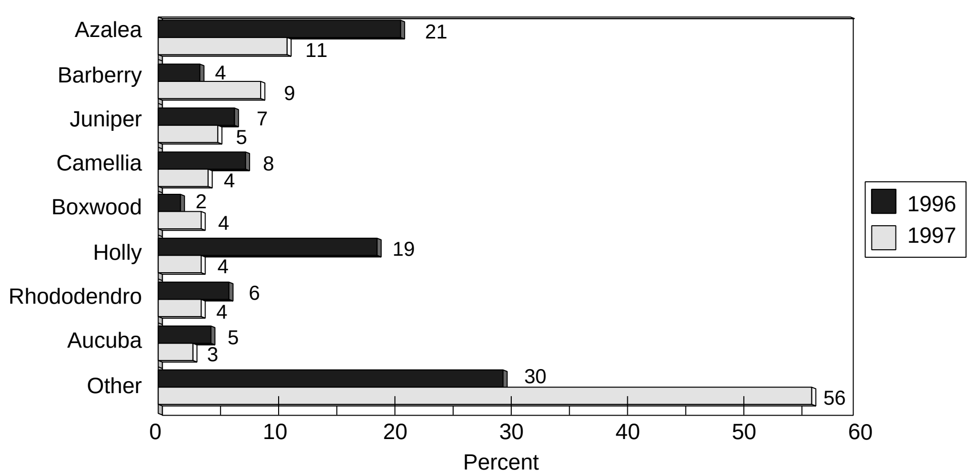
Major Perennials Purchased



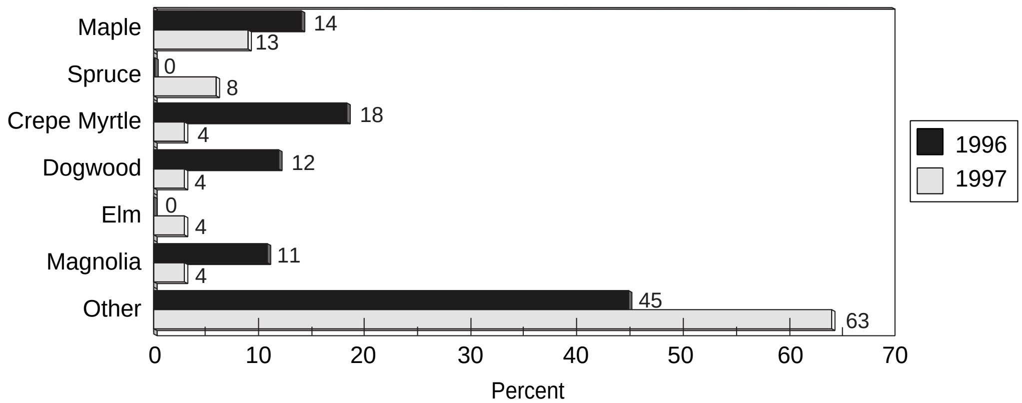


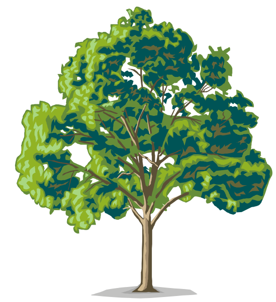
Major Shrubs Purchased



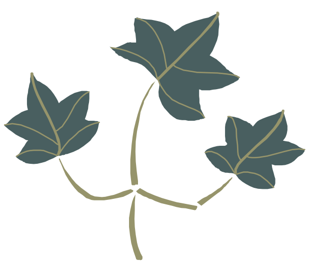


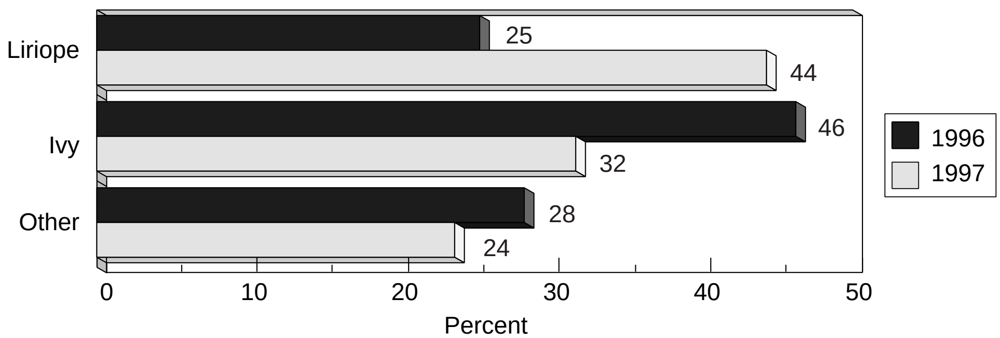
Major Trees Purchased



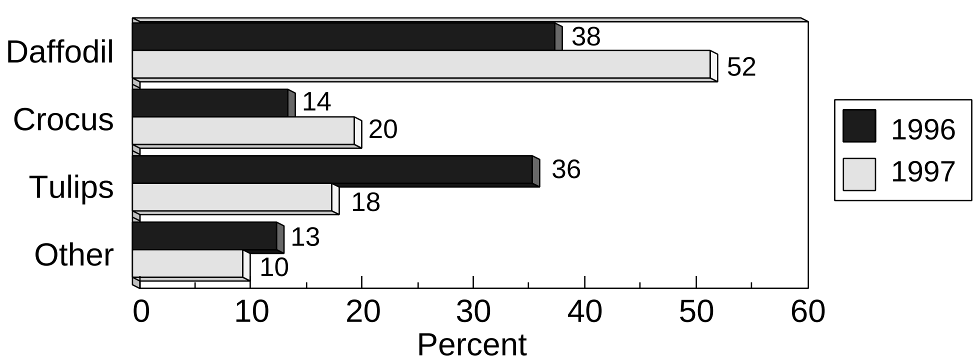


Major Ground Covers Purchased

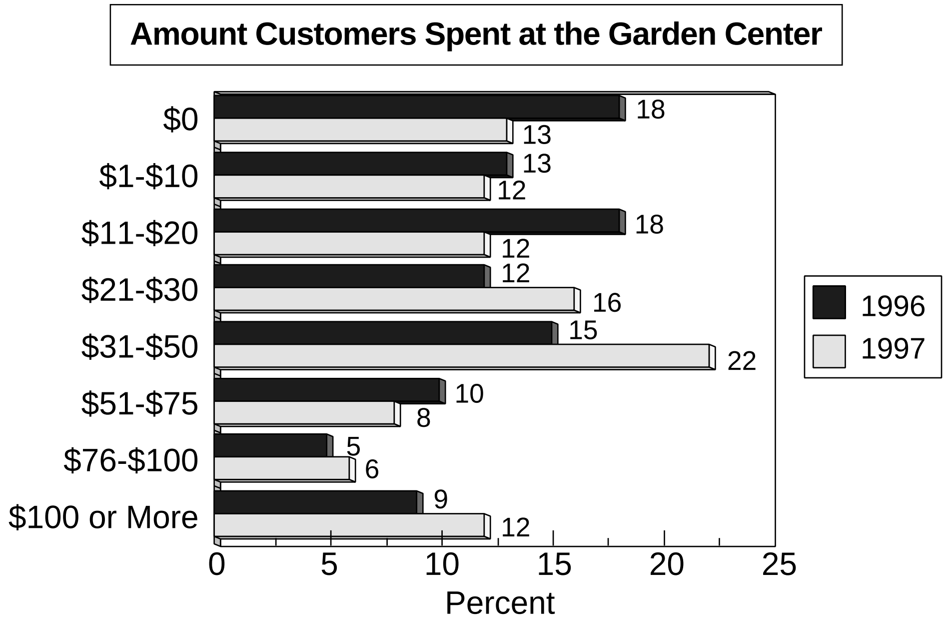




Major Bulbs Purchased

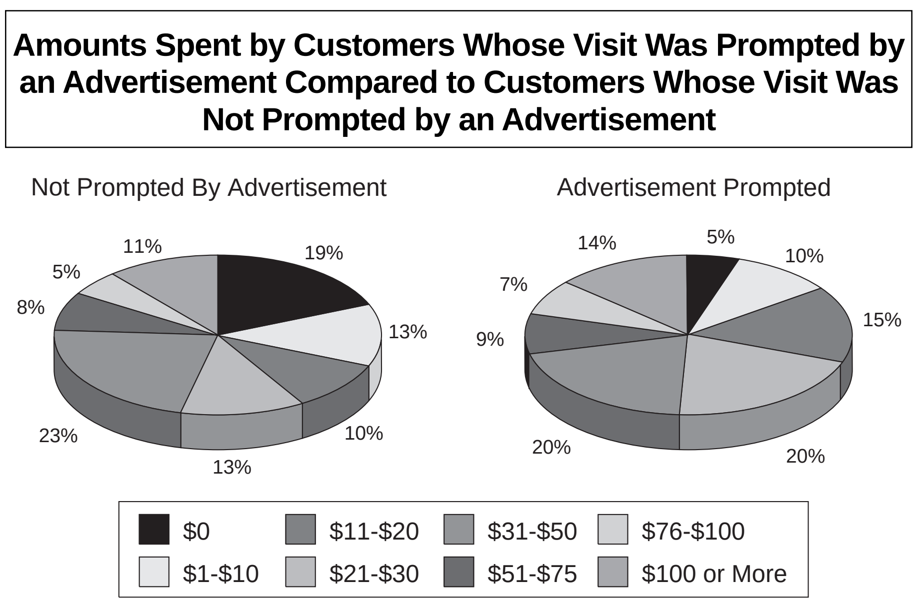


The average amount spent by the consumers surveyed in 1997 was $45.96. However, 12.9 percent of the shoppers spent nothing and 11.5 percent spent between $1 and $10. Another 12.2 percent of the shoppers spent between $11 and $20. Almost 16 percent spent between $21 and $30, 21.6 percent spent between $31 and $50 and almost 26 percent spent over $50.



On average, the surveyed shoppers spent $41.96 per customer in the fall of 1996. More of these consumers, 17.6 percent, purchased nothing and fewer shoppers, 24.2 percent, spent more than $50. The percentage of customers who spent between $11 and $50 was 49.6 percent in 1997 compared to 45.2 percent in 1996.

Similar to the 1996 survey, the customers who responded to advertising spent an average of $11.23 more than the average amount spent by the other shoppers . In addition, 55.9 percent of the consumers who were influenced by media promotions spent between $11 and $50 and 28.9 percent spent more than $50 compared to 45.0 and 23.8 percent, respectively, of the respondents who were not attracted by the advertisements.

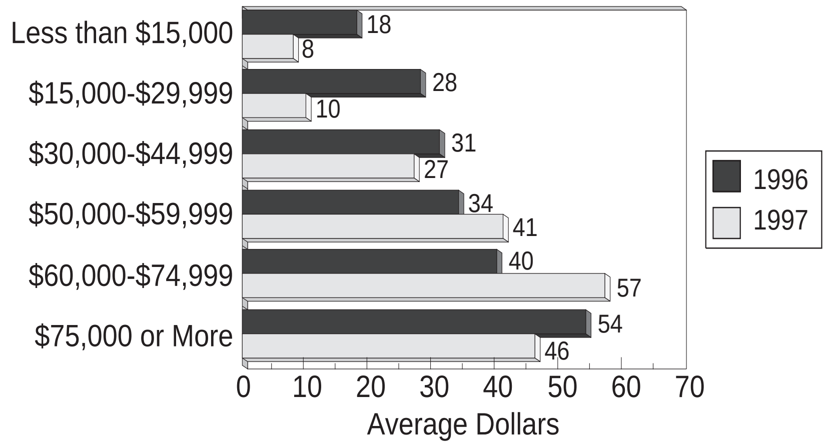


The average consumer expenditures compared to household incomes, home values, the age of the respondent and the number of working adults in the household are presented in Tables 25 through 28. Average expenditures generally increased as household incomes and home values increased. Consumers with household incomes of less than $15,000 spent an average of $8.00 in 1997 compared to $17.75 in 1996 while those with incomes of $75,000 or more spent an average of $46.07 in 1997 and $53.78 in 1996. Customers who valued their home at less than $100,000 spent an average of $27.33 in 1997 and $24.48 in 1996 compared to average expenditures of $51.58 in 1997 and $52.72 in 1996 by homeowners who valued their residence at $200,000 or more.

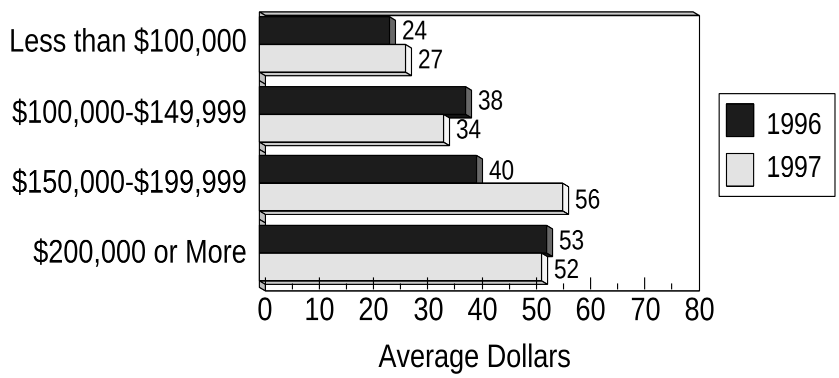
Sorting the data by age group revealed that the younger consumers generally spent more money at the garden center. Customers between 25 and 44 years of age had the highest average expenditures with $49.52 per customer in 1997 and $47.10 per customer in 1996. Shoppers between 45 and 54 accounted for the second highest expenditure, $47.06 per customer, in 1997 while customers between 18 and 24 had the second highest expenditures, $45.44, in 1996. Consumers who were 65 or older accounted for the lowest average expenditures in 1996, $24.58 per shopper, but the third lowest amount in 1997, $36.82 per customer.

Households where both adults either worked less than 40 hours per week or both were retired accounted for the lowest total average expenditures in both surveys. Average expenditures were $37.67 in 1997 and $29.37 in 1996 if both adults in the household were retired but dropped to $11.00 in 1997 and $22.89 in 1996 if both adults worked less than 40 hours per week. Average expenditures were over $40.00 per customer as long as one adult in the household worked 40 or more hours per week.

Average Customer Expenditure by Household Income



Average Customer Expenditure by Home Values



Average Customer Expenditure by Customer Age

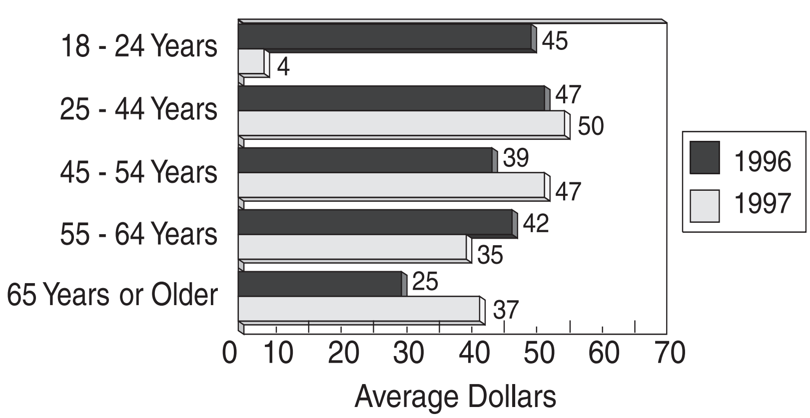


Table 10. **Average Customer Expenditures Compared to the Number of Hours Adults in the Household Work**

Hours Worked by the Adults in the Household	Average Expenditures	
	1997 Survey	1996 Survey
Working 40 or More Hours per Week:		
1 Adult	$44.16	$43.48
2 Adults	$47.53	$44.81
Working Less Than 40 Hours per Week:		
1 Adult	$56.00	$44.86
2 Adults	$11.00	$22.89
Retired:		
1 Adult	$43.87	$40.20
2 Adults	$37.67	$29.37

Other Results

Thirty-two percent of the customers shopped less than 15 minutes in this study while over 42 percent stayed between 15 and 30 minutes and over 16 percent spent more than 45 minutes (Table 11). Conversely, in 1996, 38 percent of the customers shopped less than 15 minutes while 36 percent stayed longer than 45 minutes.

Consumers who shopped longer than an hour spent the most money each year, $62.29 per customer in 1997 and $64.50 per customer in 1996. Respondents who stayed in the garden center less than 15 minutes spent slightly more than $50 in 1997 but accounted for the lowest average expenditures, $27.22 per customer, in 1996. There was little difference in the average expenditures of the customers who spent between 15 and 30 minutes in the store, $41.42 in 1997 compared to $41.16 in 1996.

Over 92 percent of the consumers who bought trees, over 66 percent who bought ground covers and over 58 percent who bought perennials owned their current homes less than five years. On the other hand, 62.5 percent of the annuals, 71.4 percent of the bulbs and 53.8 percent of the shrubs were sold to shoppers who had owned their residences 5 years or more.

Table 11. **The Amount of Time Customers Spent in the Garden Centers and Average Expenditures**

Minutes Spent in the Store	1997 Survey			Average Expenditures in 1996 Survey
	Number	Percent	Average Expenditures	
Less Than 15	40	32.0	$50.15	$27.22
15 – 30	53	42.4	$41.42	$41.16
31 – 45	12	9.6	$55.08	$41.56
46 – 60	6	4.8	$26.50	$35.16
More Than 60	14	11.2	$62.29	$64.50

Summary and Recommendations

In line with earlier consumer surveys (Safley and Wohlgenant, 1994 and Safley, Wohlgenant and Rezitis, 1998), the target audience for independent garden centers still appears to be middle-age, high-income homeowners who have lived in their current residences for less than five years. This group generally had the largest average expenditures and typically accounted for a higher percentage of the trees, ground covers and bulbs purchased during the study period.

Results of this study also concur with 1996 survey findings that found convenient store location was significantly more important in a consumer's decision to shop at a particular garden center than was noted in previous surveys (Safley and Wohlgenant, 1994 and Barton, et. al., 1998). Overall, location was rated as the second most important factor in 1997 and the most important consideration in 1996. Consumers ranked plant selection as the most important reason in this study and the third most important factor in the 1996 survey. Plant quality, which was typically ranked first or second in other consumer surveys, was rated fifth in this survey and second in 1996.

In the 1996 survey two managers used a portion of each advertisement for about two months to remind customers of a special fall plant sale compared to a month in this survey. In both cases, the managers devoted an increasing amount of advertising space to promote these events as the date approached. This strategy resulted in a 19 percent response rate, the highest rates recorded in the 1996 study.

The 1997 results tend to support the 1996 finding that managers who repeatedly focus their advertising on a specific event, such as a fall festival in conjunction with a major plant sale, can improve their response rates. Seventy-four of the 172 customers who completed the entrance interview said the advertisements in the newspaper had the biggest influence on their decision to shop at the garden center. In addition, another 46 consumers could recall at least

Table 12. **Plant Purchases by Customers Who Own Their Homes Compared to the Number of Years of Ownership**

Type of Plant Purchased and Years of Home Ownership	1997 Survey		1996 Survey	
	Number	*Percent*	*Number*	*Percent*
Annuals				
Less Than 5	15	37.5	177	44.0
5 or More	25	62.5	206	51.3
Unclassified	0	0.0	19	4.7
Total	40	——	402	——
Perennials				
Less Than 5	7	58.3	180	44.8
5 or More	5	41.7	200	49.8
Unclassified	0	0.0	22	5.5
Total	12	——	402	——
Shrubs				
Less Than 5	12	46.2	106	54.1
5 or More	14	53.8	88	44.9
Unclassified	0	0.0	2	1.0
Total	26	——	196	——
Trees				
Less Than 5	12	92.3	62	66.7
5 or More	1	7.7	29	31.2
Unclassified	0	0.0	2	2.1
Total	13	——	93	——
Ground Covers				
Less Than 5	8	66.7	40	63.5
5 or More	4	33.3	23	36.5
Total	12	——	63	——
House Plants				
Less Than 5	2	100.0	25	47.2
5 or More	0	0.0	21	39.6
Unclassified	0	0.0	7	13.2
Total	2	——	53	——
Bulbs				
Less Than 5	4	28.6	27	52.9
5 or More	10	71.4	18	35.3
Unclassified	0	0.0	6	11.8
Total	14	——	51	——

one of the newspaper ads that had been published in the *Raleigh News and Observer* within three weeks before the fall festival.

The 1996 finding that managers should highlight plant sales in their advertising was also supported in this study. In 1997, over 75 percent of the customers, whose shopping trip was prompted by an advertisement, said that they were responding to the sales or price information in the advertisement. This included information about the plants, supplies or hardware that would be on sale or specific prices for merchandise. In 1996, over 56 percent of the shoppers said they were responding to similar information.

The percentage of customers in this survey who said they were driving by and decided to stop at the garden center was more than double the percentages reported in previous studies. This higher response rate was most likely a result of the manager's extra effort to draw passing motorists' attention to the festival. In this situation, the extra signage and balloons the manager used to draw attention to the event seemed to have increased store traffic.

Managers in medium and large market areas, who want to use radio advertisements, will probably have to select from a number of different stations. In this study, the customers listed 27 different radio stations that they listened to on a regular basis. In addition, the top radio station was only listened to by 22.6 percent of the customers compared to the local newspaper which was subscribed to by over 87 percent of the shoppers.

Like the 1996 survey, a relatively large number of customers decided to buy ground covers and bulbs after entering the garden center. Managers still may be able to capitalize on this finding by promoting these types of plants as impulse items.

As previously reported, the consumer purchase and expenditure patterns closely resembled the patterns reported in the other North Carolina garden center studies. Major findings that were reinforced in this study include:

(1) There was a significant decease in average expenditures if both the husband and wife either worked less than 40 hours a week or were retired.

(2) Customers who had lived in their homes less than five years purchased a larger percent age of the enduring landscape plants, such as trees, ground covers and shrubs.

(3) Customers who stayed in the garden center over an hour spent significantly more than the shoppers who stayed less than 60 minutes.

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[4] Data only includes customers who completed exit interviews

GARDEN CENTER SURVEY

Entrance Interview

Location: ______________________ *Garden Center ID:* ______________________ *Sample #:* ____________________

The North Carolina Department of Agriculture and the Agricultural Extension Service are conducting a garden center consumer survey. The survey is designed to collect consumer shopping and demographic information. The goal is to provide information to the industry to better serve the needs of consumers. All individual information will remain confidential and only used to arrive at survey totals. In fact, you will not even be asked for your name. You will receive a free gift for your participation in the survey.

1. Is this your first visit to this garden center? *[Check one and enter code.]*

   ❒ 1=Yes ❒ 3=No

   [100]

2. What is the purpose of your visit to this garden center today? *[Check all that apply and enter a code "1".]*

❒ Purchase Annuals / Bedding Plants	120
❒ Purchase Perennials	121
❒ Purchase Shrubs	122
❒ Purchase Trees	123
❒ Purchase Grass Seed	124
❒ Purchase Supplies (fertilizer, chemicals, etc.)	125
❒ Purchase Hardware (tools, hoses, etc.)	126
❒ Compare Prices	127
❒ Browse	128
❒ Information / Advice	129
❒ Other (Specify__________________________)	130

3. Did you visit this garden center because of an advertisement? *[Check one and enter code.]*

   ❒ 1=Yes Continue with Question 6 ↓

   ❒ 3=No Skip to Question 8

   [101]

4. What was the source of the advertisement that prompted your visit to this garden center? *[Select the one most important and enter code.]*

❒ 1 Newspaper Advertisement	❒ 6 Direct Mail Flyer
❒ 2 Newspaper Insert	❒ 7 Brochure
❒ 3 Radio	❒ 8 Sign / Billboard
❒ 4 Television	❒ 9 Other
❒ 5 Yellow Pages	(Specify ________________________)

   [102]

5. What information in the advertisement attracted you to this garden center?
[Select the one most important and enter code.]

❒ 1 Plant Sale	❒ 8 Free Delivery	103
❒ 2 Supply Sale	❒ 9 Seminars / Workshops	
❒ 3 Hardware Sale	❒ 10 Hours of Operation	
❒ 4 Storewide Sale	❒ 11 Coupons	
❒ 5 Plant Selection	❒ 12 Plant Guarantees	
❒ 6 Plant Prices	❒ 13 Store Location	
❒ 7 Free Advice	❒ 14 Other (Specify____________________)	

***** SKIP TO THE ENUMERATOR INSTRUCTION BELOW *****

6. What prompted you to visit this garden center? *[Select one and enter code.]*

❒ 1 Referred by someone	❒ 6 Prices	
❒ 2 Location / Convenience	❒ 7 Service	104
❒ 3 Plant Selection	❒ 8 Free Information	
❒ 4 Plant Quality	❒ 9 Drove by and decided to stop	
❒ 5 Hours of Operation	❒ 10 Other (Specify____________________)	

7. Do you recall an advertisement for this garden center in the last month in any of the sources listed below? *[Check all that apply and enter a code "1".]*

❒ Newspaper Advertisement	150
❒ Newspaper Insert	151
❒ Radio	152
❒ Television	153
❒ Brochure	154
❒ Direct Mail Flyer	155
❒ Yellow Pages	156
❒ Other (specify ____________________________)	157
❒ Do not recall any advertisements in the last month	158

***** ENUMERATOR:** *Hand the customer the numbered ticket and ask them to see an interviewer as they leave the store. They will receive their free gift after completing a brief exit interview.*

8. Enter the time the customer entered the store .... Military Time 105 _ _ _ _

9. Enter the date of the interview .... Julian Time 106 _ _ _ _

Julian Dates

Sept. 20 = 264	Sept. 27 = 271	Oct. 4 = 278	Oct. 11 = 285
Sept. 21 = 265	Sept. 28 = 272	Oct. 5 = 279	Oct. 12 = 286

GARDEN CENTER SURVEY

Exit Interview

Location: ______________________ *Garden Center ID:* ______________________ *Sample #:* ____________________

*** **Enumerator**: *Enter the Sample Number from the ticket given to the respondent during the entrance interview.*

Military Time

1. Enter the beginning time for the exit interview. .... 200 _ _ _ _

2. What is your home Zip Code? 201

3. Did you make any purchases at the garden center today? *[Check one and enter code.]* 202

❒ 1=Yes
Continue with
↓ Question 5

❒ 3=No
Skip to
Question 7 on the back page

4. How much money did you spend at the garden center today? .... (whole dollars) 203 $

6. In the table below, list any trees, shrubs, ground covers, perennials, annuals, house plants, or ornamental grasses purchased today.

TREES, SHRUBS, GROUND COVERS, PERENNIALS ANNUALS, HOUSE PLANTS, ORNAMENTAL GRASSES

ITEM	ITEM CODE	NUMBER PURCHASED	SIZE	SIZE CODE	PRICE PER UNIT
	300	400		500	600 $. _ _
	301	401		501	601 $. _ _
	302	402		502	602 $. _ _
	303	403		503	603 $. _ _
	304	404		504	604 $. _ _
	305	405		505	605 $. _ _
	306	406		506	606 $. _ _
	307	407		507	607 $. _ _
	308	408		508	608 $. _ _
	309	409		509	609 $. _ _
	310	410		510	610 $. _ _

DEMOGRAPHIC INFORMATION

6. How old were you on your last birthday? 204

7. Is your current residence a:

   ❒ 1 Single Family Dwelling (detached house)
   ❒ 2 Condo / Apartment / Duplex / Triplex / etc. 205
   ❒ 3 Mobile Home

8. Is your residence:

   ❒ 1 Owned 206
   ❒ 2 Rented

9. How many years have you lived at your current residence? 207

10. What is the approximate market value of your current residence?

    ❒ 1 Less than $100,000
    ❒ 2 $100,000 - $149,000 208
    ❒ 3 $150,000 - $199,000
    ❒ 4 $200,000 or more

11. How many adults in your household are:

    Working 40 or more hours per week? 209

    Working less than 40 hours per week? 210

    Retired, not working, etc.? 211

12. What was your approximate household income for the last year?

    ❒ 1 Less than $15,000
    ❒ 2 $15,000 - $29,999
    ❒ 3 $30,000 - $44,999 212
    ❒ 4 $45,000 - $59,999
    ❒ 5 $60,000 - $74,999
    ❒ 6 $75,000 or more

*** **ENUMERATOR**: *Thank the respondent for their help and give them the free gift.*

OFFICE USE

Enumerator: ______________________________

213 Section Completion

214 Questionaire Completion