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DIFFUSING AMONG THE PEOPLE: WHAT DO MICHIGAN RESIDENTS KNOW ABOUT THE RESOURCES AVAILABLE TO THEM THROUGH THE MICHIGAN STATE UNIVERSITY EXTENSION?

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DIFFUSING AMONG THE PEOPLE: WHAT DO MICHIGAN RESIDENTS KNOW ABOUT THE RESOURCES AVAILABLE THROUGH MICHIGAN STATE UNIVERSITY EXTENSION?

By

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ABSTRACT

DIFFUSING AMONG THE PEOPLE: WHAT DO MICHIGAN RESIDENTS KNOW ABOUT THE RESOURCES AVAILABLE THROUGH MICHIGAN STATE UNIVERSITY EXTENSION?

By

Laura Kathleen Probyn

Michigan's Cooperative Extension Service, now called Michigan State University Extension, has a long history of serving the state's residents, especially in agricultural and rural program areas. Today's Extension service works to "help people help themselves" through programs aimed at meeting the needs of urban, suburban and rural residents from Lawrence to Lansing and L'Anse. But what do the state's residents know about the programs that are offered through this organization? This thesis looks at other awareness surveys related to Cooperative Extension and uses the Statistical Package for the Social Sciences (SPSS) to analyze the results of the MSU Extension Market Assessment Survey, a statewide telephone survey conducted to explore what Michigan residents know about MSU Extension and its main programming areas. Responses were analyzed according to respondents' ages, education levels, racial and ethnic backgrounds, region of the state and type of community of residence. Analysis showed just over 50 percent awareness of MSU Extension among Michigan residents, with wider awareness among older, white and rural residents. Awareness of MSU Extension programs did not follow this trend. This study will provide information for Extension administrators and educators in planning future programming and marketing efforts.

DEDICATION

This paper and the degree that it completes are dedicated to my grandparents, William and Clara Behrman and Douglas and Louise Probyn

"I well remember vehement discussions whether the pen is mightier than the sword, but I never heard a debate on the plow, which is really mightier than either."

--Liberty Hyde Bailey, another Van Buren County native

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Special thanks to my parents, Ernie and Kay Probyn, who not only told me I could do anything but made me believe it.

I will never adequately thank my husband Bill Daron for his patience and unlimited understanding through this entire program.

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LIST OF ABBREVIATIONS

MSUE	Michigan State University Extension
CES	Cooperative Extension Service
IPPSR	Institute for Public Policy and Social Research

Chapter 1 – Introduction

1.1 Problem Statement

Michigan State University Extension (MSUE) is in the process of developing a marketing plan for its programs and activities. One of the plan's objectives is to achieve 80 percent awareness of MSUE and its programs among all Michigan residents. But there are no current studies addressing Michiganians' awareness of MSU Extension and its programs to know where the organization stands in relation to this goal.

This paper offers a study of what Michigan residents know about MSU Extension and its programs. It uses the MSUE Market Assessment Survey, which was designed by MSU Extension and administered by the Institute for Public Policy and Social Research (IPPSR) in the summer of 2000. It includes analysis of survey respondents' characteristics and how they relate to awareness of MSUE and its programmatic areas. The study will generate information useful to Extension in developing a statewide marketing plan and lays the groundwork for further studies that might lead to consideration of resource reallocation and possible changes in program direction. The research findings also contribute to the literature on public awareness of the Cooperative Extension Service (CES) and its programs. It serves to confirm or disconfirm whether previous research findings on how much residents in other states and at the national level know about the Cooperative Extension Service and its programs is also true in Michigan.

1.2 Background to the Problem

The United States Congress initiated the Cooperative Extension Service more than 85 years ago in 1914 with the passing of the Smith-Lever Act. It was the

continuation of a process begun in 1862, when President Abraham Lincoln signed the Morrill Act, which mandated that every state set aside land for use in educating citizens, especially rural residents in "agriculture and the mechanical arts" (Drabenstott, 1999).

When Lincoln signed the Morrill Act, 80 percent of the nation's people lived in rural areas and more than half lived on farms. Though a rural population decline was on the horizon, following closely on the heels of a burgeoning industrial revolution, the rate of exodus from agriculture was not rapid. At the onset of World War II, the rural population was still 44 percent, with the farm population about 25 percent (Drabenstott, 1999).

The Extension system was set up for "diffusing among the people of the United States useful and practical information on subjects relating to agriculture and home economics, and to encourage the application of the same" (Rassmussen, 1989, pg. 223). This would be accomplished through research conducted by the Land Grant universities in an educational system jointly supported by the county, state and federal government--hence the name "Cooperative".

Through the years Extension's role has grown and expanded, as has the U.S. population. By 1940 4-H Programs were being established to serve youths in urban areas (Rasmussen, 1989), and in 1953 the Smith-Lever Act was amended with language that broadened Extension's subject matter to include "agriculture, home economics, and rural energy, and subjects relating thereto" (Terry, 1995). Much later (1988), the Cooperative Extension System further broadened its scope by adopting this mission statement:

> The Cooperative Extension System helps people improve their lives through an educational process which uses scientific knowledge focused on issues and needs (Rasmussen, 1989, pg. 223).

From its earliest role extending agricultural, homemaking and youth development education to a primarily rural America, Extension's mission was far beyond demonstrating and diffusing simple technical skills. Rather, it sought to improve the quality of people's lives by contributing to their development through education (Encyclopedia of Agricultural Science, 1994). To this end, language in the Smith-Lever Act directly refers to serving "the people of the United States" (Rasmussen, 1989).

Today's Extension Service not only provides traditional programs and services to farmers, gardeners and homemakers, but also features community development programs for cities and towns, nutrition programs for low-income families and 4-H activities focused on such topics as careers, communication and character.

And while Extension has a long-held reputation for providing socially valuable, research-based information to improve rural communities (Terry, 1995), its agents have also expanded their roles to include such skills as facilitating dialogue and identifying issues pertinent to communities of all sizes. Agents conduct work on these issues at and through the community level and relay them to university-based researchers for further study.

In Michigan, the Cooperative Extension Service has grown and changed, taking the name Michigan State University Extension (MSUE) and modifying its programming scope. Today's MSUE offers county based information in three primary areas: 1) agriculture and natural resources; 2) children, youth and families; and 3) community and economic development.

Agriculture and Natural Resources specialists and agents work across the state to extend research knowledge generated by MSU scientists to meet the needs of Michigan's diverse agricultural industry. Planning efforts with industry and commodity

representatives resulted in identification of four areas of emphasis for focus by Extension educators in agriculture and natural resources: Integrated pest management, animal management, waste management and the marketing of Michigan agricultural products (Michigan State University Extension World Wide Web page, 1999).

Educators in the Children, Youth and Family Program focus on the connections people have with the environment, individuals and their communities. Specialists and agents in this area help people work to improve their lives by focusing on three general topic areas. These areas are family strengths and home economics, food, nutrition and health, and youth development through 4-H Youth Programs.

Educators working in the Community and Economic Development Program assist individuals, local officials, businesses and others to enhance Michigan communities. They provide training programs and educational opportunities for municipalities, agencies, industries and other businesses of all sizes.

Just as society itself faces changes and challenges, MSU Extension must continually work to ensure that it is striving to help all citizens meet their needs within its programming areas. Michigan State University, the nation's first Land-Grant institution, has been active in expanding its programs and staff expertise to meet citizens' ever-changing needs.

In 1992 the organization undertook a statewide issue identification process to determine what residents saw as the most pressing needs and challenges facing their communities. The outcome of this effort led to new educational efforts via area of expertise teams that include campus-based researchers, county based educators and client group members. These teams are charged with providing topic-specific information that continues to reflect audience needs (Suvedi, Lapinski, Campo, 1999).

Just as it has done since its inception early in the last century, MSUE works to extend the resources of Michigan State University research to help meet the needs of the state's citizens. While it was initially grounded in agriculture and rural home economics, today's MSUE seeks to identify and help citizens meet needs related to its programming areas--whether these citizens are rural or urban, young or old, regardless of race, education or income. But what do citizens know about the resources and programs MSU Extension offers them?

1.3 Purpose and Objectives

No known previous studies have examined what adult Michigan residents know about MSU Extension or how many of them have taken part in any of the organization's various educational opportunities. This paper will look at citizens' awareness of the organization and compare awareness levels based on where respondents live in the state (region) and the type of community they inhabit.

Literature including national other states' studies of awareness of Extension will be examined. Data generated from this study will be compared to other studies to determine how Michigan residents' awareness levels compare to other states' findings.

In terms of respondents' demographic information, this paper will use statistical means (averages) to describe respondents' awareness and uses with relation to racial backgrounds, ages, and education levels. It will look for possibly statistically significant relationships between awareness, or lack of awareness, and these categories.

Extension has a long tradition of serving rural and agricultural audiences, yet recent program foci have included urban and suburban audiences. This paper will examine, by looking at statistical averages, whether there are higher awareness and use levels among traditional audiences (primarily rural and Caucasian) or whether there are similar results among residents regardless of residential community, or racial background.

The results presented in this paper will give the MSU Extension educator, whether he/she is located in a county office or in MSU's Agriculture Hall, a base of information about what the state's residents know about the system and its programs.

This information has one use for building an effective statewide marketing initiative to alert residents to the resources available to them. It will also have use by Extension administrators and educators who want to better understanding their existing bases of support, where knowledge of program availability might be lacking, and how they might best use their strengths and skills to gain awareness among new audiences to better help meet residents' needs.

It will also open the door to suggestions for future research that might include a longitudinal study that will gauge residents' awareness of MSUE through time and studies that not only look at awareness of Extension, but perceived public value of the organization and its program.

1.4 Study Plan

The MSUE Market Assessment Survey is a telephone survey conducted with residents across the state, from a variety of age (adults 18 years old and older), educational, race, income and geographic (urban to rural) groups. The survey questions were designed to assess respondents' knowledge of MSU Extension, its programs and

products. This paper will analyze the data collected and report results. MSUE administrators and educators will use this data as baseline information about residents' knowledge as it develops a marketing plan for statewide implementation.

Following this introductory chapter, the paper will include a review of relevant literature to identify the findings from other studies on awareness of CES and its programs, and what can be done to better respond to people's needs, especially those that are less aware of MSUE and its programs. Chapter 3 reviews the methodology used in the data analysis and Chapter 4 presents the findings. The final chapter provides a summary, conclusions, and recommendations.

1.5 Need for the Study

There are a number of reasons why exploring what Michigan residents know about MSUE is important. One reason is the lack of research on what the state's citizens know about MSUE and its programs. Although national and state studies have been conducted on people's familiarity with CES and its programs, Michigan has yet to study this question. Yet, the information on what Michigan residents know about MSUE can be used to serve various purposes.

One use of the study and its finding is to confirm or disconfirm some of the research findings on what residents in other states and at the national level know about the CES and its programs. The use of the research findings in this way helps expand the knowledge base on this topic and represents an important contribution to the literature on the awareness of CES and its programs.

This study's findings about awareness of MSUE can also be used to help determine how well the organization is fulfilling its mission to serve the people of the United States, especially minorities and those living in urban settings. Extension has had many critics who have argued that it does not or should not be working with urban audiences and that it has outlived its usefulness among a declining rural agrarian population (Terry, 1995 and Peters, 2000). But, as the product of a Congressional act (the aforementioned Smith-Lever Act), the Cooperative Extension Service is mandated by law to serve "the people of the United States." This phrase is not qualified by being limited to the agricultural or rural populations, and thus the Extension Service should not be limited to meeting the needs of select groups or populations. Regardless of its detractors, the organization is mandated to serve "the people of the United States" and should strive to do so.

In addition to helping Extension assess how well it is fulfilling its mission, information on what residents know about MSUE and its programs will also help Extension identify and develop better ways to ensure it is serving peoples' needs and communicating what it has to offer to citizens. If certain segments of society are not aware of Extension and its programs, confirming this fact should awaken the organization to the need to take measures to ensure it is serving peoples' needs and to better communicate what it has to offer to citizens. If, on the other hand, there is high awareness of MSU Extension and its programs, this gives the organization information about where it might garner support and offers ammunition that it can use to justify its acquisition and use of resources. The study, it suffices to say, lays the groundwork for further studies that might lead to resource reallocation and or changes in programmatic direction.

The findings of this study will be especially useful to Extension in its current project to develop a marketing plan for its programmatic areas. MSU Extension began the process of building an organization-wide marketing plan in 1997. Extension-user (stakeholder) input was gathered in 1998 during two planning sessions, and the input from those two events was gathered and synthesized into a set of marketing objectives.

One of these objectives calls for building 80 percent public awareness of MSU Extension's mission, goals and programs. The findings in this study relate directly to achieving that objective. In order to ascertain whether public awareness about MSUE and its mission, goals and programs has reached 80 percent after a marketing strategy has been implemented, it is critical to assess the public awareness level beforehand. This analysis of the survey results will provide a baseline of information regarding public awareness of MSUE's 4-H Youth Programs, Family Strengths Program, Agriculture and Natural Resources Programs, as well as the umbrella organization (MSUE).

1.6 Study Limitations

Because the MSUE Market Assessment Survey's primary purpose was to gauge citizen awareness of MSUE, this is a strong argument for using those data for this study. Another strength of using the MSUE Market Assessment Survey is the large number of respondents that participated (1,156 respondents).

While using the MSUE Market Assessment Survey database to conduct this study has its benefits, it also has its several limitations related to the fact that it was a telephone survey. In this case, adults without telephones in their residences were excluded, as were those with unlisted phone numbers. Telephone surveys do not allow researchers the opportunity to see and conduct face-to-face interviews with respondents. Telephone

surveys can also be subject to differences in interviewer styles, even with trained interviewers.

In addition, responses were weighted to bring them in line with 1990 U.S. Census Bureau data for the state of Michigan. While they were the most recent data available at the time the survey was conducted and analyzed, they are ten years old and may not as accurately reflect Michigan's 2000 population.

Finally, this analysis was intended to examine MSU Extension in terms of Michigan residents' awareness and participation in the organization and its programs so it takes an approach that focuses programmatically. It was intended to provide the organization with useful information about current programs and not meant to provide an in-depth look at participation by racial groups, geographic groups (e.g. urban participation in MSUE programs) or other demographic categories. While such analyses merit deeper investigation than is presented in this paper, they are nonetheless absent here.

Chapter 2 – Literature Review

2.1 Purpose of Literature Review

This literature review will explore existing knowledge about awareness of Cooperative Extension at the national and state levels. It will explore previous studies of awareness among selected user groups, as well as the general public. It will also examine the literature focused on calls for wider inclusion and participation in Extension's planning and programming activities.

Information from national and state studies helps us understand how different demographic characteristics influence peoples' level of awareness of CES and its programs. Do the factors that influence residents' awareness levels in other states and across the nation also influence the level of awareness among Michigan residents? The research findings from this study will provide a partial answer to this question. It will permit us to gauge the differences and similarities that exist in awareness of CES and its programs between Michigan and elsewhere in the country.

2.2 Review of Literature

A review of literature found several studies examining public perceptions of Extension. Two were longitudinal studies conducted by Warner and Christenson. Others were state and province surveys conducted in Louisiana, Kansas, Minnesota and Ontario. Other literature included surveys gauging the perceptions of specific (traditional) audiences to Cooperative Extension programs. Several pieces also support the need for a wider inclusion in planning and executing Extension programs.

Warner and Christenson conducted widely referenced national surveys in 1982 and 1995 looking at public perceptions of Extension. Their telephone surveys included questions designed to gauge adults' awareness of Extension and their use of the system's services.

In 1982, these authors found 40 percent awareness of the Extension Service. This number rose to 45 percent by 1995. They also found highest awareness of 4-H (77 percent in 1982, 69 percent in 1995), even higher than for the Extension organization. They noted higher awareness of the Cooperative Extension Service in the southern U.S. and the Midwest. The authors also found that Extension awareness differed by gender, race, place, and minority status of the respondent. Greatest Extension awareness was registered among older (40 years old and older) and rural residents. Program awareness and usage was lowest among young, urban and minority individuals.

In addition to looking at perception and awareness, Warner and Christenson also looked at support for future Extension funding. Their 1995 study found support for additional funding in family and youth and natural resources programs. In 1982 they asked a similar, but not identical question, so results can't be directly compared, but the later survey found similar, if not higher support for Extension and its program areas. No more than 27 percent of respondents wanted to spend less on any area.

The authors of the national surveys use data from both studies to point to continued value and support for Cooperative Extension.[1] Warner and Christenson also

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[1]"Some critics in the 1982 concluded that Extension had outlived its usefulness and would not be around in the 90s. So it is reassuring that Extension still exists and continues to serve the needs of clientele." Warner and Christenson et al.

pointed to potential shortcomings with Extension.[2] Warner et al. expressed particular concerns about the need for Extension to address the specialized needs of groups with different needs and expectations:

> ...over the years we have operated as if Extension is the same thing to all people. And we have expected Extension's lifelong supporters to rally around the organization no matter what programs were being emphasized. With programs now being designed to address specialized needs and targeted toward specific audiences, future support will need to be developed through coalitions of individuals with very different needs and expectations.

A related set of studies on Extension has focus on return to investment in Extension rather than on the level of awareness. This body of work shows positive return on the public's investment in Extension, though estimates of this return have varied (Evenson, 1979; Huffman, 1976; Yee, 1992). One study (Huffman and Evenson , 1993) noted a rate of return on Extension investments of about 20 percent (lower than for research) though other studies, have shown returns on investment has high as 110 percent (Huffman and Mranowski, 1981 and Evenson, 1979).

Other studies on the awareness of CES and its programs have been done at the state level. A 1995 Louisiana study by Verma and Burns looked at public awareness, Extension user satisfaction and potential usefulness in Louisiana. The statewide telephone survey of Louisiana adults found more than 40 percent awareness of the Louisiana Cooperative Extension Service (LCES), which was similar to Warner and Christenson's findings. Again, awareness of the 4-H youth program was higher (49.6 percent) than

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[24]"However the findings are also unsettling, since changes made in program directions and target audiences are not found to be reflected in the 1995 responses. Even though programs have targeted underserved audiences, urban residents, the young and persons with low levels of income and education remain the least likely to be aware of Extension or use its services."

awareness of the Extension program itself. Rural residents were more aware of Extension and its programs than urban residents.

Of those respondents aware of LCES, about 15 percent had contacted an Extension agent or office, with an average of 2.7 contacts having taken place in the previous year. More than 90 percent of Louisiana users indicated they were either satisfied or very satisfied with LCES and its programs. Verma and Burns' conclusions included a call for a unified marketing approach "to methodically sort out the most appropriate marketing strategies and to schedule developments in a master Extension marketing plan to manage growth and to maximize service quality.

Both the Warner and Christenson and Verma and Burns studies' found higher satisfaction with Extension from users than nonusers. This was also noted in a 1986 mail survey conducted by the Ontario Ministry of Agriculture. Though limited because it was conducted within one historically strong user group (farmers), the data showed higher satisfaction among Extension users than nonusers, with highest marks in satisfaction linked with the 4-H youth program.

The Kansas State University Research and Extension Program commissioned telephone surveys in 1996 and 2000 to examine Kansans' awareness, use and support for its activities. In 1996, there was 34 percent awareness among respondents about a university-based program offering research-based educational programs. This awareness rose to 45 percent in 2000. When the program was referenced by name, awareness increased 27 percent in 1996, but only three percent in 2000. Of those who were aware of their county's Extension office, 71 percent said they had called or e-mailed the county office for information.

Many Kansas survey results were very similar in 1996 and 2000. There was no change in the percentage of respondents (25 percent) who know there is a K-State Research and Extension office in their county. The number of Kansas respondents who had attended a meeting, workshop or field day rose slightly from the 1996 figure of 11 percent to 15 percent in 2000.

The number of respondents who believe information they receive from Kansas State Research and Extension is "very credible" was at 56 percent in 1996. This number rose to 63 percent in 2000. There was even higher positive response to the question regarding the importance of K-State's Research and Extension programming. The 1996 importance rating of 96 percent was very similar to the 2000 response of 94 percent. Current funding level approval was at 85 percent in 1996 and 89 percent in 2000.

Given Extension's long association with agriculture, it is surprising that in the 2000 survey, among Kansas respondents involved in farming, ranching, or agribusiness, 38 percent were not aware of the program. Among 4-H volunteers or leaders, 40 percent were not aware of the program as described.

The Minnesota Extension Service (MES) conducted a 1994 focus group study that looked at the organization's image and identity, expressed met and unmet needs, outstanding experiences with MES and dissatisfactions with MES.

Researchers found that MES has problems with visibility and images, especially among nontraditional audiences.[3] Beyond the historical farming and 4-H orientation, organization's mission and focus were "not clearly articulated" and even MES staff had difficulty describing MES and what it does.

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[3]"Some people associate MES with farming and 4-H, believing it has nothing to offer them. Others see the part of Extension they access, but don't know what else MES does."

Respondents lauded the organization for meeting needs "related to traditional programming" and often cited 4-H when describing outstanding extension experiences However, they also cited needs that MES could help related to meeting life skills, building individual capacity and community capacity.

While these studies offer the possibility that Extension is doing a good job serving its existing audiences, there is a body of work calling for the system to broaden its focus and work to meet the needs of larger audiences. Harriman (1989) states the need for grassroots organizing and anticipating issues to better meet needs at the community level: "As the number of farm families continues to decline, are we reorienting enough of our programming fast enough to broaden our support base and meet the needs of a changing population?"

Another call for wider accessibility and stakeholder inclusion in CES came from a National Research Council-convened committee on the future of the colleges of agriculture in the Land Grant university system. One product of this committee's efforts was a book that looked at Land-Grant system's public service components, including Cooperative Extension, and made recommendations for strengthening future efforts among land-grant colleges of agriculture (National Research Council, 1996).

The issue of wider accessibility and stakeholder inclusion is a long-standing concern to the Cooperative Extension system. A 1977 U.S. Congress-mandated investigation of Extension pointed to the organization's shortcomings in this area. Although the study identified Extension's strength in its grassroots, face-to-face approach to meeting citizens' needs and personal, the organization was also cited for not including low-income groups, minorities, and marginalized portions of traditional audiences, such

as organic farmers (United States Department of Agriculture, 1980).

2.3 Summary of Principal Findings from Literature Review

This review of the literature about what people know about Extension shows that it is diverse in methodology, scope, and purpose. However, despite these differences, the literature shows similar findings across a number of issues. Among the key findings over which there seems to be general empirical agreement are the following:

1. National and state studies show about 40 to 45 percent awareness for the CES although some state record lower awareness measures.
2. Awareness of the 4-H Program was greater than for CES in National and state surveys.
3. Greater awareness among the older and rural residents than among young, urban, and minority individuals.
4. Awareness of CES varies by region of the country
5. Level of satisfaction high among users vs. nonusers of extension.
6. There is a need to met the needs of larger audiences to have broad-based support outside Extension's traditional circles.

2.4 Conclusion

There is a growing body of literature on information about what people know about CES and its programs. Despite differences in methodologies, scope, and purposes, the research generally reaches similar conclusions on matters of awareness. But it is not known if other research findings are also valid in Michigan. One expected benefit from conducting this study is to confirm or disconfirm for Michigan some of the research

findings in other states and for the nation on how much knowledge residents possess about CES and its programs.

Chapter 3 – Methodology

3.1 Questions from the Literature

The review of literature included state surveys of citizen awareness of Extension and a national survey about Extension awareness. There was also a host of papers and publications calling for wider inclusion of nontraditional Extension audiences in program planning and criticisms of Extension for not meeting all citizens' needs.

This review informed this paper in that it brought to light a number of questions that have been asked elsewhere and deserve attention in Michigan related to awareness of Extension and Extension programs. The national study and at least two of the state surveys noted awareness of Extension at less than 50 percent. Do Michigan residents have a greater awareness about MSUE? Also, the 4-H program received more recognition among survey respondents, both nationally and at the state level, than the Extension organization of which it is part. Will Michigan follow this trend? At least one state survey and the national survey found lower awareness of Extension among young, minority and urban audiences. Can we expect this in Michigan?

What level of use have survey respondents made of the MSU Extension opportunities that are available to them? Have they attended workshops, read bulletins or newsletters? How do those who have done these things rate the service they've received?

This paper will add to the knowledge base about what is known about citizen awareness of MSU Extension and Cooperative Extension in general. It will examine whether Michigan residents have similar awareness as other Americans and provide MSUE with a base of information for use in marketing plans and for future studies.

3.2 Database Development

A telephone survey to determine knowledge of MSU Extension and its main program areas was commissioned by the MSU Extension Marketing Committee and written by Dr. Murari Suvedi and the staff of the MSU Center for Evaluative Studies. It was evaluated, tested and conducted by the Instituted for Public Policy and Social Research (IPPSR) in the spring and summer of 2000.

Dr. Suvedi developed the questionnaire after carefully reviewing MSU Extension's marketing study needs as identified by the Marketing Task Force. He adapted questions from the Children, Youth and Family State of the State survey conducted in 1997 and provided the questionnaire to the MSU Extension Marketing Committee for its review. A group of Extension professionals and faculty members from the Department of Agriculture and Natural Resources Education and Communications Systems served as the review panel. Their feedback, along with comments from IPPSR staff, was incorporated into the survey. Content validity and format was ascertained.

There was no reliability testing of the telephone survey instrument for three reasons. The first was because the questions were not on a scale or true false, and secondly, trained professional telephone surveyors administered the questionnaire under close supervision by IPPSR staff. Additionally, most of the questions were adapted from the 1996 Michigan State University Extension Children, Youth and Family State of the State Survey. The survey should yield reliable data. The full questionnaire is presented in the Appendix.

3.3 Data Collection

Data were collected and entered into a data set in a Statistical Package for the Social Sciences (SPSS) software system file. This paper's author was provided the data file late in the summer of 2000 and began looking at data frequencies and cross tabulations. She also ran linear regressions for the continuous variables of age and education level.

3.4 Population Characteristics

The survey employed a total sample size of 1,156 individuals. The referent population was Michigan's non-institutionalized, English-speaking adult population (age 18 and older). Because the survey was conducted by telephone, only persons living in households that had telephones were interviewed.

3.5 Stratification

For its administrative purposes MSUE organizes the state's 83 counties into six major regions. To assure that each of Michigan's major regions were represented, the sample was stratified into six regions, each consisting of a set of contiguous counties. The county grouping corresponds to that used by MSU Extension.

The six regions are defined as follows (counties listed within regions):

1. Upper Peninsula (Alger, Baraga, Chippewa, Delta, Dickinson, Gogebic, Houghton, Iron, Keweenaw, Luce, Ontonagon, Mackinac, Marquette, Menominee, Schoolcraft).
2. Northern Lower Peninsula (Alcona, Alpena, Antrim, Benzie, Charlevoix, Cheboygan, Crawford, Emmet, Grand Traverse, Iosco, Kalkaska, Leelanau, Missaukee, Montmorency, Ogemaw, Oscoda, Otsego, Presque Isle, Roscommon, Wexford).
3. West Central (Allegan, Barry, Ionia, Kent, Lake, Manistee, Mason, Mecosta, Montcalm, Muskegon, Newaygo, Oceana, Osceola, Ottawa).
4. East Central (Arenac, Bay, Clare, Clinton, Gladwin, Gratiot, Huron, Isabella, Midland, Saginaw, Sanilac, Shiawassee, Tuscola).
5. Southwest (Berrien, Branch, Calhoun, Cass, Eaton, Hillsdale, Ingham, Jackson, Kalamazoo, St. Joseph, Van Buren).
6. Southeast (Genesee, Lapeer, Lenawee, Livingston, Macomb, Monroe, Oakland, St. Clair, Washtenaw, Wayne).

To allow reclassification of the place of residence (county) into the alternative regional groupings, each respondent's county of residence was also coded on the data set.

3.6 Sampling

Respondents' households were selected using list-assisted, random-digit dial sampling procedures. The initial sample of randomly generated telephone numbers was purchased from Survey Sampling, Inc. (Survey Sampling generates a list of all working area code/phone number prefix combinations.) In this study, the list of numbers included only active Michigan phones. From within this list of possible phone numbers, Survey Sampling eliminated those number groups with four-digit suffixes that are unused or used only by institutions. Telephone numbers were selected at random in proportion to the number of households in each county from the remaining numbers.

3.7 Sample Weights

In order to accurately reflect Michigan's population, data entered in SPSS were weighted to bring respondents' characteristics into line with 1990 U.S. Census data. For example, according to U.S. Census data, in 1990 Michigan's Asian/Pacific Islander population accounted for one percent of the state's total population. In this study, responses were weighted to equal one percent of respondents as Asians/Pacific Islanders.

The sample design was a stratified sample based on MSUE regions. Regions sampled were somewhat disproportionate to actual population sizes within each region. Stratification was intended to assure a sufficient minimum number of respondents from each stratum to permit detailed analysis.

To make generalizations about individuals' views and behaviors, it was necessary to ensure that each respondent in a survey sample had an equal chance for selection, or is represented in the data as having had equal chances for selection. Because households with multiple phone lines had more chances of being selected into the sample than those with only one phone line, it was important to adjust for this source of unequal chances when analyzing data. The questionnaire included a query about how many separate phone numbers each respondent's household had. Each case was then weighted by the reciprocal of the number of phone numbers and adjusted so that the total number of cases matched the actual number of completed interviews.

IPPSR made an average of 15 attempts per phone number and used a refusal conversion. Thus, if a household refused to answer the survey during the first call, a second attempt to request participation was made within five days. When no one answered the phone on the first call, additional attempts were made to contact a

respondent at various days of the week and times of day.

An adult in a two-adult household would have half the chance of being selected to be interviewed as would the only adult in a single adult household. This required adjusting to correct for unequal probabilities of selection. The interview included a question as to the number of adults (18 years of age or older) living in the household. Each case was then weighted by the inverse of its probability of selection within the household, or by the number of adults in the household. This was then also adjusted so that the total number of weighted cases matched the actual number of completed interviews.

Some groups can be more difficult to reach or more likely to refuse random-digit dialing surveys than others and this can distort accuracy. It is common to weight cases in the sample to adjust for non-response. This is accomplished by weighting each case so that cases of each type appear in the sample proportionately to their representation in the general population.

For the MSUE Market Assessment Survey, cases were weighted so that the proportions of white males, African American males, other racial group males, white females, African American females, and other racial group females in the sample for each region matched the proportions these groups represent in the adult population of each region, based on 1990 Census data.

Further, within each region the cases were additionally weighted so that the proportion of cases falling into each of the following age groups matched the proportions in the 1990 Census for each region: 18 - 24 years old, 25 - 29, 30 - 39, 40 - 49, 50 - 59, 60 - 64, and 65 or older.

Finally, since the sample was drawn disproportionately across six MSUE regions (with Detroit in the Southeast region), statewide estimates of citizens' opinions require post-stratification weights to adjust for over-sampling some regions and under-sampling others. Each case was weighted so that the proportion of cases from each region in the total sample matched the proportion of adults from the corresponding region in the state's population based on 1990 Census data. Michigan has a 98 percent phone coverage rate, so all age, racial and economic groups should be well represented among the sample.

3.8 Data Analysis

The sampling error can be estimated for each region and for the state as a whole at the 95 percent confidence level. Survey data were entered and analyzed using SPSS software. Descriptive statistics such as frequencies, percentages, cross-tabulation, means and standard deviations were used to analyze the data. Frequency counts were made from responses to open-ended questions. Whenever questionnaires contained incomplete items because of individual item non-response, they were treated as missing values and were not counted toward the sample statistics.

Data analysis will include characteristics of respondents, including location of primary residence, type of community, education, racial background, age and income. The analysis will look for correlations between these variables and awareness of MSU Extension through statistical means. It will examine responses and look at possible relationships between awareness and participation in MSUE activities and educational programs.

Chapter 4 — Outcomes

4.1 Introduction

This chapter will begin with an overview of survey respondents' characteristics. These include, age, education, racial background, region of the state and community type. The chapter will continue with an overview of local issues facing Michigan communities and identified sources of educational assistance for those issues. In particular, this section focuses on how MSU ranks in relation to other agencies, programs, institutions or service providers. A third chapter section looks at responses to a set of questions assessing awareness of MSU Extension and its specific programs. Awareness measures are offered for Community and Economic Development, 4-H Youth Program, Family Strengths and Agriculture and Nature Resources. Awareness of each of these programs, as well as MSUE itself, are analyzed according to region, community type, respondents' ages, race and ethnicity and education. Additional analysis is conducted on the nature of participation by region in Extension programs and the level of satisfaction of the participants.

Outcomes from the IPPSR telephone survey were analyzed using the SPSS software package. This chapter will look at the outcomes of specific questions in relation to three broad categories. The first will look at responses as they relate to a series of questions (X2, X2c, M1, M1a, X4, X4c, M2, and M2a) that asked respondents to state the most important problems facing their communities and where they would go for assistance in addressing these problems. While the first question pair do not related to any subject matter or topic area, the three following pairs ask respondents to name local

problems specifically related to natural resources or the environment, children and youth and farmers. In addition to exploring the most-often stated problems and sources for help in solving them, this section will also look specifically at how often Michigan State University was named as a source of help for local problems.

The chapter will also explore how respondents answered questions related to their awareness of Michigan State University Extension and its main programs and whether this awareness is higher or lower among respondents from different regions of the state or for representatives of different demographic groups. MSUE has a long history of service to agriculture and rural audiences, but has expanded programming to serve urban audiences. Have representatives of these audiences even heard of MSU Extension or its programs? Can we draw correlations between awareness levels and various demographic groups? These questions will be explored.

Beyond basic awareness, do Michigan residents participate in the educational opportunities that MSU Extension offers them in the forms of workshops, meetings, 4-H club activities, bulletins, newsletters and videotapes? Data will be explored to look at whether participation changes or increases by region or demographic group. For those who have had contact with an Extension agent or office, how would they rate this contact? Does this rating change with age, education or racial group?

In summary, this chapter will look at whether Michigan residents are aware of the existence of MSU Extension and its programs, and whether there is a relationship between awareness levels and respondents' racial background, age, education or residential community.

4.2 Characteristics of Respondents

Respondents were asked a number questions to allow researchers to categorize them. They were asked (question X1) to define their community of residence, whether it was rural, a small city or town, suburb, urban or other. More than 20 percent (21.5) classified themselves as living in rural communities with another 36.7 percent listing residence in a small city, town or village. Suburban residents accounted for 28.9 percent of responses and urban dwellers made up 12.3 percent. Nearly one percent of respondents (.6) called their community of residence "other".

Questions CD5 and CD6 asked respondents to note their racial background. Responses from African Americans made up 10.7 percent, Asians or Pacific Islanders made up less than one percent (.6) and Native Americans accounted less than two percent(1.5) of respondents. Another 2.8 percent were of Hispanic background and 84.6 percent were Caucasian.

When looking at respondents' education levels (question CD3), just over five percent (5.4) reported an eleventh grade education or less. Nearly one-third (31.7 percent) had a high school diploma or GED and 32.2 percent had some college, junior college or technical school training beyond high school. Those with a four-year college degree made up 16.6 percent or respondents and those with graduate training or a graduate degree comprised 14.2 percent.

Respondents were asked to name the year they were born (question CD2) to allow grouping according to age. There were 14.4 respondents in the 18-24 year-old group, 11 percent between ages 25 and 29 and 11.9 percent from 30 to 39. The 40 to 49 year olds made up 17.4 percent of respondents and 50 to 59 year olds were at 11.9 percent. Those

age 60 to 64 made up 6.2 percent of respondents and senior citizens aged 65 or older constituted 16.2 percent.

Respondents were grouped geographically according to the regions MSU Extension established for administrative purposes. By region, the Upper Peninsula accounted for 3.5 percent of respondents. There were 4.3 percent from the Northern Lower Peninsula, 13.4 percent from the West Central part of the state and 8.7 percent from the East Central region. The Southwestern region accounted for 14.2 percent of respondents and the Southeast region comprised 56 percent.

4.3 Local Issues and Sources of Assistance

Respondents were asked a series of questions about the problems and challenges facing their communities. The first question (X2) was an open-ended query that asked them to name "the most important problem facing your community today". The five most frequent responses to this question are listed in Table 1.

Table 1. Five most important problems facing respondents' communities (n=925).

Problem	**Percent**
Quality of schools/improve education	9.4
Crime	7.7
Overexpansion/too much growth	6.9
Traffic	6.4
Roads/road repair/street upkeep	5.4

Other issues that were mentioned in response to this question included drugs and drug dealers (4.9 percent), taxes (4.7 percent), population growth (4.6 percent) and youth activities (4.6 percent).

The next question (X2C) stated, "If you were going to find a program that focused on (answer from previous question), for yourself or someone in your community, where would you most likely go?" Table 2 lists the five most frequent responses to this question. Other responses to this question included local groups/cooperative (5.5 percent), the federal government (3 percent), and neighborhood groups (2.7 percent). Michigan State University was cited by 1 percent of respondents.

Table 2. Five most often stated sources of help to stated community problem (n=662).

Source of Help	**Percent**
Local government/city/county commission/road commission	38.1
Local school/local school board	12.9
College or university other than MSU	8.1
State government/state agency/MESC/DNR, DEQ, etc.	5.7
Local police or sheriff	5.6

Respondents who did not state an environmental or natural resources-related response to question X2 were asked question M1, "Are you aware of a natural resources or environmental issue facing your community?" The five most frequent responses to this question are listed in Table 3. Other responses included recycling (4.5 percent), overpopulation (4.5 percent), the environment, and disappearing farmland (both 3.7 percent).

Table 3. Five most commonly stated natural resource or environmental problems facing respondents' communities (n=636).

Problem	**Percent**
Water pollution, quality/clean water/clean lakes, rivers	29.8
Destruction of land/development/building, growth, expansion	10.6
Pollution	7.7
Preserving woods, forests, trees, wetlands	6.8
Air pollution/air quality	5.9

Respondents who stated an environmental problem were then asked question M1a, "If you were going to find a program that focused on (answer from previous question), for yourself or someone in your community, where would you most likely go?" The five most stated responses to this question are listed in Table 4. Other frequently mentioned sources of help included Michigan State University (6 percent), a local or state human service organization (4.9 percent), and libraries (4.8 percent).

Table 4. Five most commonly mentioned sources of help for stated natural resource or environmental problem (n=125).

Source	**Percent**
Local government	26.4
State government/state agency	14.6
Miscellaneous	13.4
College or university other than MSU	11.8
Local school/school board	7.3

Those respondents who did not provide an answer to question X2 that related to children or youths were asked question X4: "Thinking about young people, in your opinion, what is the most important problem facing children and youth in your community today?" The five most common responses to this question are listed in Table 5. Other stated answers to this question included family/family time (7.3 percent), miscellaneous (5.1 percent), peer pressure (4.9 percent) and values/morality/religion (4.8 percent).

Table 5. Five most commonly stated problems facing children and youths (n=1025).

Problem	**Percent**
Youths and drugs	18
Youth activities/things for kids to do	16.4
Quality of schools/improving education	14
Divorce/broken homes/single parents	10
Gangs/gang violence/teenage trouble	8.2

Respondents who stated a problem facing local children and youth were then asked question X4C, "If you were going to find a program that focused on (answer from previous question, for yourself or someone in your community, where would you most likely go?" The five most-often stated answers are listed in Table 6. Other answers to this question included local police/sheriff (5.2 percent), libraries (4.2 percent), and family/friends/co-workers (3.9 percent). As noted in Table 9, 1.9 percent of responses named Michigan State University.

Table 6. Sources of help to problem facing children and youths (n=845).

Source	Percent
Local school/school board	33.5
Local group/cooperative	10.1
Local government/city/county	9
Local church/temple/synagogue	7.7
College or university other than MSU	6.9

The final pair of questions in this series asked respondents to think about farmers and the issues facing them. Those who did not answer an agriculture-related issue in response to question X2 were asked question M2, "Now, thinking about those who make their living from farming, what is, in your opinion, the most important problem facing farmers and agricultural producers in Michigan?" The five most-stated answers to this question are listed in Table 7. Other responses included pesticides/chemical contamination of land/water (7.4 percent), cost of materials (7.2 percent), and commercial development/buying farm land/sprawl (5 percent).

Table 7. Five most-stated problems facing farmers (n=866).

Problem	Percent
Drought/rain/water/weather	20.9
Financial/don't make enough money	13.2
Crop prices/fair pricing	12.8
Competition with big business	10.4
Farms sold/disappearing/land development	8.8

Respondents who stated a problem facing farmers were then asked question M2a, "If you were going to find an educational program that focused on (answer from previous question) to whom or what place would you go first?" The five most often stated responses to this question are listed in Table 8. Other responses included libraries (6.2 percent) the Internet (5.8 percent), and local groups/cooperatives (5.2 percent).

Table 8. Five most frequently mentioned sources of help for farm problem (n=632).

Source	**Percent**
State government/state agency	21.4
Michigan State University	15.6
Local government	14.7
College or university other than MSU	9.1
Federal government	7.8

It should be noted that this was the only question in this series in which Michigan State University garnered enough responses to be included in the top five most frequently mentioned sources of help. Table 9 notes the percentage of responses that mentioned MSU in questions X2C, M1A, X4C, and M2A. As was noted, MSU was mentioned (6 percent of responses) as a source of help for natural resource or environmental problems. The university was also stated much less frequently as a source of help for children/youth problems (1.9 percent) and as a source of help for general community problems (1 percent).

Table 9. Percent of responses that mentioned MSU as a source of help for problems in questions X2C, M1A, X4C, and M2A.

Question Subject/number	Responses (%) naming MSU	N
Community problem (general)/X2C	1	662
Natural resources/environmental/M1A	6	125
Children-youth/X4C	1.9	845
Farm-farmers/M2A	15.6	632

4.4.0 Awareness of Michigan State University Extension and its Programs

The survey included a series of questions designed to determine awareness of MSU Extension (question M7) and its main programs. Two of the organization's main programs are Agriculture and Natural Resources (question M6) and Community and Economic Development (question M3). The Children, Youth and Family Program was addressed in two questions (M4 and M5), designed to gauge awareness of the Family Strengths (M5) area and 4-H Youth Program (M4). Responses by region and for the entire state are listed in Table 10.

4.4.1 Awareness of MSU Extension

Table 10 highlights awareness levels for MSU Extension and its main programs by region. This table shows awareness of Family Strengths was lower than for any other program or program area. Its very lowest awareness rating was 29.6 percent in the Southeast region. Alternately, 4-H had the highest awareness, even higher than for MSU Extension, with more than 90 percent awareness in three regions. MSU Extension had an

overall awareness just over 50 percent (51.1), which ranged from a high of 76 percent in the Northern Lower Peninsula to a low of 44.2 percent in the Southeast region. The Southeast had the lowest awareness for all programs, with the exception of the Community and Economic Program (37.6 percent awareness in the Southeast), which had lower awareness in the Southwest region (36.4 percent).

Table 10. Awareness of MSU Extension and its main programming areas by Michigan region.

MSUE Region	MSU Extension (1143)	Community & Economic Development (1148)	4-H Youth (1156)	Family Strengths (1140)	Agriculture & Natural Resources (1145)
	Percent awareness (n)				
U.P.	71.8 (28)	64.1 (25)	95 (38)	42.5 (17)	42.5 (17)
Northern Lower	76 (38)	46 (23)	94.1 (48)	42 (21)	63.3 (31)
W. Central	54.9 (84)	43.5 (67)	89 (138)	39.5 (60)	43.8 (67)
East Central	60.6 (60)	41 (41)	94 (94)	42.4 (42)	49.5 (49)
Southwest	56.6 (90)	36.4 (59)	91.5 (150)	35.4 (57)	45.1 (74)
Southeast	44.2 (284)	37.6 (242)	76.4 (494)	29.6 (189)	30.6 (196)
Statewide	51.1 (584)	39.8 (457)	83.1 (962)	33.9 (386)	37.9 (434)

Table 11. Awareness of MSU Extension, Community and Economic Development Program, 4-H Youth Programs, Family Strengths, Agriculture and Natural Resources Program by age category.

Age category	MSU Extension (1133)	Community & Economic Development (1133)	4-H Youth Programs (1142)	Family Strengths (1128)	Agriculture & Natural Resources (1131)
Percent reporting awareness (n)					
18-24	18.8 (31)	18.8 (31)	64.2 (106)	30.9 (51)	18.2 (30)
25-29	33.1 (41)	24.8 (31)	75.4 (95)	33.3 (42)	7.1 (9)
30-39	39.2 (102)	22.6 (59)	83.6 (219)	23.7 (60)	26.4 (67)
40-49	61.4 (121)	41.6 (82)	91 (181)	32 (63)	41.9 (83)
50-59	72.9 (97)	61.1 (80)	92.6 (125)	38.1 (51)	52.6 (71)
60-64	70.4 (50)	74.3 (52)	95.7 (67)	60 (42)	63.8 (44)
65 & up	73.8 (135)	63 (116)	85.9 (159)	40.4 (74)	67.9 (125)
Overall	50.9 (577)	39.8 (451)	83.4 (952)	34 (383)	37.9 (429)

Table 11 shows that awareness of MSU Extension (question M7) was greater among people more than 65 years old. For ages 50 to 59 it was 72.9 percent, for those 60 to 64 it was 70.4 percent and for those 65 and older, it was 73.8 percent. Among younger respondents, 18.8 percent of 18 to 24 year-olds expressed awareness of MSUE, as did 33.1 percent of those ages 25 to 29. The highest differences in awareness were between respondents above and below the ages of 30 to 39. There was a statistical significance associated with increase in age and awareness of MSUE (R-squared value of .902). This means that the greater the age of the respondent, the greater the probability that he or she would be aware of MSU Extension.

Between racial groups (questions CD5 and CD6), as noted in Tables 12 and 13, the highest awareness of MSUE was among whites (53.6 percent). Native Americans had the second highest awareness rate (38.9 percent), followed by African Americans (37.9

percent), Hispanics (29 percent) and Asians and Pacific Islanders (28.6 percent).

Table 12. Awareness of MSU Extension, Community and Economic Development Program, 4-H Youth Programs, Family Strengths, and Agriculture and Natural Resources Program by respondents' racial backgrounds.

Race category	MSU Extension (n=1147)	Community & Economic Development (n=1149)	4-H Youth Programs (n=1156)	Family Strengths (n=1143)	Agriculture & Natural Resources (n=1144)
Percent reporting awareness (n)					
African American/ Black	37.9 (47)	42.3 (52)	51.6 (64)	33.1 (41)	26.6 (33)
Asian/Pacific Islander	28.6 (2)	42.9 (3)	42.9 (3)	37.5 (3)	28.6 (2)
Native American	38.9 (7)	38.9 (7)	94.4 (17)	58.8 (10)	41.2 (7)
White/ Caucasian	53.6 (520)	39.7 (386)	87.4 (856)	33.8 (326)	40 (387)
Overall awareness	51 (585)	39.8 (457)	83.2 (963)	33.9 (387)	38 (435)

Table 13. Awareness of MSU Extension, Community and Economic Development Program, 4-H Youth Programs, Family Strengths, Agriculture and Natural Resources Program by respondents of Hispanic background.

Hispanic awareness	MSU Extension (n=31)	Community & Economic Development (n=31)	4-H Youth Programs (n=32)	Family Strengths (n=32)	Agriculture & Natural Resources (n=32)
Percent reporting awareness					
Aware	29 (9)	41.9 (13)	78.1 (25)	37.5 (12)	31.3 (10)
Not aware	71 (22)	58.1 (18)	21.9 (7)	62.5 (20)	68.8 (22)

When looking at responses by the respondents' community type (question X1), Table 14 points out that there was greatest awareness of MSUE in rural communities (63.2 percent), less in small cities, villages and towns (49.2 percent), just slightly less in suburbs (48.5 percent) and urban communities (41.1 percent).

Table 14. Awareness of MSU Extension, Community and Economic Development Program, 4-H Youth Programs, Family Strengths, and Agriculture and Natural Resources Program by community type.

Community type	MSU Extension (N=1141)	Community & Economic Development (n=1147)	4-H Youth Programs (n=1154)	Family Strengths (n=1140)	Agriculture & Natural Resources (n=1144)
Percent reporting awareness					
Rural community	63.2 (156)	39.9 (99)	92.7 (230)	41.1 (99)	51.5 (124)
Small city/ town/village	49.2 (204)	41.9 (177)	84.7 (359)	37.6 (157)	35.5 (150)
Suburb	48.5 (161)	36.8 (121)	79.6 265)	28.3 (94)	37.3 (124)
Urban community	41.1 (58)	41.3 (59)	72 (103)	22.5 (32)	23.9 (34)
Other	50 (3)	20 (1)	83.3 (5)	71.4 (5)	28.6 (2)
Overall awareness	51 (582)	39.8 (457)	83.4 (962)	33.9 (387)	37.9 (434)

Table 15. Awareness of MSU Extension, Community and Economic Development Program, 4-H Youth Programs, Family Strengths, and Agriculture and Natural Resources Program by education level.

Education level	MSU Extension (N=1143)	Community & Economic Development (n=1146)	4-H Youth Programs (n=1153)	Family Strengths (n=1139)	Agriculture & Natural Resources (n=1144)
Percent reporting awareness					
11th grade or less	41 (25)	39.3 (24)	77.4 (48)	38.7 (24)	48.4 (30)
High school grad/GED	47.2 (170)	36.6 (133)	82.7 (302)	34.2 (123)	38.1 (138)
Technical school/junior college/1-3 yrs college	44 (162)	39.5 (146)	79.3 (295)	26.5 (98)	32 (119)
College grad	58.9 (112)	38.6 (73)	88 (168)	41.3 (76)	45.4 (84)
Post graduate	70.7 (116)	49.7 (81)	90.8 (148)	39.9 (65)	39.9 (65)
Overall awareness	51.2 (585)	39.9 (457)	83.3 (961)	33.9 (386)	38.1 (436)

By education (question CD3), there was more awareness of MSUE among those with four-year college degrees or higher than among those with other educational levels (Table 15). Those with technical training, junior college or some college (one to three years) had a 44 percent awareness, and high school graduates had a 47.2 percent awareness level. There seemed to be a relationship between awareness of MSUE and education levels (question CD3). Examining the statistics results in a R-squared value of .836, which indicates a strong correlation between these two variables.

4.4.2 Awareness of the MSUE Community and Economic Development Program

Economic and community development issues are the focus of the Community and Economic Area of Expertise Team's efforts. MSU Extension specialists and county-based educators working in economic development education educate and assist businesses, communities and organizations, including public and private leaders, in planning and implementing successful economic development programs.

Educators in this program area might be active in helping local businesses explore technologies that make them more competitive. Other opportunities include providing entrepreneurial training to both budding and established business owners.

As was true with MSUE, awareness of the Community and Economic Development Program (ECED) increased with respondent age (Table 11). Those in the 18 to 24 year-old range had a 18.8 percent awareness, while 50 to 59 year-olds were at 61.1 percent; 60 to 64 year-olds were at 74.3 percent, and those older than 65 were at 63 percent.

There was no statistical relationship (r value of .49) between awareness of ECED and education levels (question CD3). Table 15 shows high school graduates had a 36.6 percent awareness, while those with technical school, junior college or some college experience were at 39.5 percent. Respondents with four-year college degrees and post graduate education were at 38.6 and 49.7 percent, respectively.

For MSUE regions (question CD11), Table 10 shows the Northern Lower Peninsula had the greatest awareness, at 76 percent. The Upper Peninsula was very similar, at 71.8 percent. The East Central region showed a 60.6 percent awareness, which was just above the Southwest's 56.6 and the West Central's 54.9 percent. The Southeast

showed the lowest awareness levels related to community and economic development programming at 44.2 percent.

Tables 12 and 13 note awareness by racial background (questions CD5 and CD6). Asians/Pacific Islanders and African Americans had awareness levels at 42.9 and 42.3, respectively. Hispanics had a 41.9 percent awareness level, whites were at 39.7 and Native Americans were at 38.9.

There was little difference between rural, small city, suburban and urban residents (question X1) in their awareness of ECED (Table 14). Rural residents indicated a 39.9 percent awareness, very similar to small city, village or town residents' 41.9 percent awareness. Suburban residents had a 36.8 percent awareness, and urban residents were at 41.3 percent.

4.4.3 Awareness of 4-H Youth Programs

Michigan 4-H Youth Programs has a long tradition of providing opportunities for young people to learn life skills and have fun. It is often associated with its traditions in rural America and images of young people with blue ribbons for animal husbandry, cooking, sewing, making crafts or growing crops. 4-H Youth Development (part of MSU Extension's Children, Youth and Family Programs) provides fun, educational opportunities and resources to positively develop youth and the volunteers and professionals who work with them.

Michigan 4-H Youth Programs recruits, trains and assists more than 30,000 adult and teen volunteers annually. 4-H also networks and develops partnerships with youth-

serving organizations; educational, cultural and human service organizations; and business, industry, government and other community groups to create youth-centered, caring environments for kids.

This program area had the highest overall awareness level of all the program areas, even higher than MSU Extension. There were several trends among the awareness findings for 4-H.

Awareness was above 80 percent for all MSUE regions (question CD11) except Southeastern Michigan (Table 10), where it was a close 76.4 percent. This is not surprising, given that the Southeast region, including Detroit, is very urban. Likewise, Table 14 shows awareness was less for urban respondents than for those from other community types (question X1).

Table 11 shows that all age groups (question CD3) expressed high awareness of 4-H (the lowest was 18 to 24 year-olds, at 64.2 percent). Looking at statistics, an R-squared value of .64 emerges, which signals a correlation between awareness of 4-H and age of respondent.

By racial background (questions CD5 and CD6), there was great difference in 4-H awareness (Tables 12 and 13). Native Americans, whites, and (to a lesser extent) Hispanics had very high awareness--94.4, 87.4 and 78.1 percent, respectively–but awareness was much lower for African Americans and Asians/Pacific Islanders, at 51.6 and 42.9 percent, respectively.

In Table 15, awareness was also high for all education levels (question CD3), lowest for those having completed 11th grade or less education (77.4 percent) and

peaking with respondents who had some post graduate education (90.8 percent). The associated statistics show an R-squared value of .799, which indicates strong correlation between awareness of 4-H and age, with older respondents having greater knowledge about the program's existence.

4.4.4. Awareness of Family Strengths Program

Formerly known as the Home Economics Program, Family Strengths is committed to helping families succeed by providing educational programs and resources and in-service education for professionals dealing with family issues, and by preparing paraprofessionals to work with families.

MSU Extension home economists serve every county and work in partnership with MSU campus faculty members to provide research-based information on important topics affecting families. They transmit information through newsletters, workshops, radio and television programs, newspaper columns, meetings, and group and person-to-person contacts. They also offer specialized publications, computer-assisted instruction, telephone hotlines, and educational programs delivered by satellite and interactive cable.

Among MSUE regions (question CD11) noted in Table 10, the lowest awareness was in the Southeast (29.6 percent). The Upper Peninsula (42.5 percent), Northern Lower Peninsula (42 percent) and East Central region (42.4) were all very similar. The West Central (39.5 percent) and Southwest (35.4) regions were in the middle.

Table 11 shows awareness by age (question CD2), was highest among persons ages 60 to 64 (60 percent), though there was no statistical correlation between age and

awareness of the Family Strengths Program. Senior citizens (65 years or older) had a 40.4 percent awareness, which was just a bit higher than the 38.1 percent expressed by those between ages 50 and 59. The other age groups showed somewhat lower awareness levels, with ages 40 to 49 at 32 percent; 30 to 39 year-olds at 23.7 percent; 25 to 29 year-olds at 33.3 percent and 18 to 24 year-olds at 30.9 percent.

There was no statistical association between awareness of Family Strengths and education level (question CD3). Table 15 shows similar awareness among four-year college graduates (41.3 percent), those with post graduate education (39.9), and those with less than a high school diploma (38.7). Technical school and junior college graduates (26.5) showed somewhat lower awareness than high school graduates/GED holders at 34.2 percent.

Among racial backgrounds (questions CD5 and CD6), as shown in Tables 12 and 13, awareness was highest among Native Americans (58.8 percent), followed by Asians/Pacific Islanders and Hispanics, both at 37.5 percent. African Americans (33.1 percent) and whites (33.8 percent) also showed very similar awareness levels.

Table 14 shows that by community type (question X1), awareness was highest for rural residents at 41.1 percent, followed by small city, town or village residents at 37.6 percent; suburban residents at 28.3 percent and urban dwellers at 22.5 percent.

4.4.5 Awareness of Agriculture and Natural Resources Program

Michigan State University's Extension Agriculture and Natural Resources (ANR) Program provides research-based educational programs to Michigan citizens involved in or affected by agriculture or natural resources to help them make informed decisions,

prosper, and contribute to Michigan's economy and quality of life. The effort directly or indirectly affects every Michigan citizen.

Agents work directly with farmers producing commodities ranging from apples to zucchini, from Newaygo County Christmas tree growers to Sanilac County dairy farmers. In addition to providing the latest technological information, agents are also active in such arenas as researching new cropping systems, exploring alternative marketing methods and disseminating improvements in animal health nutrition.

By regions (CD11) Table 10 shows highest awareness in the Northern Lower Peninsula (63.3 percent), followed by the East Central at 49.5 percent. The Southwest (45.1 percent), the Upper Peninsula (42.5 percent) and the West Central (43.8 percent) all showed similar awareness. Awareness was lowest in the Southeast region (30.6 percent).

In addition to the increasing percentages expressed with increasing age categories (question CD2) shown in Table 11, statistics noted a very strong r value of .916 between awareness of the ANR Program and age of respondent. This indicates that as the respondent's age increases, so does the chance that he/she will be aware of Agriculture and Natural Resources Program. Awareness was highest for those 65 and older (67.9 percent) and lowest for 25 to 29 year-olds (7.1 percent).

Among racial groups (questions CD5 and CD6), Tables 12 and 13 show awareness was highest among Native Americans (41.2 percent) and whites (40 percent) and significantly lower for Hispanics (31.3 percent), African Americans (26.6 percent) and Asians/Pacific Islanders (28.6 percent).

Table 14 points out that, as might be expected, awareness in various community types (question X1) ranged from highest in rural communities (51.5 percent) to lowest for

urban communities (23.9 percent), with small city, town or village (35.5 percent) and suburban (37.3 percent) residents in between.

There was no statistical correlation (r value of .057) between awareness of the ANR Program and education level (question CD3), which indicates that those with more education do not have more awareness of this program. Table 15 shows awareness was highest for those with an eleventh grade education or less (48.4 percent), closely followed by four-year college graduates (45.4 percent). High school graduates/GED holders responded with 38.1 percent awareness and those with one to three years of college, junior college or technical school training were at 32 percent.

4.5.0 Nature of Participation in MSU Extension Programs by Region

Respondents who indicated awareness of MSUE were further asked to indicate the kind, if any, of interaction they may had with the organization during the past year. Six types of participation were analyzed by region. Table 16 shows respondents' participation, by MSUE region, in MSUE-sponsored workshops and meetings (question X18) , bulletin/fact sheet and newsletter reading (question X19), videotape use (question X21), and attendance at 4-H club meetings and events (questions X22 and X23, respectively).

Participation in workshops and meetings was low for all regions, with the highest regional participation in the Southwest (12.7 percent). There was similar participation in the North (10 percent) and Southeast (9.8 percent). The East Central and the Upper Peninsula also had very similar participation levels--7.1 percent and 7.9 percent, respectively-- and were followed by the West Central region at 4.1 percent.

Table 16. Participation in MSUE and use of MSUE educational materials, by MSUE Region, during the past year (n=1156).

Activity	U.P.	N. Lower	W.Central	E. Central	Southwest	Southeast	Statewide
Percent Participation (n)							
Workshop/ meeting (1069)	7.9 (3)	10 (5)	4.1 (6)	7.1 (7)	12.7 (20)	9.8 (57)	9.2 (98)
Bulletin/ fact sheet (1051)	17.9 (7)	24 (12)	12.5 (18)	14.7 (14)	15.6 (25)	12.4 (70)	13.9 (146)
Newsletter (1051)	21.1 (8)	34.7 (17)	15.2 (22)	23.4 (22)	25.5 (40)	17.3 (98)	19.7 (207)
Video tape (1075)	2.6 (1)	2 (1)	5.4 (8)	2 (2)	1.9 (3)	.5 (3)	1.7 (18)
4-H meeting (1067)	10.3 (4)	8 (4)	10.1 (15)	11.2 (11)	11.9 (19)	7.9 (45)	9.2 (98)
4-H event (1075)	28.2 (11)	38 (19)	24.3 (36)	34.4 (33)	29.8 (48)	17 (99)	22.9 (246)

Bulletin and fact sheet use ranged from 24 percent in the Northern Lower Peninsula to 12.4 in the Southeast. Upper Peninsula respondents noted a 17.9 percent use and Southwest residents were at 15.6 percent. The East Central region's 14.7 percent was slightly above the 12.5 percent noted in the West Central.

Newsletter use was recorded somewhat higher, with Northern Lower Peninsula respondents reporting 34.7 percent use, the Southwest at 25.5 percent, and the East Central and Upper Peninsula similar at 23.4 and 21.1 percent, respectively. The Southeast Region showed the least newsletter use--17.3 percent.

The use of MSU educational video tapes was very low for all regions, with the highest being 5.4 percent in the West Central. The Upper Peninsula (2.6) was very similar to the Northern Lower and East Central, both at 2 percent. The Southwest was at 1.9

percent and the Southeast region showed just one-half percent use.

Participation in 4-H club meetings by respondents or their family members ranged from nearly 12 percent (11.9) in the Southwest region to 7.9 percent in the Southeast region. The East Central region was at 11.2 percent, with both the Upper Peninsula and the West Central regions very similar, at 10.3 and 10.1 percent, respectively. The Northern Lower Peninsula showed 8 percent participation.

These numbers contrast with higher participation at 4-H events and activities (e.g. fairs, competitions, demonstrations, etc.), which peaked with 38 percent in the Northern Lower Peninsula, followed closely by 34.4 percent in the East Central Region. The Southwest (29.8), Upper Peninsula (28.2 percent), and West Central (24.3 percent) were all very similar. Lowest participation was in the Southeast (17 percent).

Table 17. MSUE notice in media and contact with MSUE educators by region.

Activity	U.P.	N.Lower	W. Central	E. Central	Southwest	Southeast	Statewide
	Percent Participation (n)						
Read/heard about MSUE (1064)	61.5 (24)	60 (30)	45.1 (65)	47.9 (46)	49.7 (78)	44.3 (256)	46.9 (499)
Contacted MSUE (1072)	15 (6)	18.4 (9)	13 (19)	9.3 (9)	18.9 (30)	11.4 (66)	13 (139)
MSUE educator visit (1062)	7.7 (3)	14.9 (7)	4.1 (6)	6.3 (6)	3.8 (6)	2.4 (14)	4 (42)
Visit MSU campus (1075)	2.6 (1)	6 (3)	5.4 (8)	8.2 (8)	10.6 (17)	6.6 (38)	7 (75)

Table 17 shows the percentage of respondents who had heard or read about MSU Extension activities in the media (radio, TV, newspaper) in the past year (question X24). Responses range from 61.5 percent and 60 percent, respectively, in the Upper Peninsula and Northern Lower Peninsula to 44.3 in the Southeast region. The other three regions were similar, with the West Central at 45.1 percent, the East Central at 47.9 percent and the Southwest at 49.7 percent.

Those who had contacted an MSU Extension office with a question in the past year (question X25) comprised only 13 percent of respondents statewide. Those in the Southwest (18.9 percent) and Northern Lower Peninsula (18.4) had the highest percent of respondents reporting contact. Upper Peninsula respondents reported contact at a 15 percent rate, and the West Central region was at 13 percent. The Southeast's 11.4 percent was somewhat higher than the East Central's 9.3 percent.

Numbers were lower when respondents were asked if an MSUE educator had visited their homes, businesses or schools (question X27). The highest response to this question came from the Northern Lower, at 14.9 percent. The Upper Peninsula's 7.7 percent was followed by the East Central's 6.3 percent and the West Central's 4.1 percent. The Southwest's 3.8 percent was still above the 2.4 percent reported in the Southeast.

Across the state, just 7 percent of respondents reported having visited the MSU campus in the previous 12 months for an MSUE-related event, such as Ag Expo, 4-H Exploration Days, the Michigan Families Conference or Animal Science Day (question X26). The highest rate was 10.6 percent in the Southwest region (where the campus is located), with the East Central (8.2 percent), Southeast (6.6 percent), Northern Lower (6

percent) and West Central (5.4 percent) all lower. Upper Peninsula respondents, located farthest away from the East Lansing campus, reported the least visitation, at 2.6 percent.

4.5.1 MSU Extension Participant Satisfaction by Region

Those respondents who reported some contact with an MSUE office, program or educator over the past 12 months were asked (question X29), "Taking all types of contact you or members of your family have had with MSU Extension in the past 12 months into consideration, how would you rate the quality of educational program offered by MSU Extension?" Table 18 lists their ratings by region and for the state as a whole.

Table 18. Rating of MSU Extension services by respondents with contact during previous 12 months (n=424).

	Rating by Percentage				
Region	Excellent	Very Good	Good	Fair	Poor
U.P. (14)	14.3 (2)	64.3 (9)	14.3 (2)	7.1 (1)	0
N. Lower (24)	29.2 (7)	41.7 (10)	20.8 (4)	4.2 (1)	4.2 (1)
W. Central (50)	16 (8)	42 (21)	42 (21)	0	0
E. Central (35)	17.1 (6)	51.4 (18)	20 (7)	8.6 (3)	2.9 (1)
Southwest (69)	21.7 (15)	42 (29)	17.4 (12)	18.8 (13)	0
Southeast (232)	21.1 (49)	47.8 (111)	20.3 (47)	3.9 (9)	6.9 (16)
Statewide (424)	20.5 (87)	46.7 (198)	22.2 (94)	6.4 (27)	4.2 (18)

Of those who had taken part in MSU Extension programs, used materials or participated in activities, 20.5 percent rated the service they received as excellent and nearly half (46.7) rated it as very good. Across the state, the Northern Lower Peninsula

had the highest number of excellent ratings at 29.2 percent and the Upper Peninsula had the lowest at 14.3. Conversely, of those who rated the service as Very Good, highest percentage was in the Upper Peninsula with 64.3 and the lowest was in the Northern Lower at 41.7.

4.6 Conclusions on Awareness and Participation in MSU Extension

According to this survey's results, while MSU Extension's 51.1 percent awareness level among Michigan residents is greater than that enjoyed by other state Extension services, it is less than the marketing plan's targeted 80 percent awareness rate. While residents see MSU as a source of assistance in dealing with agricultural issues, it is much less often looked to for help in facing natural resource or youth-related issues.

There was greater awareness of MSU Extension with older residents and those with higher education levels. Rural residents also had higher awareness than suburban or urban respondents. These findings confirm other studies' reports about awareness of Extension. In this survey there was also higher awareness among whites than for other racial groups, which did not hold for the organization's main programs. Awareness of MSU Extension and each program was lowest in the urban Southeast region, with the exception of the Community and Economic Development Program, which had slightly lower awareness in the Southwest region.

The Community and Economic Development Program did not reflect the finding of lower awareness by whites, as African Americans and Asians/Pacific Islanders showed higher awareness levels. In addition, there was no statistical significance related to age and awareness of ECED, though awareness does increase with respondents' age

categories, dropping slightly with those over age 65. This may be due to the fact that ECED programs are intended for those active in business and community development activities. Senior citizens who are retired and not involved in the business or governmental affairs of their communities might not be as aware of this program's offerings.

The 4-H Youth Program had highest awareness, even higher than for MSUE. Again, there was a correlation between awareness of 4-H and age (older respondents had higher awareness) and between 4-H and education level. There was also higher awareness by rural residents than suburban or urban dwellers. Among racial groups, Native Americans had highest awareness of the 4-H Youth Program. While those who reported attending (or having a family member attending) 4-H club meetings at about a 10 percent level, there was higher attendance at 4-H events like fairs, with more than a third of respondents in two regions reporting such. The findings related to 4-H also confirm what other studies have shown—that awareness of 4-H is higher than awareness of Extension, regardless of the respondent's age, education, racial background or community type.

The Agriculture and Natural Resources Program had highest awareness among rural residents and older survey respondents. Native Americans had highest awareness among racial groups and there was no statistical correlation between awareness of this program area and educational level. The awareness among rural and older respondents confirms other studies' findings. The higher awareness by Native Americans corresponds to the findings related to higher awareness in rural areas. According to 1990 U.S. Census Bureau data, Michigan's Native American population primarily resides in the primarily rural Upper Peninsula.

There was also no correlation between either education level or age and awareness of the Family Strengths Program. There was higher awareness by rural respondents than suburban or urbanites. Awareness of this program was very low among all audiences, regardless of region, age, education, race or type of community.

In looking at participation by respondents in MSUE educational activities and use of materials, there was low use by all regions, the highest recorded at 12.7 percent in the Southwest region. MSUE video tape use was reported very low, with the highest percentage at just over 5 percent (5.4) in the East Central part of the state. Bulletin and fact sheet use was higher, compared to other materials, with nearly one quarter (24 percent) of Northern Lower Peninsula respondents reporting having read these materials. The lowest use of bulletins and fact sheets was in Southeast Michigan.

Newsletter reading was reported at similar levels across the state. A full one-third (34.7 percent) of Northern Lower respondents reported reading MSUE newsletters, as did 17.3 percent of Southeastern residents, the lowest reported regional use level. There was much higher recollection of seeing or hearing about MSUE through the media.

Though participation in MSU workshops and meetings was just under 10 percent statewide (9.2 percent), this does confirm other studies' findings about participation in Extension events. Satisfaction among program participants was also high, with just about two thirds rating the quality of MSUE educational programs as "excellent" or "very good" (67.2 percent). This again confirms what other researchers have pointed out about the organization—that those who do find their way to Extension programs are very satisfied with the service they receive.

Conclusion and Recommendations – Chapter 5

5.1 Summary of Findings

When asked for sources of assistance in meeting local needs, respondents frequently noted MSU as a source of assistance in dealing with agricultural issues, but much less often looked to for help in facing natural resource or youth-related issues.

More than one-half of the survey's respondents were aware of MSU Extension's existence. This observation cuts across region, community type and respondents' demographic categorization as a whole. A higher percentage were aware of the 4-H Youth Program and fewer were aware of the Community and Economic Development, Family Strengths and Agriculture and Natural Resources programs.

There was a statistical correlation between awareness and age of respondent. This held for MSUE and each of its program areas, with the exception of 4-H. With regard to 4-H, awareness was higher at all age levels, and was over 90 percent for respondents in age groups from 40 to 49 year-olds through the 60 to 64 year-olds. It declined slightly (85.9 percent) for those over age 65.

Minorities had lower awareness of MSUE compared to whites but did not have lower awareness of the organization's programs. African Americans, Hispanics and Asians/Pacific Islanders all had higher awareness of the Community and Economic Development Program than whites. Native Americans had greatest awareness of the 4-H Youth Program and the Agriculture and Natural Resources Program. Native Americans, Asians/Pacific Islanders and Hispanics also had higher awareness of the Family Strengths Program

There was relatively higher awareness of MSUE, and the 4-H and Family Strengths programs among rural and small town respondents in the state, but this was not the case for the Community and Economic Development or the Agriculture and Natural Resource programs. With regard to Community and Economic Development, urban respondents had slightly higher awareness than suburbanites (41.3 percent to 36.8 percent). In the Agriculture and Natural Resources area, suburban respondents expressed slightly higher awareness than those from small towns (37.3 percent versus 35.5 percent). There was also a correlation between the amount of education respondents had and awareness of MSUE and 4-H. This correlation did not hold with the other program areas.

Roughly 10 percent of respondents reported taking part in MSUE educational activities or using educational materials. Even fewer used MSUE video tapes, though more, nearly one quarter in some regions, reported reading bulletins and fact sheets. Still more read MSUE newsletters and recalled seeing or hearing about MSUE through the media.

5.2 Conclusions and Implications

There was slightly higher overall awareness about MSUE among Michigan residents than was found by Warner and Christenson at the national level, or by researchers in other states. This holds with Warner and Christenson's assessment that Extension awareness was higher in the Midwest (and south) than other U.S. regions.

This may be due to Michigan's historically predominant small town and rural populations outside Detroit. These residents would have at one time called on the county

Extension office for everything from advice about canning to help with insect pest identification to crop fertilizer recommendations to information about 4-H activities. Because the rural population was larger, more of the urban/suburban population would have had exposure to Extension through rural family or friends.

In addition, non-rural residents would have been more involved in vegetable gardening, canning and general food preparation in pre-fast food, pre-information age America. Their options for information would have been limited and Extension would have been a likely source. These are also topics that many people would associate with agriculture, and this study's findings noted that, when it comes to issues related to agriculture, Michigan residents see Michigan State University as a major source of assistance.

This study's findings are consistent with other studies that have shown higher awareness for the 4-H Youth Program than for MSU Extension. While the reason for this finding bears exploration, this is a positive for 4-H. However, it also signals that somehow, residents are not connecting the program with MSUE. The connection between the overall organization and its component is not being made, and it is up to both to bridge the awareness gap through communications and marketing.

There was some concurrence with findings from other studies of higher awareness of Extension among traditional audiences. There was also higher awareness among older respondents (see previous paragraph), but this did not hold true across the board for strictly rural residents or for minorities. Awareness of the Community and Economic Development Program was higher with some minorities, suburban and urban audiences.

The relatively higher awareness of Extension Programs among minorities found in the study is in contrast with finding from previous studies that show that when compared to whites, minorities have relatively low program awareness. But if considered alongside the finding that rural respondents have higher awareness of Extension than urban residents, then minority groups who reside in rural areas might be expected to reflect higher awareness. According to 1990 U.S. Census data, while African Americans primarily reside in or near major metropolitan areas (like Detroit), other minorities in Michigan do not. Native American population densities, for example, are higher in the primarily rural Upper Peninsula. The population density for persons of Hispanic background is fairly evenly spread across the Lower Peninsula. Thus, African Americans in this study might reflect the lower awareness found across urban areas, while Native Americans and Hispanics are more reflective of rural respondents in general.

Respondents had similar use of MSUE educational opportunities than was found by researchers in Kansas by Verma and Burns in Louisiana. Like Louisiana residents, Michigan respondents rated the service they received from Extension very positively. This may indicate that once an individual has contact with MSUE, the organization does a good job of serving his/her needs, but that the organization does not do enough marketing to put its image in the minds of Michigan citizens when they look for sources of information.

This is highlighted in the findings related to the sources of help respondents consider when thinking about community problems. Michigan State University was only named frequently in reference to finding help in dealing with agricultural issues. It would be useful to conduct further inquiry into what respondents were referring to when they

said "Michigan State University". They may have been thinking about MSUE when providing that response, but it is also possible they were referring to the College of Agriculture and Natural Resources, one of its departments or units (like the Michigan Agricultural Experiment Station) or even a specific faculty member.

A better understanding of how Michigan residents see the university would go well beyond serving Extension's needs for measuring awareness. It would also help MSUE understand the degree to which citizens identify it as a part of the university and would give the university a better idea of how people view its connections to them.

Because MSU was frequently named as a source of help for farm-related problems, it is arguable that residents know that it has an agricultural school and a history of dealing with farmers' issues. But just because it was not noted as a source of help for youth or natural resources issues does not necessarily mean that residents do not believe MSU (or MSUE) is a credible source of assistance.

For instance, awareness of 4-H was higher than was awareness of MSUE. This points out that there are adults who do not know that 4-H is offered by MSUE. Kansas researchers discovered that 40 percent of the 4-H volunteers or leaders that were included in their survey sample were not aware of the organization's sponsor--Kansas State Research and Extension.

Further, residents may not be aware of the statewide role that MSU carries through its Land-Grant affiliation. Dillman et al. found that while people had frequently (94 percent) heard the name of the Land-Grant university in their state, only 30 percent responded affirmatively when asked, "Have you ever heard the term land grant used to describe a university in the state where you now live?"

It is plausible that respondents would be more likely to contact the Michigan DNR or DEQ in reference to a natural resource-related issue simply because they are more aware of the roles those agencies play at the state level and believe that MSU only exists to educate matriculating students. The university, and MSU as its local connection, can address this issue, initially by such simple marketing efforts as affiliating the name "Michigan State University" with every piece of letterhead that leaves the office, every sign, and every telephone salutation. Media contacts should also reference programs, agents and specialists with the university.

The 51 percent overall awareness of MSUE by Michigan residents is nearly 30 percent below the organization's marketing objective of 80 percent. The organization needs to take into consideration whether the 80 percent awareness goal should be modified at the state level and instead, adjusted by region. Alternatively, the different awareness levels by region also suggest that different marketing strategies may be necessary to achieve an 80 percent awareness across the state. The consistently relatively lower levels of awareness of MSUE and its programs in the Southeast region, in particular, suggests that this region should receive special attention in MSUE's marketing plan.

In striving to increase awareness, MSUE may want to reach out to younger and more urban audiences. One possibility might lie with taking advantage of the very high awareness of 4-H and strengthening suburban and urban 4-H programs. This can give youngsters positive experiences with Extension that they can carry on into adulthood and might make them more predisposed to seeking information and education from MSUE later in life. While additional resources may not be available to support new endeavors,

partnerships with schools, Boys' and Girls' Clubs, after-school programs and other youth development organizations might prove valuable.

5.3 Recommendations for Further Study

While this study did bring to light some information about what Michigan residents know about MSU Extension and its main programs, there is much more room for studies that dig deeper for further information that goes beyond awareness. For example, this study did find that users often rated the service received from MSUE as excellent or very good, but why did they go to MSU Extension for that service? What kind of value do they put on this service and do they value MSUE more than nonusers? What would make nonusers more likely to take advantage of MSUE educational opportunities?

The 4-H Youth Programs had the highest awareness levels among all Extension programs and even higher than the organization itself, regardless of age, ethnicity, type of community or education level. Why is this awareness so high, in study after study? What has 4-H done (or what has it experienced) that has made it a very recognizable program? Are there lessons from 4-H that other Extension programs could use to build awareness in other programs?

In addition, as Extension's educational offerings have expanded, so have those of other organizations. How do Michigan residents compare MSU Extension's nonformal educational programs to those offered by such organizations as health care providers, conservation organizations or other youth development groups like the Boy Scouts and Girl Scouts? How do they differentiate (or do they) between the type and quality of

Extension programming with other program providers?

This study will be used in MSUE's marketing activities, and it opens the door to further marketing research within specific audiences. For example, are there individuals who use MSUE services and participate in programs without realizing that the activities are connected to Extension and the university? How can such connections be strengthened? Many MSUE offices are located in county buildings. Do residents believe they are making use of county resources? If so, how can MSUE more clearly denote its ties to MSU through coordinated marketing activities?

This survey's series of questions that asked residents where they would go to meet community needs related to children and youth, natural resources or agriculture was open-ended and there was no distinction between answers that included "Michigan State University". Were some respondents referring departments on the main campus and others to county offices? This also relates to the degree to which residents understand the connection between MSU, MSU Extension, and county government. Would there be greater use of MSU Extension if residents understood the organization's structure?

In addition to looking at perception and awareness, Warner et al. also looked at support for future Extension funding. Their 1995 study found support for additional funding in family and youth and natural resources programs. In 1982 they asked a similar, but not identical question, so results can't be directly compared, but the later survey found similar, if not higher support for Extension and its program areas.

This survey did not examine support for Extension funding, but information about how supportive residents are about future MSU Extension funding goes beyond marketing. Such data offer information that could be useful to Extension administrators

who are seeking to maintain or increase funding levels. If research data show that Michigan residents place a high value on MSUE programs and strongly support maintaining or increasing funding, Extension leaders could share such data with legislators and county officials charged with budgeting and build arguments for future funding levels.

Further, if other studies show residents hold differing levels of support and value for MSUE's main programs or use such programs at a higher rate, this may signal administrators that there is a need for reallocating funding to better reflect residents' needs.

This paper offers a small look at what Michigan residents know about Michigan State University Extension and its main programs. It can and should be a starting point for further studies that more closely examine what citizens value and need from Extension, first from the standpoint of marketing, but much further and deeper, to examine questions that address the organization's long-term health, vitality and stability.

Appendix

MSU Extension Marketing Survey
Telephone Interview Questions

INTERVIEWER, DIAL THE TELEPHONE NUMBER: _____

(If a young child answers, ask to speak with an adult or the best time to call back when an adult will be there.)

Hello. My name is _____. I'm calling from the Office for Survey Research in East Lansing. We are doing a statewide survey about how familiar Michigan citizens are about certain educational programs and services. Have I reached you at your home phone?

In order to represent the views of different people in Michigan, I need to randomly select an adult (that is a person 18 years of age or older) within your household. We do that by asking to speak with the adult who has the next birthday.

I will be asking you some questions about the community you live in, about some of the difficulties facing your community, and about what can be done to meet the needs of residents. The results will be used to develop educational programs to meet the needs of your community.

Your telephone number was drawn in a random sample of the entire state. The questions I need to ask should take about eight minutes.
Before we begin, let me tell you that this interview is completely voluntary. All of the information you provide will remain confidential. For quality control purposes, this interview may be monitored by my supervisor. Should we come to any question you would prefer not to answer, just let me know and we will go onto the next question.

I will begin now, OK. <1> Yes to proceed, <2> refusal, <3> call later

>X1< I'd like to start by asking you some general questions about the community in which you live.

Would you say you live in a rural community, a small city or town, a suburb, or an urban community?

<1> RURAL COMMUNITY
<2> SMALL CITY OR TOWN, VILLAGE
<3> A SUBURB
<4> URBAN COMMUNITY
<5> OTHER: SPECIFY
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X1a< How close(in miles) are you to a city?
<0> RECORD RESPONSE VERBATIM

>X2< In your opinion, what is the most important problem facing your **community** today?
<0> RECORD RESPONSE VERBATIM

>X2c< If you were going to find a program that focused on (FILL IN ANSWER FROM PREVIOUS QUESTION), for yourself or someone in your community, where would you most likely go?

<0> RECORD RESPONSE VERBATIM

NOTE: IF THE RESPONDENT DID NOT IDENTIFY SOMETHING ABOUT NATURAL RESOURCES OR ENVIRONMENTAL PROBLEM, ASK FOLLOW UP QUESTION (M1 & M1a)

>M1< Are you aware of a natural resources or environmental issue facing your community?
<0> RECORD RESPONSE VERBATIM

>M1a< If you were going to find a program that focused on (FILL IN ANSWER FROM PREVIOUS QUESTION),for yourself or someone in your community, where would you most likely go?
<0> RECORD RESPONSE VERBATIM

>X4< Thinking about young people, (in your opinion), what is the most important problem facing **children and youth** in your community today?

<0> RECORD RESPONSE VERBATIM

>X4c< If you were going to find a program that focused on (FILL IN ANSWER FROM PREVIOUS QUESTION), for yourself or someone in your community, where would you most likely go?

<0> RECORD RESPONSE VERBATIM

>M2< Now, thinking about those who make their living from farming, what is,(in your opinion) the most important problem facing farmers and agricultural producers in Michigan?

<0> RECORD RESPONSE VERBATIM

>M2A< If you were going to find an educational program that focused on (FILL IN ANSWER FROM PREVIOUS QUESTION) to whom or what place would you go first?

<0> RECORD RESPONSE VERBATIM_____

Now, I would like to mention some programs or services that are available in your community. Please tell me whether or not you have heard of each:

>M3< Before today, had you heard of Community and Economic Development Program?

[DEF: ONES THAT FOCUS ON THE SOLUTIONS OF COMMUNITY PROBLEMS SUCH AS THE PROVISION OF SERVICES LIKE WATER AND SEWERS; LAND USE PLANS; THE EXPANSION OF BUSINESSES AND INDUSTRY; AND THE FORMATION OF LOCAL DEVELOPMENT ORGANIZATIONS.

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>M3a< (If yes) Do you know what organizations or agencies in the State coordinate these services?

<0> RECORD RESPONSE VERBATIM

>M4< Before today, had you heard of 4-H Youth Programs?

[DEF: They stress the development of young people through projects, activities, and leadership development.]

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>M4a< If yes, do you know what organization or agency in the State coordinates the 4-H youth Programs?

<0> RECORD RESPONSE VERBATIM

>M5< Before today, had you heard of Family Strengths, Food Nutrition and Health programs formerly known as Home Economics program or Homemaker Club?

[DEF: PROGRAMS IN SUCH AREAS AS FOOD AND NUTRITION, FAMILY RESOURCE MANAGEMENT, HOUSING AND HEALTH.]

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>M5a< Do you know any organizations or agencies in the State that coordinate Family Strengths and Food, Nutrition and Health programs?

<0> RECORD RESPONSE VERBATIM

>M6< Before today, had you heard of Extension Agricultural and Natural Resources Programs?

[DEF: ANY ASPECT OF CROP AND LIVESTOCK PRODUCTION AND MARKETING, FORESTRY, FISHERIES, WILDLIFE AND CONSERVATION. IT INCLUDES SUCH THINGS AS LAWN AND GARDEN CARE, AS WELL AS FARMING.]

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>M6a< If yes, do you know any organizations or agencies in the State that coordinate the Extension Agricultural and Natural Resources Programs?

<0> RECORD RESPONSE VERBATIM

>M7< Before I called today, have you ever heard of the Michigan Cooperative Extension Service, which is now known as Michigan State University Extension?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>M8< Before today, did you know any organizations or agencies in the State that coordinate research in the area of farming or production agriculture?

<0> RECORD RESPONSE VERBATIM

[DEF: ANY ASPECT OF CROP AND LIVESTOCK PRODUCTION, PROCESSING AND MARKETING.]

>M9< Before today, did you know any organizations or agencies in the State that coordinate research in natural resources and environmental issues?

<0> RECORD RESPONSE VERBATIM

[DEF: ANY ASPECT OF NATURAL RESOURCES MANAGEMENT INCLUDING FORESTRY, LAKES AND RIVERS, FISHERIES, WILDLIFE & CONSERVATION.]

>M10< Before today, did you know any organizations or agencies in the State that coordinate research in food safety, nutrition and health related issues?

<0> RECORD RESPONSE VERBATIM
[DEF: ANY ASPECT OF FOOD HANDLING & STORAGE, HEALTH & NUTRITION.]

>M11< Before today, did you know any organizations or agencies in the State that coordinate research in community and economic development?

<0> RECORD RESPONSE VERBATIM

[DEF: ANY ASPECT OF COMMUNITY DEVELOPMENT, SMALL BUSINESS DEVELOPMENT, LEADERSHIP DEVELOPMENT, ETC.]

>M12< Before I called today, had you heard of Michigan Agricultural Experiment Station?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

IF ANSWERS TO Q M2 THROUGH M12 are NO, SKIP TO Q.CD1

>X18< Please tell me if in the **past year**, you or some other members of your family attended any of the following programs.

Attended MSU Extension organized educational workshops or meetings?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED

>X19< (In the **past year**, have you or some other member of your family)
Acquired an MSU Extension bulletin or fact sheet?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED

>X20< (In the **past year**, have you or some other member of your family) Received county Extension newsletters or mailers?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED

>X21< (In the **past year,** have you or some other member of your family)
Borrowed or purchased a MSU Extension-produced video tape?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X22< (In the **past year,** have you or some other member of your family)
Attended a 4-H club or group meeting?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X23< (In the **past year,** have you or some other member of your family)
Attended a 4-H club event?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X24< (In the **past year,** have you or some other member of your family)

Heard or read about MSU Extension activities in the radio, TV,or in the newspaper?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X25< (In the past year, have you or some other member of your family)
Contacted a local MSU Extension office with a question?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X26< In the **past year,** have you or some other member of your family)

Visited the MSU campus for an Extension event such as AG Expo,
4-H Exploration Days, the Michigan Families Conference, or Animal Science Day?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X27< (In the **past year,** have you or some other member of your family)

Had an MSU Extension educator or county agent visit your home or business or school?

[DEF: This could include a 4-H agent, home economist, agricultural agent, community and economic development agent, Parent instructions, Nutrition instructions, Breast feeding instructors).

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X29< Taking all types of contact you or members of your family have had with MSU Extension in **the past 12 months** into consideration, how would you rate the quality of educational program offered by MSU Extension?

Would you say they were excellent, very good, good, fair,or Poor?

<1> EXCELLENT
<2> VERY GOOD
<3> GOOD
<4> FAIR
<5> POOR
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>X30< Do you own or regularly use a computer that has access to the Internet or World-Wide-Web?

<1> YES
<5> NO
<9> REFUSED/NO ANSWER

NOW, WE ARE ALMOST FINISHED, I JUST HAVE A FEW BACKGROUND QUESTIONS WHICH WILL HELP US KNOW OUR SAMPLE INDEED REPRESENTS ADULTS ACROSS THE STATE.

>CD1< RECORD GENDER OF RESPONDENT HERE, ASK ONLY IF IN DOUBT:
<1> MALE
<5> FEMALE

>CD2< In what year were you born?
__YEAR

>CD3< What is the highest level of education that you have completed?
<0> DID NOT GO TO SCHOOL
<1-11> GRADE
<12> HIGH SCHOOL GRADUATE OR GED HOLDER
<13-15> SOME COLLEGE (ONE TO THREE YEARS)
<16> COLLEGE GRADUATE (FOUR YEARS)
<17> SOME POST GRADUATE
<18> GRADUATE DEGREE
<20> TECHNICAL SCHOOL OR JUNIOR COLLEGE GRADUATE

>CD4< Are you engaged in any type of farming or production agriculture?
<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED/NO ANSWER

>CD4A< If yes, what type of farm do you operate or work in?

[DEF: IF THE RESPONDENT MENTIONS TWO THINGS, ASK '**Which one would you say brings you the most income or takes up most of your time?**]

<1> LIVESTOCK/DAIRY
<2> POULTRY/TURKEY
<3> ROW CROPS
<4> ORCHARD
<5> VEGETABLES
<6> FORAGES
<7> OTHERS

>CD5< Which of the following describes your racial background? Would you say African-American or Black, Asian or Pacific Islander, Native American, or White or Caucasian?

<1> AFRICAN-AMERICAN OR BLACK
<2> ASIAN OR PACIFIC ISLANDER
<3> NATIVE AMERICAN
<4> WHITE OR CAUCASIAN
<8> DO NOT KNOW
<9> REFUSED TO ANSWER

>CD6< Are you of Hispanic origin or descent, such as Spanish, Mexican, Puerto Rican, Cuban, or another Latin American background?

<1> YES
<5> NO
<8> DO NOT KNOW
<9> REFUSED TO ANSWER

>CD7< Are you currently married, divorced, separated, widowed, member of an unmarried couple, or have you never been married?

<1> MARRIED
<2> DIVORCED
<3> SEPARATED
<4> WIDOWED
<5> MEMBER OF AN UNMARRIED COUPLE
<6> SINGLE, NEVER BEEN MARRIED
<99> REFUSED-NO ANSWER

>CD8< Including yourself, how many individuals live in your household?

<---> PERSONS
<99> REFUSED-NO ANSWER

>CD9< We are interested in learning about the different ways people may earn their living. Last week, were you working full-time, part-time, going to school, a home-maker or something else?

[DEF: IF THE R MENTIONS TWO THINGS, ASK 'Which one would you say you do the most or takes up most of your time?[n]
<0> SELF EMPLOYED EITHER FULL OR PART TIME
<1> WORK FULL TIME
<2> WORK PART TIME
<3> WORK AND GO TO SCHOOL
<4> IN THE ARMED FORCES
<5> HAVE A JOB, BUT NOT AT WORK LAST WEEK (ON VACATION OR LEAVE)
<6> UNEMPLOYED, LAID OFF, LOOK FOR WORK
<7> RETIRED
<8> SCHOOL FULL TIME
<9> HOME-MAKER
<10> DISABLED

>CD10< To get a picture of people's financial situations, we'd like to know the general range of incomes of all households we interview. This is for statistical analysis purposes and your answers will be kept strictly confidential. What is the gross annual income of your household--that is, before taxes or other deductions?

<1> Less than $10,000
<2> $10,000 - $14,999
<3> $25,000 - $49,999
<4> $50,000 - $99,000
<5> $100,00 - $249,000
<6> $250,000 - $499,000
<6> $500,000 - or more
<99> REFUSED-NO ANSWER

>CD11< In which county do you live (County of primary residence)?

NAME OF COUNTY

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