

Allegan County

2014–2015 ANNUAL REPORT



MESSAGE FROM THE DISTRICT COORDINATOR

A mission statement communicates the purpose of an organization. Our mission statement is: “Michigan State University Extension helps people improve their lives by bringing the vast knowledge resources of MSU directly to individuals, communities and businesses.” Over the past 12 months, our staff have worked with citizens throughout Allegan County to address local needs by connecting people to the resources of the university.



In this annual report, there is not enough space to give a complete accounting of all of the important work done by MSU Extension staff across Allegan County. I will try to capture some of the most significant highlights of our work in 2015 and give a sense of the direction of our work in the future.

And though I express my appreciation to you for your continuing and strong support every year, it remains true that without you, we would not be here doing this important work with your constituents. Once again, thank you.

Betty Blase

District Coordinator, District 7

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MEASURING OUTREACH

CONNECTING WITH RESIDENTS

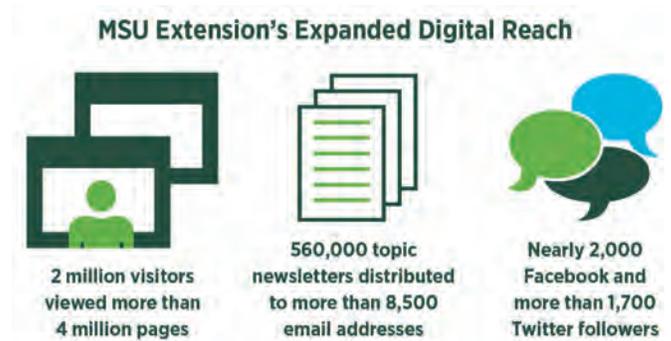
4-H Children and Youth programs.....	3,869
4-H members (traditional club enrollment).....	600
Special Interest program participation	3,111
Youth in 4-H camping programs.....	502
Youth in school enrichment programs.....	1,517
Youth volunteers	104
Adult volunteers.....	259
Master Gardeners recertified.....	26

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DISTRICT 7 DIGITAL REACH

From July 1, 2014, to June 30, 2015, 112,812 visitors from our 3-county district viewed 299,071 pages of rich, science-based content on the MSU Extension website (msue.msu.edu). Search engine rankings make msue.msu.edu one of the most visited Cooperative Extension Systems education sites in the country.



Based on data from July 1, 2013 to June 30, 2014.

SUPPORTING FOOD AND AGRICULTURE

Farm Business Management

Michigan agricultural businesses are competing for market share and profits domestically and in a world economy. Food safety concerns, highly volatile energy prices, an aging population of active farmers, tax law changes, weather-related disasters, credit availability and cost are challenges producers face.

The 2014 Farm Bill introduced major changes in risk management programs for corn, wheat, soybean, fruit, vegetable and dairy producers in Michigan. These new programs, combined with an anticipated decrease in commodity prices, created major risk management decisions that will affect the financial success of Michigan producers during 2014-2018 (the life of the 2014 Farm Bill).

Because the bill required a one-time irrevocable decision by producers, educational programming in this area required the combined farm management, financial analysis, and marketing subject matter expertise of many MSU agriculture educators and faculty. The irrevocable decision, combined with the complexity of these new programs and uncertainty of the long-term commodity price outlook, created a unique urgency for this programming.

In collaboration with the USDA Farm Service Agency and commodity organizations in Michigan, the MSUE FIRM team (Farm Information Resources Management) developed a one-stop source of information for producers and landlords that included:

- (1) a set of publications for Michigan producers and landlords,
- (2) decision-making software to analyze the financial consequences of alternative program decisions,
- (3) integration of the FIRM software with advanced risk management tools developed at the University of Illinois and Texas A&M University, and
- (4) 110 local and regional educational meetings that reached a total audience of 8,000 producers throughout the state.

When you support MSU Extension, you help participants learn profitable and efficient business and production practices.



"It's like a Swiss Army knife."

President Obama 2/14

Supporting Food and Agriculture, continued

Farm Business Management—Ag labor

Understanding and complying with Farm Labor Laws has become increasingly more difficult due to the changes in the laws and the numbers of issues facing farm employers. The 2015 West Michigan Ag Labor meeting, held on 2-26-15 in the Ottawa County Fillmore Complex, assisted ag employers to understand issues impacting them and their employees. It also included an update on labor regulations that impact farms. The agenda included the following:

- Accounting system and records that meet U.S. Department of Labor rules; passing a DOL audit—From Mary O'Rourke, U.S. Department of Labor
- Tips from an ag labor attorney on proper accounting records—Kim Clarke, Varnum LLC
- Correct steps for farmers to follow when working with a farm labor contractor. Legal pitfalls to avoid—Tom Thornburg, Farm Worker Legal Services
- What farmers need to know if you are hiring H2-A workers. New housing upgrades that Michigan Department of Agriculture and Rural Development is focusing on. —Robert Bausick, MDARD
- Update from US Homeland Security Investigations; the IMAGE and E-Verify process; deferred action for childhood arrivals (DACA) process; worksite enforcements in West Michigan—Cory Howe, U.S. Department of Homeland Security
- Results of the 2014 Pilot H-2A Programs in Michigan
- What was learned during the 2014 growing season...thoughts for 2015 Sarah Pion, Michigan Farm Bureau and Amy Irish-Brown, MSU Extension
- What smaller employers need to consider when looking at health insurance plans for their workers—Dr. Adam Kantrovich, MSU Extension.

This program was planned with input from area growers representing all types of farms in West Michigan.



Supporting Food and Agriculture, continued

Dairy Industry

Michigan State University's Dairy Team focuses on dairy production to enhance the competitive advantage of Michigan dairy producers and the industry. Through specialized dairy programs ranging from online resources and educational seminars to face-to-face programs throughout the state, the MSU Dairy Team provides Michigan's dairy industry with easy-to-access information on a consistent basis.

Caring for dairy cattle requires knowledge and skills that ensure cattle are healthy, comfortable and capable of producing a safe and nutritious product. Relevant, science-based information and tools are provided on such dairy production topics as :[Animal Health](#), [Calves and Heifers](#), [Dairy Nutrition and Feeding](#), [Genetics](#), [Herd Management](#), [Milk Quality](#), [Nutrient Management and Environment](#), and [Reproduction](#).

MSU Extension dairy educators held calf care schools in 2015 in Hamilton, Ionia and Bad Axe . This was an excellent opportunity to develop and refine any calf manager's or care giver's skills for raising dairy calves. Emphasis was on practical application of science-based knowledge on topics like newborn calf care, milk/milk replacer, calf housing, and monitoring performance. This training can be implemented on any dairy farm. Participants learned concepts and skills related to profitable calf management from birth to weaning (first two months of life). Twenty-five people participated in the program in Hamilton. MSU Extension educators Kathy Lee and Faith Cullens, and Matt Lund (Calf & Heifer Specialist, Purina Animal Nutrition) were the presenters.

Other dairy programs held in 2015 included:

- Establishing Reproductive Management Strategies That Work
- Focus on Dairy Production meetings, covering topics including :
 - * Calf Health: Your Cows' Profit Potential Begins Now
 - * Bovine Leukemia Virus: Should You Be Concerned?
 - * Feeding High Corn Silage Diets
 - * Animal Handling Tips for Employee Training Programs
 - * Winter Manure Storage, Handling and Application – Emergency Response to Manure Spills

Proper care and management of heifer calves has a tremendous impact on their profitability as lactating dairy cows.

In the 2012 USDA Census of Agriculture, Allegan County milk production was valued at almost \$82 million.



Fighting back against emerging pests



The spotted wing drosophila (SWD) and the brown marmorated stink bug are two invasive pests that pose big threats to Michigan's fruit production. In Michigan, the first SWD were found in late 2010. In 2011 first captures were in early July, in 2012 first captures were in late May. Across Michigan, SWD is now found throughout the fruit production regions in fields of blueberry, blackberry, raspberry, cherry, and grape, also in many wild habitats where the flies infest wild fruiting plants.

The SWD has an optimal developing temperature of 65 to 70° F, normal conditions during a Michigan growing season. This makes early detection information vital to activate pest management programs that prevent rapid population increases and potential infestations.

At Michigan State University Extension, our goal is to support blueberry growers and small fruit industry efforts to increase productivity while maintaining high standards in food safety, protection to workers, consumers and our environment. To achieve this, the MSUE small fruit team prepared workshops and twilight meetings beginning in March. Activities were directed to meet the needs of our clientele as expressed during end of season evaluation sessions, as well as priorities established by the blueberry industry. Topics covered during the March meeting included updates on the industry, insect management, winter and frost protection, disease management, plant nutrition, weed control, EnviroWeather, and the 2015 blueberry export program.

Farm visits were done in 2015 for weekly monitoring about SWD activity. On-farm research was done to evaluate different baits for monitoring, comparison of new and existing insecticide sprays, studies to improve timing of SWD control practices, and measurement of pesticide residues to support blueberry exports and marketing.

Also in 2015, advanced integrated pest management (IPM) for Hispanics at Trevor Nichols Research Center (TNRC) and Michigan Works! included hands-on training on use & management of insecticides for SWD control under different weather conditions. Materials developed in English were translated into Spanish for training of Spanish-speaking audiences.



Spotted Wing Drosophila



Advanced IPM training for Hispanic blueberry growers. Classroom training at MSU TNRC.

Supporting Food and Agriculture, continued

Pollinator management for fruit production

Pollinator insects are a key component of success for fruit, vegetable and nut crops. In November, Michigan State University faculty and MSU Extension staff provided a training for growers on best management practices to support pollinators on fruit farms.

Dr. Rufus Isaacs is a professor and extension specialist in the Department of Entomology at Michigan State University, where he directs the Berry Crops Entomology program. He has worked as an agricultural entomologist for twenty years conducting research in vegetable, field crop, and fruit agriculture, studying various aspects of insect behavior, ecology and management. Pollinator conservation and pollination of fruit crops is a current focus of his lab, where he works with students and postdoctoral researchers to develop strategies for sustainable pollination. Their recent studies have identified the native bee community in blueberry farms, examined bee-pesticide interactions, and quantified the contribution of native bees to crop pollination.

A blueberry pollination workshop held at Trevor Nichols Research Center in Fennville on 11-4-15 was designed to give growers a more complete understanding and better control of pollination during blueberry bloom. Presenters at the workshop included:

- MSUE educator Mark Longstroth on the importance of pollination to blueberry production.
- Dr. Katharina Ullmann and Emily May of the Xerces Society introduced the concept of Integrated Crop Pollination.
- Dr. Jason Gibbs, MSU, identified different bee pollinators.
- Dr. Rufus Isaacs, MSU—farm practices to increase pollination and those that support wild bee pollinators.
- Dr. Meghan Milbrath, MSU—increasing communications with commercial beekeepers.
- Hands-on bee identification; field protocol to assess pollination during bloom.



Photos: Betty Blase



“Bees of the Great Lakes region and wildflowers to support them—A guide for farmers, gardeners and landscapers” is a new, pocket-size publication from MSU. The photos and descriptions in this spiral-bound book will help farmers and gardeners identify the many species of bees inhabiting Michigan and surrounding states, and the native plants that can be grown to provide pollen and nectar. This publication can be ordered for \$10 from www.shop.msu.edu by entering E3282 in the search box.

Soybean production

In 2015, MSUE senior soybean educator Mike Staton provided research-based education to producers across Michigan to help them adopt new best practices of soybean production, and ultimately improve production efficiency. Improving production efficiency is a multi-dimensional process, including topics of pest management, plant nutrient management, variety selection, planting depth, equipping and operating sprayers to control insects and diseases in soybeans, and earlier harvest to prevent loss.

Specific educational efforts in 2015 included:

- **On-farm research review:** An educational meeting was held in Hamilton on January 20th to share results of statewide on-farm soybean research trials with local soybean producers and agribusiness agronomists.
- **Three on-farm replicated soybean research trials** were conducted in Allegan County. Allegan County soybean producers are generating information that will be published in the 2015 SMaRT (Soybean Management and Research Technology) research report and will help Michigan soybean producers become more profitable.
- More than 100 soybean producers learned how to **reduce soybean harvest losses** and increase farm income by \$9.25 to \$18.50 per acre in 2015. The fifth annual soybean harvest equipment field day provided participants with new information about reducing soybean harvest losses and operating farm trucks on public roads. Equipment company representatives discussed specific recommendations for fine-tuning their combines to minimize harvest losses. A YouTube video of the event <https://youtu.be/eGAWlXqY6FY> has received more than 900 views.
- **White Mold and Irrigation Water Management in Soybeans:** Workshop held on March 5th in Shipshewana, IN. MSU Extension led this multistate educational program involving Indiana and Michigan. Sponsors included Purdue University, the Michigan Soybean Checkoff and the Indiana Soybean Alliance. More than 270 soybean producers and agronomists learned the latest university recommendations for managing soybean diseases and scheduling irrigation water applications. Speakers were from Michigan State University, Purdue University and North Dakota State University.



Allegan County leads the state in soybean production, with 53,591 acres.

USDA Census of Agriculture, 2012



Supporting Food and Agriculture, continued

Pork production

MSU Extension provides trusted information about all aspects of pork production, from intensively managed commercial operations to niche pork farms and youth show pig producers. We use a multi-disciplinary approach to enhance production of safe, nutritious, high-quality pork in an environmentally, economically sustainable and socially responsible manner. Two educational programs in 2015 are examples of a larger programming mix that Allegan producers have access to:

Grow-Finish Production -Viable pieces of the business The pork winter meeting was held at four locations in Michigan including the January 19th meeting in Allegan, sponsored by Allegan County Farm Bureau. This program included the following topics:

- Making your finishing site competitive
- Feeding heavy weight pigs, will the trend continue?
- Total finishing monitoring - optimizing your ventilation system
- Where's the Feed? - Impacts of out-of-feed events on production
- Records and Audits-fulfilling expectations
- Euthanasia Tools Demonstration

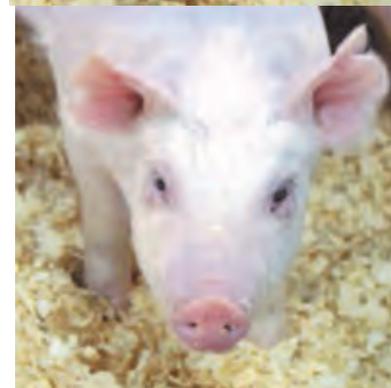
Clean Trucks and Clean Drivers—livestock transportation biosecurity. Held at the Travel America Truck Stop, Tekonsha, Michigan, 8-14-15. This educational program for livestock transporters, pork producers and truck wash personnel was a partnership effort between the Michigan Department of Agriculture and Rural Development, the Michigan Pork Producers Association, and Michigan State University Extension, with funding from the USDA.

The pork industry faces many challenges with the introduction and spread of Porcine Epidemic Diarrhea virus and other diseases. Livestock transporters have been identified as a major partner in the production chain, connecting the pork producer to the packer for product delivery. Knowledge around biosecurity issues of livestock transportation will ensure more awareness, and possible re-evaluation of practices to protect on-farm investments and other assets required for product delivery in the pork industry.

Topics included:

- biosecurity practices and practical standards to help protect swine herds
- how to keep trucks on the road and business growing based on feedback received from pork producers
- swine diseases; the appropriate way to enter and exit the cab of a semi with biosecurity in mind
- disinfectants and how they work

All participants received a biosecurity kit equipped with necessary tools to improve biosecurity practices while transporting livestock.



Allegan County is the #1 producer of pork in Michigan. More than 252,000 hogs and pigs are raised here.

USDA Census of Agriculture, 2012

Supporting Food and Agriculture, continued

Keeping Businesses Strong

MSU Extension and the MSU Product Center help Michigan entrepreneurs develop and commercialize high-value, consumer-responsive products and businesses in the food, agriculture, natural resources and bio-economy sectors. This fuels the economy by creating and retaining jobs, and helps ensure a healthy tax base.

Meeting the needs of Michigan meat producers

For the fifth consecutive year, MSU Extension meat quality educator Jeannine Schwehofer provided educational programming at Byron Center Meats annual producer appreciation and education day, held in Byron Center. Of the 90 people in attendance, 25 were from Allegan County. This year she revisited the topic of pricing direct marketed meat, specifically pricing beef carcasses, and introduced an Excel worksheet co-developed with the University of Wisconsin Extension.

Producers who direct market beef need resources to help establish and change their pricing. Changing prices can be a daunting task for some producers who do not know what to charge to cover their costs or deal with recent fluctuating and rising beef prices.

To address this issue, a [Freezer beef pricing worksheet](#) was created in Excel and demonstrated at the workshop to help producers determine what price to charge per pound of hanging weight. This tool can make a significant difference for beef producers by helping them properly calculate cost of production and price needed when direct marketing meat. This can improve their business model, profitability, and ability to help customers compare the price of purchasing freezer beef with retail average pricing.

Many favorable comments were received from producers about the pricing worksheet. Of those who completed evaluations, 63% indicated they plan to implement change, primarily on how they were pricing their product.

Comments from participants show the value they place on this annual training: “I basically gain more confidence in what I’m raising and in selling it. That is huge. And each event gives me a more rounded education in the whole arena. Thanks.”

Changes that participants planned to implement include:

- “Figuring costs to price needed for profitability; I will use the MSU calculator more to figure cost.”
- “To try to figure out how to use more of the waste products- fat and bone.” and
- “Use programs available through MSU.”

When you support MSU Extension, you help participants understand the economic, environmental and social benefits of purchasing local and regional foods.



Supporting Food and Agriculture, continued

Enviroweather

In 2015, a second Enviroweather station was built in Allegan County, joining the station at Fennville. The newest site was hosted at Badger Evergreen Nursery and is funded in part by: Badger Evergreen Nursery, Peterson Riverview Nursery, Armintrout's West Michigan Farms Inc., Green Valley Agricultural Inc., Michigan State University Extension, Michigan State University AgBio Research, and Project GREEN.

Enviroweather Weather Data and Pest Modeling aims to help users make pest, plant production and natural resource management decisions in Michigan by providing a sustainable weather-based information system. This online resource provides 'local' weather information and weather-based tools. There are currently 78 weather stations throughout Michigan (each yellow dot on the map)

Each station provides readings every 30 minutes of air temperature, soil temperature, soil moisture, relative humidity, solar radiation, wind speed and direction, precipitation, leaf wetness.

Weather influences crop and pest development and management decisions. For example, wind speed and direction for drift management, temperature to prevent phytotoxicity that may result from applications on hot days, insect and pathogen development are all influenced by weather.

Model predictions allow growers to prepare to take management action if necessary. Enviro-weather tools are intended to assist not dictate management decisions. The decision to take management action should be influenced by several factors including: a history of problematic pests, the current season pest pressure, susceptible crops, and past and predicted weather events.

Enviroweather is a collaborative project of: Michigan Climatological Resources Program & the MSU Integrated Pest Management Program. It is supported by: Project GREEN, MSU AgBio Research, MSU Extension, private donors, and the MSU departments of Crop and Soil Sciences, Entomology, Forestry, Geography, Horticulture, and Plant Pathology.



Enviroweather stations in Michigan



Weather Station at Allegan

Information in this article was taken from "Using Enviro-weather to assist pest management decisions", a presentation at the 2014 Integrated Pest Management Academy by Emily Pochubay, Fruit Integrated Pest Management educator for MSU Extension,

Trevor Nichols Research Center, Fennville

Michigan fruit producers are in competition with more than 30 fruit pests that threaten to damage their crops. The Trevor Nichols Research Center (TNRC) in Fennville, established in 1967, is one of 13 MSU AgBio Research centers and several on-campus research facilities that provide growers, natural resource managers and commodity groups with critical information they need to remain viable and competitive in the global economy. Dr. John Wise, Professor of Entomology at Michigan State University, is the Research and Extension Coordinator at TNRC.

The primary objective of the 156-acre center is to find the best ways to keep fruit pest-free in Michigan while preserving the environment and ensuring economic viability for the state's fruit growers. Research topics include studying performance attributes of reduced-risk pesticides, optimizing delivery systems for crop protection materials, monitoring and controlling invasive and emerging pests, and developing novel pest management tactics. The center also supports IR-4, a United States Department of Agriculture project that works with specialty crop growers, registrants and the United States Environmental Protection Agency to register products for use on specialty crops, including reduced-risk pesticides.

In 2015, the TNRC hosted fruit crop research on topics of:

- invasive species,
- protecting pollinators, and
- novel delivery systems such as trunk injection, attract N kill, and solid set delivery systems.

They conducted GLP (Good Laboratory Practices) field residue trials in association with the USDA IR-4 Project to help register new reduced-risk pesticides for fruit growers.

The Research Center also hosted several MSU Extension events targeting pollinator safety, controlling Spotted Wing Drosophila and the annual pesticide performance field day.



Trevor Nichols Research Center will be the recipient of several generous donations from the Michigan Tree Fruit Commission, including a new research sprayer and laboratory renovations.

DEVELOPING YOUTH AND COMMUNITIES

Supporting STEM careers through youth programming

The future of Michigan lies, in part, in students' abilities to excel in science, technology, engineering and mathematics (STEM). Science literacy among school-aged youth in Michigan is below the national average, impacting college readiness. In the U.S., many job openings for STEM-related positions go unfilled due to lack of qualified applicants.

MSU Extension provides resources aligned with Michigan science education standards to teach confidence, leadership and responsibility related to STEM. This can include specific projects in 4-H such as animal science, computers, small engines, electricity, electronics, and robotics.

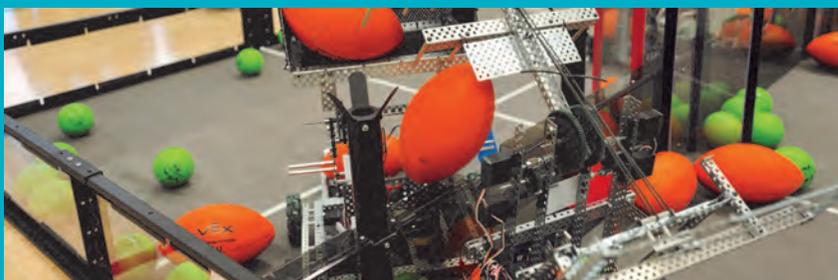
Animal science is an important area of STEM where many Allegan 4-H'ers excel. People think that having an animal project means a youth feeds an animal then takes it to the fair and sells it. This is only a small part of the learning experience which includes:

- Disease prevention, control, and treatment (biology, chemistry)
- Anatomy and physiology
- Training—behavioral science
- Food safety—preparing food for human consumption
- Environmental stewardship
- Life skills—responsibility, planning, problem solving, ethics, money management.

LEGO Mindstorms and EV3 Robotics: MSU Extension staff facilitated an educator training workshop for LEGO Mindstorms and EV3 Robotics in March at the Allegan Area Educational Service Agency. Volunteer instructors included Bill Cain (Allegan Co. Technical Education Center), Michael Miller (Otsego Public Schools), and Amy Oliver (Allegan/Van Buren Math & Science Center).

Allegan County youth participated in 4-H Robotics during summer programming at Fennville Public Schools and Otsego Middle School. Activities included building simple robotic machines, building and programming computer-programmed autonomous robots, using the Lego Mindstorm Education EV3 Core Set, and other activities that teach them to think outside the box with limitless possibilities.

When you support MSU Extension 4-H programs, youth participants learn life skills that prepare them for the workforce – especially for highly sought after jobs in science, technology, engineering and mathematics (STEM).



"We greatly appreciate the opportunity to offer this program to our students and were only able to do this because of the free access to the LEGO EV3 Robotics loaner kits as well as training for our instructors. This was made possible by the EV3 Design grant. We plan to use the loaner kits in an after-school program during the 2015-16 school year"

Allegan County School Teacher

The dairy youth program at Michigan State University focuses on providing educational opportunities to Michigan youth who are interested in the dairy industry.

Michigan State University dairy youth program

The Michigan State University dairy youth program has a long and respected history of offering hands-on and practical skill-building learning experiences. From interacting in classroom-type learning sessions to competing in contests that test one's knowledge about dairy-related subjects relative to peers, young people often credit the program with helping them develop and hone personal and professional skills.

Participating in dairy youth programs at the local and state levels provides a platform for youth to improve public speaking skills, nurture leadership qualities, and sharpen critical thinking and problem-solving skills. Young people have chances to work together, learn how to more effectively exchange ideas and communicate with others to achieve a common goal.

The Michigan Dairy Expo is the largest annual dairy event in the state. Michigan 4-H Youth Dairy Days is the youth-centered portion of the Expo, offering young people interested in the dairy industry opportunities to compete in educational activities for premiums, ribbons and scholarships. These include dairy quiz bowls, dairy management contests, dairy cattle judging competitions and the Dairy Days youth show. This year, nearly 150 youth from around the state participated in one or more of the educational competitions. Winners may go on to represent Michigan in national competitions.

For the second year, Allegan County Team A was the winner in the junior category of the Dairy Quiz Bowl. Team members included: MaKenna Davies, Wayland; Shannon Good, Caledonia; Caleb and Katrina Tucker, Hopkins; and Casey Ybema, Hopkins.

Allegan County also won the 2015 senior division of the Dairy Quiz Bowl. The winning team members included Shelby Berens of Holland; Samantha Boettcher of Gobles; Isaac Elzinga of Hopkins; and Miles Wixom of Bloomingdale.



MICHIGAN DAIRY YOUTH PROGRAM



Developing Youth and Communities, continued

Exceptional 4-H'er

In November, Miles Wixom was named “Exceptional 4-H'er” by “The Farmer’s Exchange” newspaper. This honor tops off years of hard work and perseverance for Miles. He is a junior at Bloomingdale High School and 11-year member of Allegan County 4-H. Recently, Miles said that winning Top Beef Showman at the Allegan County Fair in 2015 was his biggest personal success. “This has been my goal for several years. I have made slow, steady progress and finally made it.” His biggest challenge was figuring out how to self-teach when he started into beef.

Other highlights of 2015 for Miles:

- Winning Top Senior Showman at the Hudsonville Community Fair
- The best heifers yet were born into his herd of beef
- Selected to represent Allegan County in the beef category for State Awards
- Attended 4-H Exploration Days at MSU
- Clipped/fit cattle at several shows for income and taught a clipping/fitting clinic
- Member of Allegan County Dairy Team for MSU Dairy Days. At competition, they:
 - Won 1st place for the Senior Dairy Quiz Bowl Team
 - Won 2nd place Senior Management Team
 - Won 2nd place Senior Judging Team
 - Won 2nd place overall individual in Management
- Entered individual livestock judging at MSU Beef Expo on short notice; won 6th place. Former Allegan 4-H member Kendra VanOrder, a senior at MSU, organized a team that won judging contests in Allegan and Calhoun County. Placed 11th individual at Michigan Livestock Expo. Selected to compete nationally at Harrisburg, PA where the team placed 3rd and Miles won 7th place individual in swine.
- At the Allegan County Fair, Miles:
 - won showmanship class
 - went on to win Top Beef Showman
 - went on to win Master Showman
 - had Reserve Champion Beef Heifer with a homebred calf
 - had Reserve Champion Carcass Steer

His 4-H experiences in showmanship, competition and livestock judging have helped him develop skills that will serve him well in the future. He knows how to work hard toward his goals and has developed self-confidence and courage to try new things. Showmanship taught him how to ‘work’ the attitude, how to ‘own’ the class and present in a way that is consistent, and how to train a steer to walk into set-up. He has learned to speak about his accomplishments and ideas in a positive, organized way, to evaluate livestock for judging then present the reasons for his decisions and deliver them in an organized persuasive way. Finally, he has developed “follow through”.

Congratulations, Miles on a great year in 4-H!



“I could not be any more proud of Miles and all of the hard work and dedication that he had put in over the past year to get not only his steer, but himself ready for the fair. Not only did he win Top Beef Showman, but . . . he won the Top Fair Showman Sweepstakes contest! Congratulations, Miles! No one deserved it more! You have been more than a pleasure to work with! It always makes me so happy that such great kids win such great awards! “

Kendra VanOrder



Global and Cultural Competency

Artwork pieces showcased on this page were created by Allegan County youth. More artwork can be found at this link:

<http://4h.msue.msu.edu/uploads/files/MI-ChinaArtExchange15-Web.pdf>

Helping young people to explore and appreciate what people around the world have in common and what makes them unique is critically important in society today. Michigan 4-H offers a variety of opportunities for youth and adults to learn more about our global community through the 4-H Art Exchange with China.

The Michigan 4-H China Art Project, conducted in cooperation with the People's Republic of China (Binzhou City, Shandong Province), is a global education program that uses the arts for both in-school and after-school learning experiences. As part of the art exchange, Michigan children are asked to paint or draw "visual letters" for Chinese children.

A visual letter is like a written letter in that both tell stories, share important ideas and feelings, and connect youth regardless of where they live. The medium is different as visual letters use images rather than words to communicate a story from one child to one another.

Since this educational exchange project began twenty-five years ago, more than 300,000 Michigan youth have participated. In 2015, youth in twelve Michigan counties participated in the project.

This year 1,177 Allegan youth participated in the art exchange program across many public schools in Allegan County. Twenty-three of the art pieces submitted by Allegan students were selected to be sent to China. All the Michigan children's artwork becomes part of an on-line art exhibit, "Visual Letters—The Art of Michigan Children Traveling Art Exhibit."

Written comments from classroom teachers are overwhelmingly positive. One teacher shared how a disabled youth was greatly moved when their artwork was chosen knowing that they were treated and selected equally among their peers.

The Michigan children's artwork sent to China will be exhibited in schools in Shandong Province. Art pieces sent from Chinese children are exhibited in schools in the twelve participating counties.



"Birds of the Feather" by Brenna, age 10



"A Quiet Day" by Sydney, age 10



"A Scientific Creation" by Thelma, age 9



"Barking Rooster" by Kayla, age 9



"Banana Palooza" by Ava, age 8

ENSURING SAFE AND SECURE FOOD

Teaching residents about food safety

Cottage Food Law; Cooking for Crowds; ServSafe

From farm to table, food safety is an important issue. Foodborne illness costs the U.S. economy billions of dollars each year in lost productivity, hospitalization, long-term disability and even death.

The Michigan Cottage Food Law took effect in July 2010, allowing home-processed foods to be sold to the public, emphasizing the need for food safety education. MSU Extension Cottage Food Law workshops supply Michigan residents with up-to-date, scientifically backed information on food safety.

In 2015, the program: “How to Start a Successful Cottage Food Business in Michigan” was held in Allegan County with eighteen people (seven from Allegan) in attendance. Participants learned about preserving food and preparing safe food for public consumption. They also learned about sanitizing surfaces before preparing food, how to properly prevent food cross-contamination, the importance of washing their hands and of keeping countertops clean when preparing foods. The next Cottage Food Law training will be held in Allegan in April, 2016.

ServSafe—Food Service/Safety Certification Training

Michigan State University Extension offers ServSafe, a national certification program for food service workers. ServSafe teaches about foodborne illness, how to prevent it and how to train employees about the latest food safety issues.

Topics include:

- ◇ providing safe food,
- ◇ forms of contamination,
- ◇ the safe food handler,
- ◇ the flow of food,
- ◇ food safety management systems,
- ◇ safe facilities & pest management,
- ◇ cleaning & sanitizing.

MSU Extension educator Jane Hart taught a four-hour ServSafe class in July at the Allegan Tech Center for the Youth Summer Program of the Allegan Area Educational Services Area, associated with Michigan Works! 18 Allegan youth participated.



MSU Extension efforts in ensuring safe and secure food lead to a healthy population, which in turn helps keep health care costs in check and our communities viable.



In 2013, nearly 4,000 Michigan residents learned about preserving food and preparing safe food for public consumption.

ENSURING STRONG COMMUNITIES

When you support MSU Extension, participants learn how to implement best practices in good governance that keeps communities solvent, productive and engaged; learn effective conflict management skills that help leaders and residents work collaboratively on complex issues; and engage youth leaders in decision-making. In the personal finance area, MSU Extension helps youth and adults alike learn the skills they need to increase their savings, manage their spending avoid predatory lending and reduce mortgage defaults. All of these outcomes help lower the cost of governmental services and lead to personal and community stability, strong neighborhoods and safe communities.

Helping Michigan residents make smart money decisions

Michigan State University Extension Financial and Homeownership Education aligned with the [National Strategy for Financial Literacy for 2011](#). This strategy is still valid. The National Strategy establishes a long-term vision of financial success, financial stability, and financial security for the diverse U.S. populace. This national strategy seeks to foster a culture in which households take periodic stock of their financial situations, individuals seek information and ask questions before entering into financial transactions, and everyone has the information and tools needed to help manage debt, save to meet their financial goals, and plan for secure financials futures.

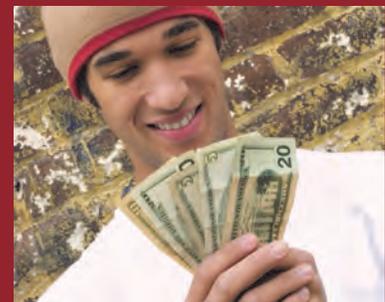
In 2015, MSU Extension educator Jinnifer Ortquist provided a 3-part series of classes to participants in Allegan on the following aspects of money management:

- Making sound financial decisions
- Creating a spending plan and save more
- The importance of saving and investing
- Paying down debt and use credit wisely

She provided these classes through local partnerships with Michigan Works! PATH program (23 participants) and the Allegan District Library (8 participants). She also provided a one-time training on money management to 13 community or church pantry workers through a partnership with Feeding America West Michigan.

Many Americans are not planning ahead for their financial future. In Michigan, 60% of individuals lack a rainy day fund to cover expenses for three months, in case of emergencies such as sickness,

MSU Extension helps youth and adults alike learn the skills they need to increase their savings, manage their spending avoid predatory lending and reduce mortgage defaults.



Ensuring Strong Communities, continued

Attracting talent through placemaking

Placemaking, a strategy led by local governments and planning commissions, can be a cornerstone of the local community's and Michigan's economic recovery. As the state moves to be more competitive in the New Economy, it focuses on attracting and retaining educated people by making communities rich in physical and cultural amenities, and making it easier to forge partnerships between businesses, governments and nonprofits. Attracting and retaining knowledge workers, educated people, is key to a community having new businesses, entrepreneurs, and economic vitality.

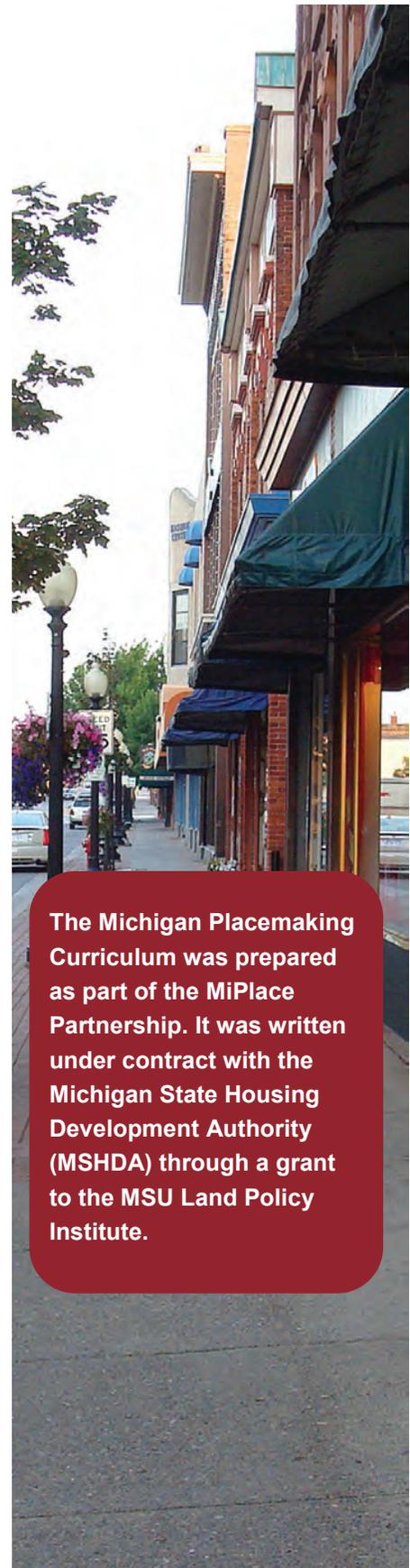
The Michigan Placemaking Curriculum is a comprehensive training program covering the latest research on placemaking as an important economic development strategy, Placemaking is the role of urban form in creating a sense of place, and tools and techniques for engaging the public in placemaking.

- » As of July 2014, more than 10,000 people have received the Michigan Placemaking Curriculum via educators or trainers.
- » More than 70 trainers across the state have been trained by MSU Extension educators and specialists.
- » Allegan, Alpena, Dearborn and Sault Ste. Marie piloted PlacePlans, an effort to help communities design and plan for specific transformative placemaking projects.

In late 2014, representatives from three communities in Allegan County—Saugatuck, Douglas, and Saugatuck township—participated in six educational sessions with MSU Extension staff on placemaking. A follow-up Placemaking Strategy workshop was held in April, 2015 with the same communities. MSU Extension educator Julie Pioch served as facilitator. Eighteen people attended the April training with a goal of developing some priorities for placemaking common to the three communities and to begin work on formulating a Placemaking action plan. Some of the identified priorities included:

1. Bike trails/parking/friendliness through downtown.
2. Wifi.
3. Ambiance lighting.
4. Water taxi, trolley, rickshaw to connect Saugatuck to Douglas.
5. Sewer and water infrastructure.
6. Storm drain infrastructure.
7. Wayfinding signage.

In addition to discussing common interests in placemaking projects, members of the group realized the importance of being involved in regional master planning and visioning efforts and how to leverage community assets such as the Harbor in discussions of regional economic prosperity.



The Michigan Placemaking Curriculum was prepared as part of the MiPlace Partnership. It was written under contract with the Michigan State Housing Development Authority (MSHDA) through a grant to the MSU Land Policy Institute.

Placemaking, a strategy led by local governments and planning commissions, can be a cornerstone of Michigan's economic recovery.



KEEPING PEOPLE HEALTHY

Working to improve social emotional health

Many negative factors affect social and emotional health, including ongoing and toxic stress. Although some stress in life is unavoidable, learning to manage stress is key to living a more productive and healthy life. MSU Extension has a variety of programs to help adults increase knowledge and skills around anger management, stress management and building positive communication styles. Programs provided include Stress Less with Mindfulness, RELAX: Alternatives to Anger and Be SAFE Bullying Prevention.

Agencies throughout the area have partnered with us to offer this training to their participants. Last year, MSU Extension provided over 50 Allegan residents education on anger and stress management and bullying prevention through childcare conferences including the Challenge of Children conference and the Kent Regional 4C conference.

In addition, many Allegan residents participated in workshops on topics of stress and anger management through the Byron Center Library, AppleTree Professional Development Day, and Imagination Station Staff Development Day. A presentation on Child Development at the Telamon Migrant Head Start Preservice Education Training in East Lansing was also attended by Allegan child care providers.

Allegan Early Head Start hosted a series of trainings for their parents provided by MSU Extension on mindfulness and anger management. The Allegan Public Library also hosted a training on mindfulness.

Why is this education important? In 2013, MSU Extension collected 712 RELAX evaluations from participants throughout the state. Consistently, more than half of program participants leave RELAX with improved knowledge or new skills that promote social and emotional well-being with others in their lives and immediate social environments.

- » 54 percent increased effort to talk things through until a solution is reached.
- » 55 percent increased effort taking time to understand how others feel.
- » 56 percent increased effort working hard to be calm and talk through issues.
- » 56 percent increased effort that if they do get upset, they try to end conflicts on a positive note.

RELAX: Alternatives to Anger is designed to actively engage adult learners to increase knowledge and skills around anger management and give them constructive ways to deal with anger.



Keeping People Healthy, continued

Disease prevention and management

Supporting MSU Extension disease prevention and management education programs helps participants increase their ability to lead a healthy lifestyle. This greatly reduces a person's risk for developing chronic disease or improves disease management. Chronic diseases are among the most prevalent, costly, and preventable of all health issues.

Access to high-quality and affordable prevention measures are essential to saving lives, reducing disability, and lowering costs of everyone's medical care.

MSU Extension is positioned to provide education related to prevention and management of leading chronic diseases. Michigan ranks 13th nationally for prevalence of diabetes and 17th nationally for obesity. An estimated 10% of Michigan adults have been diagnosed with diabetes – about 758,000 people. An additional 250,200 Michigan adults are estimated to have diabetes but are currently undiagnosed.

Healthcare costs are 2.3 times higher for a person with diabetes compared to a person without diabetes. Moreover, 80% of older adults have two or more chronic conditions, putting a financial burden on the health care system. Reducing the prevalence and improving management of diabetes is a public health concern for all Michigan citizens to reduce healthcare costs. The cost of treating diabetes is expected to triple in Michigan over the next 25 years.

In 2015, MSU Extension educator Christi Demitz offered the 5-part series **“Dining with Diabetes” at the Allegan District Library**. This evidence-based program was developed by West Virginia Extension for people with diabetes or their family members.

Participants in this series gave the following feedback:

What they enjoyed most: information on healthy eating; recipes; good advice; group discussion; eating the food!

What they learned that surprised them: Men need more fiber; diabetics have to have their eyes and feet checked more often than non-diabetics; fiber is listed on food labels under carbohydrates; potatoes are considered starchy, not veggies; the importance of reading labels.

What new information did they learn about diabetes: How vegetarians can still use the plate method if they have diabetes.

Other topics they would like to learn more about: Whole grains; diabetes and heart disease; navigating the holidays; shopping smart.

Through Dining with Diabetes you learn how to prepare healthy meals using less fat, less sodium, less sugar—without reducing flavor and enjoyment.

You learn the causes of diabetes, tools for managing diabetes, and the importance of diet and exercise.



Through the National Diabetes Prevention Program, MSU Extension helps participants to learn ways to change their lifestyles and improve their health.



Keeping People Healthy, continued

Teaching valuable healthy-eating skills

Improving health and nutrition for Michigan residents is the goal of MSU Extension staff in the Health and Nutrition Institute.

In 2015, the continued focus for our health and nutrition programs in Allegan County was in building or maintaining strong community partnerships to assist us with outreach throughout the community.

Our outreach to deliver nutrition education in a series format to adults in Allegan County was greatly expanded through our local partnerships with:

- MI Works
- Love INC
- Baraga Manor (seniors)
- Allegan Public Library
- AAESA – Plainwell STAR Literacy program (young adults)
- AAESA – transition program,
- ARC of Allegan
- Positive Options,
- Casco Senior Center

A strong focus was to provide education that helped participants build skills to feed themselves and their family healthier foods. [Cooking Matters](#) is a program that incorporates kitchen and cooking skills into a traditional nutrition education class. Participants walk away from each class with the ingredients to make a recipe at home for their family after practicing with a trained chef in class.

One-time presentations on incorporating more fruits and vegetables into meals and snacks were conducted in partnership with the Otsego Chamber of Commerce (Farmer's Market Demos), Inter Care WIC, and the Migrant Resource Council at their Pullman Migrant HeadStart Parent night.

In 2015, 120 low-income adults in Allegan were reached through our series of nutrition and cooking lessons. Sixty-one adults were reached through one-time presentations.

328 low-income youth ages 5-17 were reached through a series of nutrition lessons .

MSU Extension's Supplemental Nutrition Assistance Program Education (SNAP-Ed) teaches adults how to make the most of their food dollars by developing skills such as menu planning, understanding recipes and keeping food safe.



Participants learned about the nutrition and health benefits of foods to feed their families in healthy ways.

MAKING THE MOST OF OUR NATURAL ASSETS

Educational programs offered on this voyage highlighted water quality, invasive species, and the connection between watersheds, rivers, and the Great Lakes.

Sampling on board the D.J. Angus provides an up close look at local waters

Harbor Island is a popular spot in Grand Haven. Soccer fields, bank fishing spots, and the popular boat launch on Coho Drive bring a steady stream of people past the dock where the D. J. Angus is moored for much of the year. Thousands of people have been on board the D. J. Angus since it began operating in 1986, but many more who pass by each day do not realize that this fantastic resource is available so close to downtown Grand Haven.

This 45-foot research vessel is owned and operated by Grand Valley State University and serves as a “floating classroom” that offers educational programs on the Grand River, Spring Lake, and Lake Michigan. The dock at Harbor Island provides easy access to all three water bodies, and a typical 2 ½ hour excursion offers participants a chance to compare water quality at different sites.

The D. J. Angus often hosts school groups of fourth grade and above, accommodating up to 26 passengers in addition to the crew. Adult programs are also offered, and even people who have lived on local waters for years will almost certainly come away with a greater understanding of what lies beneath the waves.

On September 16, 2015, Michigan State University Extension’s District 7 Council took a trip on board the Angus. High waves prevented sampling in Lake Michigan, but comparisons between the Grand River and Spring Lake were made and a variety of topics were covered by educators with GVSU and Michigan Sea Grant.

Council members learned about invasive species, even finding some quagga mussel shells in the Grand River. Although Michigan has taken steps to prevent the spread of invasives by requiring that boaters remove plants and drain water from boats, a recent study found that boaters are not always clear on what the laws require. Participants also heard about two emerging invaders, New Zealand mudsnail and Didymo, that can even hitchhike on the soles of boots or waders.



The D.J. Angus

Sampling local waters on board the D.J. Angus

Watershed connections were another theme of the trip. What happens on the land invariably affects the quality of water in rivers and lakes. One example was provided by a Shoreline Assessment of Spring Lake, which found that 62.2% of the shoreline has been artificially hardened. “Rein in the Runoff,” a project undertaken by collaborators with GVSU and Sea Grant, found that re-vegetating buffer strips would be one of the most cost effective ways to improve water quality in Spring Lake.

Hands-on sampling was the highlight of the trip, though. Participants assessed water clarity, sediments, bottom-dwelling invertebrates, plankton, temperature, oxygen, and other water quality parameters. One of the key points was that high nutrient loads from runoff result in low oxygen levels, particularly in deep areas of Spring Lake. Sensitive species cannot tolerate low oxygen levels, so only a few types of invertebrates are found here.

All in all it was an enjoyable and enlightening day on the water. In summing things up, presenters noted that environmental quality in the Grand River and other local waters have improved in many respects over the past several decades. However, several challenges remain and new threats (including Asian carp) may be looming on the horizon.

To book your own group trip on the D. J. Angus or its sister ship in Muskegon, the W.G. Jackson, follow instructions given on the Annis Water Resources Institute website. Participants in the MSUE Master Naturalist program as well as the general public will have the opportunity to attend a supplemental class titled: “Great Lakes Issues and Ecology” taught by Dr. Dan O’Keefe onboard the D.J. Angus on August 20th, 2016. For more information, please contact Ginny Wanty wanty@msu.edu or 616-632-7873.

Michigan Sea Grant helps to foster economic growth and protect Michigan’s coastal, Great Lakes resources through education, research and outreach. A collaborative effort of the University of Michigan and Michigan State University, Michigan Sea Grant is part of the NOAA-National Sea Grant network of 33 university-based programs.

Dan O’Keefe; Michigan Sea Grant; okeefed@msu.edu

Michigan Sea Grant helps to foster economic growth and protect Michigan’s coastal, Great Lakes resources through education, research and outreach.





MI SPARTAN IMPACT

REGION 7



ENROLLED MICHIGAN STUDENTS
3,001



VETERINARY MEDICINE STUDENTS
15



ENROLLED MEDICAL STUDENTS
221



ALUMNI RESIDING IN REGION
23,076



SPENDING WITH LOCAL BUSINESSES
\$54,338,092



TOTAL ECONOMIC IMPACT
\$336,331,813*



STAFF/FACULTY RESIDING IN REGION
284



FINANCIAL AID DISBURSED
\$43,535,695



4H YOUTH PARTICIPANTS
17,421



PROPERTY OWNED BY MSU (ACRES)
174



**MEDICAL INTERNS/RESIDENTS/
FELLOWS**
283



MSU PARTNER HOSPITALS
3

Michigan State University is making a difference—everywhere—in Michigan.

Every day, Michigan State University—the nation's pioneer land-grant university—works to advance prosperity for the people of Michigan. MSU makes a positive impact on the state's economy in the areas of technology, agriculture, manufacturing, health care, education, energy, environment, and the arts.

MSU's talent and expertise help position Michigan as an uncompromising competitor in a global market. A vital contributor to the state's economy, the university attracted more than \$528 million in external funding in fiscal year 2014 and plays a key role in the state's annual \$91.4 billion agribusiness industry through partnerships, research, and educational programs in all 83 counties.



*Data from an independent study by the Anderson Economic Group

DISTRICT 7 EXTENSION COUNCIL

District Extension councils consist of key stakeholders who are leaders in their communities, industries or organizations.

Each district of MSU Extension has an advisory council to assist the District Coordinator in a variety of ways. The Council's composition is a balance among various sectors that Extension educational programming serves.

Members are nominated and selected due to their experience with Extension and proven leadership. They network with others who share similar interests and concerns, help shape Extension programming efforts important to citizens in the district, gather support for establishing or extending educational efforts around issues of concern in the district, and participate in leadership and issue focused educational events.

Members of the District 7 Council in 2015 include:

- Nora Balgoyen-Williams (Allegan)
- Max Thiele (Allegan)
- Reuben Roberts (Kent/Allegan)
- Dick Bethel (Kent)
- Gary Lemke (Kent)
- Harold Mast (Kent)
- Carrie Jo Roy (Kent)
- Jim Steketee (Kent)
- Mary Jane Belter (Ottawa)
- Mike Bronkema (Ottawa)
- Greg DeJong (Ottawa)
- Matt Fenske (Ottawa)
- Yumiko Jakobcic (Ottawa)
- Matt Schmid (Ottawa)

Extension Educators Serving Allegan County

Staff Located in Allegan County Office:

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Sue Elwell	Health and Nutrition Program Associate	269-673-0370 Ext.2559	elwell@msu.edu
Ronda Foreman	County Support Staff	269-673-0370 Select "0"	rforeman@msu.edu
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