V(A). Planned Program (Summary)

Program # 8

1. Name of the Planned Program

Resilient Communities and Economies

☑ Reporting on this Program

V(B). Program Knowledge Area(s)

1. Program Knowledge Areas and Percentage

KA Code	Knowledge Area	%1862 Extension	%1890 Extension	%1862 Research	%1890 Research
402	Engineering Systems and Equipment	0%		12%	
601	Economics of Agricultural Production and Farm Management	0%		6%	
602	Business Management, Finance, and Taxation	0%		14%	
607	Consumer Economics	0%		6%	
608	Community Resource Planning and Development	20%		0%	
721	Insects and Other Pests Affecting Humans	10%		18%	
722	Zoonotic Diseases and Parasites Affecting Humans	0%		4%	
723	Hazards to Human Health and Safety	10%		8%	
801	Individual and Family Resource Management	0%		7%	
802	Human Development and Family Well-Being	0%		5%	
803	Sociological and Technological Change Affecting Individuals, Families, and Communities	50%		5%	
804	Human Environmental Issues Concerning Apparel, Textiles, and Residential and Commercial Structures	10%		5%	
805	Community Institutions and Social Services	0%		10%	
	Total	100%		100%	

V(C). Planned Program (Inputs)

1. Actual amount of FTE/SYs expended this Program

Year: 2014	Extension		Research	
	1862	1890	1862	1890

Plan	10.0	0.0	5.6	0.0
Actual Paid	5.6	0.0	2.5	0.0
Actual Volunteer	0.0	0.0	0.0	0.0

2. Actual dollars expended in this Program (includes Carryover Funds from previous years)

Extension		Research	
Smith-Lever 3b & 3c	**1890 Extension**	**Hatch**	**Evans-Allen**
323159	0	65036	0
1862 Matching	**1890 Matching**	**1862 Matching**	**1890 Matching**
323159	0	65036	0
1862 All Other	**1890 All Other**	**1862 All Other**	**1890 All Other**
589130	0	503477	0

V(D). Planned Program (Activity)

1. Brief description of the Activity

Sustainability and growth of communities, economic prosperity and protection of property is important to the state. Louisiana is a state that has been impacted by numerous natural disasters. Disaster planning for individuals and communities addresses the need and process for valuation and documentation of physical resources prior to a disaster event and methods for using those resources in recovery efforts.

Primary focus areas for the Resilient Communities and Economies initiative include:

Economic Development--Agritourism, ecotourism, nature-based tourism, a program conducted state-wide to assist landowners in diversifying their income and complying with the 2008 limited liability agritourism law and Connect My LA, a program designed to create broadband awareness and increase use in an 18-parish region that includes the Delta and Florida parishes.

Disaster Resilience - Place-based--Financial Disaster Resilience for Local Governments and agrosecurity planning; hurricane and nuclear exercises. These programs raise capacity at the community level.

Disaster Resilience and Sustainability - People-based--Sustainable Housing / LaHouse Resource Center / Resilient Housing; disaster planning, recovery and mitigation; building code education; flood insurance and floodplain management. These programs raise capacity at the individual, family and professional levels. This area includes a new program to engage youth in making their property and communities more resilient to natural hazards.

Risk Appreciation (Awareness, Avoidance and Data Enhancement)--Interactive, online hazard maps, levee protection; sea level rise, subsidence and storm surge.

The Extension Disaster Education Network (EDEN)--Leadership and web hosting for EDEN

2. Brief description of the target audience

Target audiences for this initiative include families, elected officials, youth, emergency and floodplain managers, small business owners and governmental and non-governmental agencies.

- Agritourism focuses on agricultural landowners in the Delta and coastal areas. Landowners participating in nature-based or ecotourism are included in the agritourism category.
- Connect My LA focuses on individuals, communities and small businesses in an 18-parish area that includes the Delta Region and the Florida Parishes.
- Hurricane, storm surge, sea level rise and financial disaster resilience focus on the southern third of the state (hurricane prone region).
- Sustainable housing, flood mitigation, hazard mapping, community resilience and agrosecurity are statewide.
- Housing and risk awareness programs target building and hazard management industry professionals (and their associations); their clientele and youth.
- Agrosecurity engages producers, processors of food commodities and agribusiness.
- EDEN is a national network. Its primary audience is Extension educators in the 50 states, three territories and Bicol University (Philippines). EDEN targets consumers through its eXtension communities of practice for disaster issues.
- The flood risk awareness and mitigation programs have additional national audiences through service in the Association of State Floodplain Managers and Natural Hazard Mitigation Association (NHMA).

3. How was eXtension used?

- The Home Energy content in eXtension is used for in-state housing program
- Links to eXtension materials are provided to clientele as educational materials in the Agritourism program.
- eXtension is used by EDEN to reach consumers nationally with information on Agrosecurity and Floods, the formal Community of Practice (CoP), as well as emerging disaster issues (Avian Influenza, Drought).
- Louisiana contributed to eXtension in the areas of community and housing resilience, and provides leadership and input for EDEN's eXtension Flood CoP and the Home Energy CoP.

V(E). Planned Program (Outputs)

1. Standard output measures

2014	Direct Contacts Adults	Indirect Contacts Adults	Direct Contacts Youth	Indirect Contacts Youth
Actual	1099	22379	207	0

2. Number of Patent Applications Submitted (Standard Research Output)

Patent Applications Submitted

Year:	2014
Actual:	0

Patents listed

3. Publications (Standard General Output Measure)

Number of Peer Reviewed Publications

2014	Extension	Research	Total
Actual	1	7	8

V(F). State Defined Outputs

Output Target

Output #1

Output Measure

- Number of Web page views

Year	Actual
2014	1794795

Output #2

Output Measure

- Number of Web page visits
  Not reporting on this Output for this Annual Report

Output #3

Output Measure

- Number of LaHouse Resource Center visitors

Year	Actual
2014	2468

Output #4

Output Measure

- Number of building professionals who participated in sustainable housing educational activities (seminars, tours, technical assistance)

Year	Actual
2014	1445

Output #5

Output Measure

- Number of consumer contacts in LaHouse sustainable housing and landscaping educational activities

Year	Actual
2014	1886

Output #6

Output Measure

- Number of LaHouse Facebook followers (Likes)

Year	Actual
2014	512

Output #7

Output Measure

- Views of Louisiana flood maps on the LSU AgCenter portal

Year	Actual
2014	275891

Output #8

Output Measure

- Number of agro- and eco-tourism workshop participant days

Year	Actual
2014	102

Output #9

Output Measure

- Number of Financial Disaster Resiliency local government presentation participants

Year	Actual
2014	50

V(G). State Defined Outcomes

V. State Defined Outcomes Table of Content

O. No.	OUTCOME NAME
1	Individuals, entrepreneurs and community leaders gain knowledge of sustainable strategies for economic growth.
2	Local governments seek increased understanding of and plan to address threats from sea level rise and land subsidence.
3	Consumer adoption of high performance building and retrofitting practices
4	Housing professionals specify or recommend high performance building and retrofitting practices
5	Agricultural landowners gain knowledge of sustainable economic development strategies in agritourism.
6	Extension educators use the national Extension Disaster Education Network (EDEN) Internet and Intranet to enhance Extension's disaster education programming
7	Increased use of flood map portal service by clientele
8	Local officials and stakeholders in Louisiana coastal parishes have better understanding of their financial vulnerability to future disasters and their resources to become more resilient.
9	Communities are better prepared to defend and protect food and agriculture assets.
10	Individuals, families, small businesses and agricultural producers gain knowledge of the threat of disasters, how to prepare themselves and their property to minimize damage, recover from disaster impacts, and rebuild hazard-resistant homes.
11	Working with voluntary organizations extends outreach of research-based disaster education information
12	Youth are more engaged in community development

Outcome #1

1. Outcome Measures

Individuals, entrepreneurs and community leaders gain knowledge of sustainable strategies for economic growth.

2. Associated Institution Types

- 1862 Extension
- 1862 Research

3a. Outcome Type:

Change in Knowledge Outcome Measure

3b. Quantitative Outcome

Year	Actual
2014	0

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)
Currently, only about two out of three Louisiana households have broadband internet technology (66.3%) and just 35 percent of Louisiana's small businesses have websites or web storefronts. While many take for granted access or ability to use broadband technology, these low rates of use and adoption indicate that our residents and business owners are at risk for falling behind. According to the Louisiana Broadband Initiative (2013), the digital divide not only concerns access to technology, but also addresses residents not having the ability to use technology effectively. Over half (52 percent) of rural Louisiana citizens reported having little knowledge on how to use the internet. Rural Louisiana non-broadband technology users reported that they would envision using the internet to find information on health (48 percent) with 43 percent citing gaining local news and participating in on-line educational opportunities as major reasons why they would adopt broadband technology. This information exhibits an interesting variance between high speed internet users who utilize the internet for social activity and commercial purchases whereas non-subscribers envision using the technology to gain information. In areas where access is available, rural Louisiana non-users are more often found to be living at or below the poverty level, be less educated and consequently less inclined to purchase or use broadband technology. Often the skill level in these rural parishes among the non-users is found to lag behind more urban and suburban communities. The result is a digital divide between Louisiana residents that separates residents and areas based on digital access and use (Louisiana Broadband Initiative, 2013).

What has been done
The Connect My Louisiana (CML) team set forth to help close this digital divide between urban/suburban and rural residents. The objective of the program is to provide consumers,

business owners, local government representatives, public and private organizations and residents with access to educational resources that promote greater broadband internet adoption. The team developed an educational technology curriculum that currently consists of 10 modules. The module topics are: (1) What is Broadband; (2) Introduction to Online Business; (3) iNutrition-Provides information on the USDA's dietary guidelines using the "MyPlate" icon; (4) Introduction to Tablets; (5) Introduction to Selling Online (6) Introduction to Twitter; (7) Louisiana Market Maker-A marketing tool for connecting agricultural producers with potential buyers; (8) Using Social Media; (9) Introduction to Social Media Videos; and (10) Introduction to 3D Printing. Classes were taught on the above topics in all of the identified 18 CML parishes. With many residents citing a lack of computer access as a reason as to why they were reluctant to learn about or adopt technology the team set forth to add more local access points. The team installed self-contained kiosks (state of the art all-in-one touch screen computers) at over 20 sites in Louisiana. The kiosks provide the opportunity for residents who are not connected to broadband technology to visit their local LSU AgCenter office to be connected to the internet. In an effort to reach non-traditional participants the team added 3D printers at parish offices in Washington, Catahoula and St. Helena parishes. The 3D printers offer a unique opportunity for residents to visit a local extension office and make parts, prototypes of objects, jewelry, architectural models, hobby pieces and other custom objects.

Results

When the program first started in 2011, 418 participants completed educational modules. To date the program has grown and has reached over 3,500 residents. In addition to traditional sessions, the broadband coordinators have also worked with participants in one-on-one sessions. Online self-paced modules are also being made available for participants for both informational and reinforcement purposes. A follow-up survey of participants revealed that 81.8 percent found the information to be "very informative". With 72.7% stating they are interested in attending other educational sessions offered by Connect My Louisiana. Over sixty percent (63.6%) "strongly agree" that after attending sessions they have a better understanding of available service options, what to consider when choosing plans and are now aware of tools to monitor, manage and reduce network usage. The kiosks have helped residents who previously did not have internet or computer access to be able to: learn or advance computer skills, navigate the web, access resource information, learn job readiness computer skills, use self-paced modules and work with the Connect My Louisiana team to establish online business storefronts. Additionally, the kiosk are being used in 4-H youth and extension programs, as extension teaching tools and residents are viewing LSU AgCenter publications at the kiosk.

4. Associated Knowledge Areas

KA Code	Knowledge Area
608	Community Resource Planning and Development
803	Sociological and Technological Change Affecting Individuals, Families, and Communities

Outcome #2

1. **Outcome Measures**

Local governments seek increased understanding of and plan to address threats from sea level rise and land subsidence.

Not Reporting on this Outcome Measure

Outcome #3

1. **Outcome Measures**

Consumer adoption of high performance building and retrofitting practices

Not Reporting on this Outcome Measure

Outcome #4

1. **Outcome Measures**

Housing professionals specify or recommend high performance building and retrofitting practices

Not Reporting on this Outcome Measure

Outcome #5

1. **Outcome Measures**

Agricultural landowners gain knowledge of sustainable economic development strategies in agritourism.

2. **Associated Institution Types**

- 1862 Extension
- 1862 Research

3a. Outcome Type:

Change in Knowledge Outcome Measure

3b. Quantitative Outcome

Year	Actual
2014	0

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)

In Louisiana, outdoor recreation is included in the agritourism limited liability law passed in 2008. All of our agricultural lands are not in cultivation or used for other forms of agriculture and this under used acreage is perfect way to incorporate agritourism.

These lands are suitable for outdoor sports: hunting, fishing, kayaking, canoeing, hiking, birding and biking. According to the latest data recorded in 2011 by the Outdoor Industry Association, $646 billion is spent each year by Americans on outdoor recreation. Expenditures include gear, vehicles, trips, travel-related expenses and more. In turn this creates jobs, supports our communities, generates tax revenue and helps drive the economy. In Louisiana alone, outdoor recreation generates $15.1 billion in consumer spending; $4.6 billion in wages and salaries; $1.1 billion in state and local tax revenue; and provides 146,000 direct Louisiana jobs.

What has been done

To educate agricultural landowners about the opportunities associated with outdoor recreation and agritourism in general, three workshops entitled: Coastal Eco/Agritourism Workshop, Bayou Bartholomew Outdoor Business Owner Workshop and Hammond Agritourism Workshop were conducted throughout the state. Specialist spent 140 days planning and executing the three workshops.

Mississippi State University, Louisiana Sea Grant and the LSU AgCenter partnered to present the workshop in Lake Charles. In Oak Grove, Mississippi State University and Arkansas State University partnered with the LSU AgCenter. Finally, in Hammond the Tangipahoa Master Gardeners partnered with the LSU AgCenter for that workshop.

Results

Approximately 102 private landowners, elected officials, state and federal agency staff attended one of the three workshops. Of that number, 70% completed evaluations. Of those returning evaluations 52 of the 102 participants were private landowners. As the result of attending the workshops 72% of participants intend to change their land-use practices using knowledge gained at the event to open their lands to agritourism related enterprises.

On average, participants believed that they would earn approximately $19,337 in additional income per individual from other enterprises by implementing agritourism venues, conservation practices and enterprise development on their properties based on information gained at the workshop. This expectation resulted in an approximate aggregate cash flow of $737,002.

4. Associated Knowledge Areas

KA Code	Knowledge Area
601	Economics of Agricultural Production and Farm Management
602	Business Management, Finance, and Taxation
608	Community Resource Planning and Development

Outcome #6

1. Outcome Measures

Extension educators use the national Extension Disaster Education Network (EDEN) Internet and Intranet to enhance Extension's disaster education programming

Not Reporting on this Outcome Measure

Outcome #7

1. Outcome Measures

Increased use of flood map portal service by clientele

2. Associated Institution Types

- 1862 Extension
- 1862 Research

3a. Outcome Type:

Change in Action Outcome Measure

3b. Quantitative Outcome

Year	Actual
2014	0

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)
The 2005 hurricanes prompted the state--encouraged by property insurers--to adopt a statewide residential building code that ties building and remodeling to flood- and wind-resistance criteria. All 400 jurisdictions are subject to the building code; 338 have their fortunes tied to Flood Insurance Rate Maps (FIRMs) of the National Flood Insurance Program (NFIP). The state's better-building initiative collided with FEMA's requirement for levees to be re-certified before being recognized on updated FIRMs. The fallout from failure to validate levees, coupled with Congressional moves to eliminate long-standing flood insurance premium subsidies, left a third of Louisiana's parishes having revised FIRMs they can't adopt, and people without reasonable access to their true flood risk. Being mapped "in the flood zone" has enormous impact on property value, home equity, building, loans and insurance. Consumers desperately need access to current and future FIRMs when making property investment decisions.

What has been done
The LSU AgCenter Flood Maps portal puts FIRMs for the entire state on the open Internet and

provides point-specific risk information in the context of insurance and building permit requirements. It is a focal point for outreach activities related to risk awareness and hazard mitigation and gives property owners, investors, lenders, builders and building officials same-page access to the flood and wind risk-reducing design standards of building codes.

The Portal is a web-based tool used for 12,000 mapping sessions a month, 85% of those during the work week. It is used to support presentations, individual consultation and Flood Map Open Houses offered by newly mapped communities. It became mobile-friendly in 2013 and provides local contacts, ground elevation, and community-specific notes relevant to a user's point of interest. Users locate property by reference to road maps and aerial photographs or by searching for an address or geographic coordinates. The system reads FEMA's digital maps. It is accessed through the LSU AgCenter "Rebuilding" website "Getting a Permit" section. Educational outreach includes providing staffed computer stations at which individual property owners are shown how to use the portal and receive a printout of the flood map and related risk information at their point of interest.

Results

Thirty-nine of the state's 312 floodplain officials completed the portal-based feedback survey, solicited by the state NFIP coordinator. Users rated the service 8.7/10 for technical accuracy and 9.2/10 for ease of use. Seventy-two percent said they use the site several times a week, with half of those using it several times a day. When asked about referring others to the site, 69% said they "do it all the time". Predominant uses were "As a tool in doing my job" (85%) and "To support business decision making" (33%). One respondent's comment reflects a common theme: "This is a very helpful tool we use daily to give to our permit applicants showing them the information for their particular location so they can understand." Another said, "Being able to click on a point and have all of the needed information makes our job much easier when we have a resident in front of us."

Survey results support less formal statistical measures of steadily growing use (275,891 page views vs 228,816 in FFY2013) and high percentage of return visitors (61%). Usage patterns and correspondence suggest that the Portal is being used routinely for flood zone determinations in support of real estate activities, mortgages, and regulating construction, and in monitoring federally funded mitigation projects from the 2005 and 2008 hurricanes. A state disaster recovery officer reported, "We here at Road Home (and other state-run programs) have been using the flood maps on your site for years to assist us in determining eligibility for Elevation Programs, as well as compliance with those programs. The maps are very user friendly and have helped us greatly. It's nearly impossible to look up all the different maps [we need] at the FEMA Map Center". And another, "Just having the maps online saves many hours weekly not having to dig out paper maps."

4. Associated Knowledge Areas

KA Code	Knowledge Area
608	Community Resource Planning and Development
803	Sociological and Technological Change Affecting Individuals, Families, and Communities
804	Human Environmental Issues Concerning Apparel, Textiles, and Residential and Commercial Structures

Outcome #8

1. Outcome Measures

Local officials and stakeholders in Louisiana coastal parishes have better understanding of their financial vulnerability to future disasters and their resources to become more resilient.

2. Associated Institution Types

- 1862 Extension
- 1862 Research

3a. Outcome Type:

Change in Knowledge Outcome Measure

3b. Quantitative Outcome

Year	Actual
2014	0

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)

In the wake of the 2005 tropical storm season, it became immediately apparent that most communities were woefully unprepared for the overwhelming devastation that can occur during a natural disaster. Recovery efforts for most communities were lengthy and expensive. One costly impact was the amount and extent of debris caused by wind and flooding. Initial costs were incurred to remove debris from roadways for rescue operations; as a community moves toward getting citizens back into homes and opening businesses a second wave of debris was generated. Specific costs associated with debris include: safe handling and removal, storage, and disposal. Although the federal government has provisions for reimbursing disaster communities for some of the recovery costs, most governments are not financially prepared to shoulder the huge burden of these kinds of expenses. Many governments waited years to receive federal government reimbursements resulting in strains on local governmental budgets. In subsequent years, a stronger effort toward mitigation of potential disaster impacts and securing sound financial resiliency for communities was emphasized by all levels of government.

What has been done

The LSU AgCenter developed a financial resiliency decision making tool, and a program to facilitate use of the tool, for local governments to develop strategies for remaining solvent during disaster events. The first program began as a demonstration project in 2009, "Financial Decision Tool for Local Governments Responding to Natural Disasters". The program has evolved into a training opportunity for a range of governmental entities (municipalities, parishes/counties, and school districts) to facilitate policy development locally, as well as regionally. In 2013, two webinars were developed and financed for national distribution through the National Association of Development Organizations (NADO), the U.S. Department of Housing and Urban Development

(HUD), the Rural Policy Research Institute (RUPRI), the National Institutes of Food and Agriculture (NIFA), and MS-AL and LA Sea Grant programs. A series of Train-the-Trainer workshops was developed, in 2014, to introduce the program to finance and emergency preparedness officials, and others in local government, and extension agents coast-wide. Workshops were conducted in Orange Beach, Alabama (April 9, 2014) in conjunction with the Climate Community of Practice Workshop, and in Lake Charles, Louisiana (May 13, 2014). The success of the program has inspired collaboration by the Louisiana Governor's Office of Homeland Security and Emergency Preparedness.

Results
LSU AgCenter programs, partnerships and education efforts have improved financial awareness in three local governments and trained over 100 facilitators, in Louisiana, Mississippi, and Alabama, to use the Financial Decision Tool. Of the two communities that directly participated in the program, Calcasieu Parish did not take advantage of the strategies realized through the process. It was later learned that the Police Jury has a partnership with local gaming entities to fill any disaster related gaps in local government needs. Otherwise, local governmental participants gained valuable knowledge about strategies to improve community resilience. Most participants said they would strive for implementation of strategies, through proper channels, to improve financial resiliency within local government.

4. Associated Knowledge Areas

KA Code	Knowledge Area
608	Community Resource Planning and Development
803	Sociological and Technological Change Affecting Individuals, Families, and Communities
804	Human Environmental Issues Concerning Apparel, Textiles, and Residential and Commercial Structures

Outcome #9

1. Outcome Measures

Communities are better prepared to defend and protect food and agriculture assets.

Not Reporting on this Outcome Measure

Outcome #10

1. Outcome Measures

Individuals, families, small businesses and agricultural producers gain knowledge of the threat of disasters, how to prepare themselves and their property to minimize damage, recover from disaster impacts, and rebuild hazard-resistant homes.

Not Reporting on this Outcome Measure

Outcome #11

1. Outcome Measures

Working with voluntary organizations extends outreach of research-based disaster education information

Not Reporting on this Outcome Measure

Outcome #12

1. Outcome Measures

Youth are more engaged in community development

2. Associated Institution Types

- 1862 Extension
- 1862 Research

3a. Outcome Type:

Change in Action Outcome Measure

3b. Quantitative Outcome

Year	Actual
2014	0

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)
Louisiana coastal marshland continues to erode due to natural and human forces. The Gulf of Mexico edges closer to homes and communities. Over the past 50 years, sea level along the Louisiana coast has risen approximately 1.5 feet and in many areas the land subsides. With flooding and destruction from Hurricanes Katrina and Rita in 2005, the state and nation were reminded of the existing vulnerabilities of our communities and the high probability of reoccurrences of damage to homes, businesses and public facilities if proactive measures are not taken.

What has been done
Louisiana Extension mitigation, 4-H, and Sea Grant agents worked together to create a more hazard-resilient state. Fall 2011, Vermilion Parish 4-H faculty introduced two new words to 1200 4-H'ers in grades 4-12: resilient and subsidence. Students learned they have to be resilient and adapt to the challenge of rising sea level and the sinking of the coast, subsidence. Following an introductory presentation developed with assistance of Extension's coastal GIS specialist, 4-H

members helped to install 28 survey benchmarks that were stamped with the precise elevation of their school or public facility. The program is being continued in Vermilion and other parishes under FEMA Hazard Mitigation Grant Program funding, and used to recruit and engage older 4-H'ers in developing mitigation project proposals for public facilities in their parishes. A faculty team from LSU AgCenter Biological and Agricultural Engineering and Construction Management departments in the College of Engineering and Louisiana Sea Grant joined together to design a unique course for youth in hazard mitigation to promote greater understanding of the vulnerabilities and risks associated with natural disasters. Lesson plans and class activities allow youth to learn step-by-step strategies in reducing disaster losses through hazard mitigation.

Results

As a result of the hazard mitigation project, 4-H members received instruction from guest speakers from various fields associated with state and parish planning, conservation, emergency management and construction engineering. The students participated in field trips to government officials' offices, sites that were retrofitted to increase protection, coastal restoration sites and more. Topics included: the basics of mitigation planning, building permitting, GIS mapping, storm surge, sea level rise, flood maps and insurance, proposal writing, cost-estimation, and model building. Put in the words of one youth participant, "When we began, we didn't even know what mitigation meant. What we did know is that every hurricane evacuation, we weren't sure if we would have a home when we returned. But, we didn't think we could change that. We learned that we can make a difference. Together, we created a plan to protect our parish Extension office. While the Extension office may not be where we live, to some of us, it's our home away from home." Another 4-H member commented on roofing construction, "I knew a little, most of the roof construction I've done is with tin on a barn. Now I know the importance of decking tape, synthetic underlayment and the proper type of roofing nails when installing a strong roof." Youth participating in the mitigation project have gained the knowledge and confidence to grow their voice at a parish level. They have also gained marketable skills such as conducting a preliminary building assessment and preparing a detailed grant application. Additionally, students have participated at a national level meeting focused on disaster education. A conversation regarding adding hazard mitigation to the 4-H program nationwide has begun. From the start of a lesson on sea level rise and subsistence demonstrated by planting elevation benchmarks, a new area of interest is developing.

4. Associated Knowledge Areas

KA Code	Knowledge Area
608	Community Resource Planning and Development

V(H). Planned Program (External Factors)

External factors which affected outcomes

- Natural Disasters (drought, weather extremes, etc.)
- Economy
- Appropriations changes
- Public Policy changes
- Government Regulations
- Competing Public priorities
- Competing Programmatic Challenges
- Populations changes (immigration, new cultural groupings, etc.)

Brief Explanation

V(I). Planned Program (Evaluation Studies)

Evaluation Results

See Results section of impact reports.

Key Items of Evaluation