

V(A). Planned Program (Summary)

Program # 5

1. Name of the Planned Program

Childhood Obesity

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
134	Outdoor Recreation	5%		0%	
601	Economics of Agricultural Production and Farm Management	5%		0%	
604	Marketing and Distribution Practices	5%		0%	
607	Consumer Economics	0%		60%	
701	Nutrient Composition of Food	10%		40%	
703	Nutrition Education and Behavior	20%		0%	
704	Nutrition and Hunger in the Population	15%		0%	
724	Healthy Lifestyle	20%		0%	
806	Youth Development	20%		0%	
	Total	100%		100%	

V(C). Planned Program (Inputs)

1. Actual amount of FTE/SYs expended this Program

Year: 2012	Extension		Research	
	1862	1890	1862	1890
Plan	8.0	0.0	3.0	0.0
Actual Paid Professional	92.9	0.0	0.8	0.0
Actual Volunteer	4.0	0.0	0.0	0.0

2. Institution Name: Washington State University

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

Extension		Research	
Smith-Lever 3b & 3c	1890 Extension	Hatch	Evans-Allen
232523	0	4041	0
1862 Matching	1890 Matching	1862 Matching	1890 Matching
232523	0	4041	0
1862 All Other	1890 All Other	1862 All Other	1890 All Other
7155181	0	139974	0

V(D). Planned Program (Activity)

1. Brief description of the Activity

Educational programming was delivered to families with limited resources through our nutrition education programs funded by a wide variety of sources such as local community foundations, United Way, SNAP-Ed and EFNEP (Smith-Lever 3-D). Additionally, youth development programs expanded emphasis on physical activity in a number of programs and project areas. Finally, technical assistance was provided to farmers in the rural and urban fringe areas to help them produce and effectively market produce to urban residents.

2. Brief description of the target audience

Families with limited resources, youth enrolled in 4-H programs, and agricultural producers (generally small producers) operating in the urban fringe.

3. How was eXtension used?

Faculty and staff participated in Communities of Practice.

V(E). Planned Program (Outputs)

1. Standard output measures

2012	Direct Contacts Adults	Indirect Contacts Adults	Direct Contacts Youth	Indirect Contacts Youth
Actual	325389	1285325	129476	894674

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

Patent Applications Submitted

Year: 2012

Actual: 0

Patents listed

3. Publications (Standard General Output Measure)

Number of Peer Reviewed Publications

2012	Extension	Research	Total
Actual	15	8	23

V(F). State Defined Outputs

Output Target

Output #1

Output Measure

- Number of educational programs delivered focused on increasing local food supplies, improving dietary quality, and increasing physical activity.

Year	Actual
2012	32436

Output #2

Output Measure

- Number of peer reviewed (official) WSU Extension publications published per year.

Year	Actual
2012	15

Output #3

Output Measure

- Number of graduate students with a significant professional orientation toward addressing the issue of increasing childhood obesity.

Year	Actual
2012	12

V(G). State Defined Outcomes

V. State Defined Outcomes Table of Content

O. No.	OUTCOME NAME
1	Percentage of evaluated participants who demonstrated increased knowledge and skills relative to key learning objectives.
2	Percentage of participants evaluated who applied acquired knowledge to improve their diet quality, level of physical activity, or production of locally-grown produce.
3	Percentage of participants reporting increased physical activity.
4	Number of communities cooperating with WSU program with farmers' markets and community gardens producing and/or selling locally grown fruits and vegetables.

Outcome #1

1. Outcome Measures

Percentage of evaluated participants who demonstrated increased knowledge and skills relative to key learning objectives.

2. Associated Institution Types

- 1862 Extension
- 1862 Research

3a. Outcome Type:

Change in Knowledge Outcome Measure

3b. Quantitative Outcome

Year	Actual
2012	83

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)

The obesity epidemic has been created by changes in the physical, social and economic environment. Each day, adults and especially children are consuming more calories than they burn off. Many barriers, such as limited access to low-cost nutritious foods, poverty, lack of physical exercise, limited experience with preparing, selecting or eating nutritious foods, compound the obesity issue. A prevention plan that includes hands-on education and physical activity is the greatest hope to slow and reverse obesity.

What has been done

Our Expanded Foods and Nutrition Education Program (EFNEP) operated in five counties in Washington State in 2012, with more than 7,000 new participants completing the program. Our Washington State Supplemental Foods and Nutrition Program (Food \$ense) enrolled over 138,000 people in an educational program that teaches healthier food choices through age-appropriate lessons and activities. Programs encourage youth and adults with limited incomes to share learned skills at home to affect positive health behaviors.

Results

This program effort assessed a knowledge change among 83% of all program participants after receiving an average of 6.4 lessons in direct education. This included twelfth grade students and adults who improved their ability to read food labels, identify low sugar foods and identify foods with specific nutrients that are important for building healthy lives, in conjunction with exercise.

4. Associated Knowledge Areas

KA Code	Knowledge Area
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134	Outdoor Recreation
701	Nutrient Composition of Food
724	Healthy Lifestyle
806	Youth Development

Outcome #2

1. Outcome Measures

Percentage of participants evaluated who applied acquired knowledge to improve their diet quality, level of physical activity, or production of locally-grown produce.

2. Associated Institution Types

- 1862 Extension
- 1862 Research

3a. Outcome Type:

Change in Action Outcome Measure

3b. Quantitative Outcome

Year	Actual
2012	71

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)

The obesity epidemic has been created by changes in the physical, social and economic environment. Each day, adults and especially children are consuming more calories than they burn off. Many barriers such as limited access to low-cost nutritious foods, poverty, lack of physical exercise, limited experience with preparing, selecting or eating nutritious foods all compound the obesity issue. A prevention plan that includes hands-on education and physical activity is the greatest hope to slow and reverse obesity

What has been done

Our Expanded Foods and Nutrition Education Program (EFNEP) operated in five counties in Washington State in 2012, with more than 7,000 new participants completing the program. Washington State Supplemental Foods and Nutrition Program (Food \$ense) enrolled over 138,000 people in an educational program that offers children and parents simple tools and information to make healthier food choices through age-appropriate lessons and activities.

Results

The program impacts include improved food choices among youth, with 71% of program participants changing behavior by increasing their consumption of fruits and vegetables, while reducing consumption of high fat, high sugar snack foods. Anecdotally, there was a reported increased consumption of white milk over chocolate milk by the youth in the programs.

4. Associated Knowledge Areas

KA Code	Knowledge Area
134	Outdoor Recreation
701	Nutrient Composition of Food
703	Nutrition Education and Behavior
704	Nutrition and Hunger in the Population
724	Healthy Lifestyle
806	Youth Development

Outcome #3

1. Outcome Measures

Percentage of participants reporting increased physical activity.

2. Associated Institution Types

- 1862 Extension

3a. Outcome Type:

Change in Condition Outcome Measure

3b. Quantitative Outcome

Year	Actual
2012	40

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)

The obesity epidemic has been created by changes in the physical, social and economic environment. Each day, adults and especially children are consuming more calories than they burn off. Many barriers such as limited access to low-cost nutritious foods, poverty, lack of physical exercise, limited experience with preparing, selecting or eating nutritious foods all compound the obesity issue. A prevention plan that includes hands-on education and physical activity is the greatest hope to slow and reverse the obesity trend.

What has been done

Our Expanded Foods and Nutrition Education Program (EFNEP) operated in five counties in Washington State in 2012, with more than 7,000 new participants completing the program. Our Washington State Supplemental Foods and Nutrition Program (Food \$ense) enrolled over 138,000 people in an educational program that teaches healthier food choices through age-appropriate lessons and activities. Programs encourage youth and adults with limited incomes to share learned skills at home in order to affect positive health behaviors.

Results

Forty percent of program participants reported increased physical activity and exercise after delivery of lessons and they participate in at least 60 minutes of physical activity daily. This was accompanied by reports of increased physical activity among parents of children participating in the program. Classroom teachers associated with the programs also confirmed positive behavior changes in physical activity among program participants.

4. Associated Knowledge Areas

KA Code	Knowledge Area
134	Outdoor Recreation
703	Nutrition Education and Behavior
724	Healthy Lifestyle
806	Youth Development

Outcome #4

1. Outcome Measures

Number of communities cooperating with WSU program with farmers' markets and community gardens producing and/or selling locally grown fruits and vegetables.

2. Associated Institution Types

- 1862 Extension
- 1862 Research

3a. Outcome Type:

Change in Condition Outcome Measure

3b. Quantitative Outcome

Year	Actual
2012	243

3c. Qualitative Outcome or Impact Statement

Issue (Who cares and Why)

The obesity epidemic has been created by changes in the physical, social and economic environment. Research links an individual's learning to grow vegetables with improved eating habits and health. The more experience people have with food, the more likely they are to eat that food, meaning they eat more fruits and vegetables than non-gardeners eat. Diets high in fresh fruits and vegetables are known to prevent obesity, diabetes, and other chronic illnesses.

What has been done

Growing Groceries with Families Project was a program to increase accessibility and consumption of fresh, locally grown produce via a mentoring program with gardening and nutrition

education. This program engaged local farmers' markets and community gardens with the goal of increasing low-income families to use more fresh fruit and vegetables in their daily diet. The program used cooking demonstrations with produce grown on site, and provided an opportunity to discuss childhood obesity risks and prevention work with parents.

Results

Through the increased interest, popularity and focus on growing and buying local, nutritious foods, the numbers of community and school gardens have rapidly expanded, with 243 additional communities cooperating on the project. In addition, the interest and growth in farmers' or local markets has also greatly expanded.

4. Associated Knowledge Areas

KA Code	Knowledge Area
601	Economics of Agricultural Production and Farm Management
604	Marketing and Distribution Practices
701	Nutrient Composition of Food
704	Nutrition and Hunger in the Population

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

This past year we were able to maintain our education and outreach in Childhood obesity only due to competitive grants and contracts. Many program participants had limited incomes, changes in rules related to Food Stamp eligibility and access to SNAP-ED funded programs were critical for our program success. Additionally, continued institutional support for small farms program, Master Gardeners, 4-H youth development, and nutrition education were key to advancing the goals of the program.

V(I). Planned Program (Evaluation Studies)

Evaluation Results

The Childhood obesity prevention program measures the percentage of participants who demonstrated increased knowledge and skills relative to key learning objectives. We measured the percentage of participants who applied acquired knowledge to improve their diet quality; level of physical activity; production of locally-grown produce; percentage of participants reporting increased physical activity; and the number of communities cooperating with WSU program with farmers' markets and community gardens producing

and/or selling locally grown fruits and vegetables.

Our evaluation methodologies were designed to assess the amount of acquired learning, degree of application of learning and the social, environmental and economic value of this application. We used post-program, retrospective and before and after assessments to document changes in knowledge. We used survey methods after an appropriate time lag to assess how much of the new knowledge was actually applied.

Key Items of Evaluation

Our planned program under Childhood Obesity focused on offering children and parents simple tools and information to make healthier food choices.

Training for child care providers increased knowledge by 100% among early learning educators (n=34) in their level of understanding about developmentally appropriate strategies to promote physical activity in children and how to use music to encourage movement and physical activity in children.

Outcomes documented through the Statewide SNAP-ED (Food \$ense) and EFNEP program included:

- 64% of the 3,387 EFNEP youth increased their knowledge of essential human nutrition.
- 36% of the Food \$ense youth increased their understanding of essentials of human nutrition.
- 67% of the 3,387 EFNEP youth reported an increased ability to select low-cost, nutritious food
- 79% have improved their food safety and preparation practices
- 83% of the Food \$ense youth report eating a variety of foods more often.
- 54% of the Food \$ense youth improved practices in food preparation and safety.
- 41% of the Food \$ense youth (12,258) report participating in at least 60 minutes of physical activity daily.
- 46% Food \$ense adults increased the number of days of physically active for 30 minutes.
- 58% of the 3,033 EFNEP youth report now eating a variety of foods and have a more nutritious diet.
- 75% of the EFNEP adults have also improved their diet, consuming an extra 2/3 cup of fruits and vegetables.
- 44% of the Food \$ense adults reported their children ate breakfast more often.
- Through the educational Food \$ense sessions, adults learned how to select and prepare low-cost meals. As a result, 39% reported running out of food less often.
- 46% of the Food \$ense parents reported increasing their weekly physical activity.

Through the Growing Groceries with Families Project - 90% of participants reported they now eat vegetables/fruit at least 2x/wk; 80% report they now feel comfortable starting their own garden/container garden; 1,673+ pounds of produce harvested by families for home use with approximately 1,106 hours of volunteer time donated towards the project leveraging \$23,226 (volunteer value).

Master Gardener Program Coordinators reported a total of 48 tons of produce were donated from MG community demonstration gardens to food banks, stretching the ability of food banks to purchase other non-perishable items for clientele.

The Colville reservation residents attended Extension's "Stretching Your Food Dollar" workshops. Participants increased their knowledge of identifying ways to outsmart marketing tactics, increasing their ability to spend their food money more wisely by 133%.

The Clark County Extension - "Healthy Families" at Farmer's Market program documented over 500 market customers visited their booth last summer. 40% of the visitors were low-income families and received free bags of produce (due program grant funding). Completed surveys indicate that the participants made the demonstrated recipe at home and found the information helpful. Recipes were kid-friendly and very popular with the families. The recipes always focused on the produce being sold at the market. In turn, market vendors indicated that on days that Extension hosted the Healthy Families booth, they sold more of the "featured" produce items and more WIC coupons and tokens were redeemed - increasing the farmer's sales.

Example testimonials:

Adult outcome: "In February, I **weighed-in at 276 lbs.** I started a new job cleaning two and three story houses. I was losing weight. My job is like having a Stairmaster that pays me to use it. I was still eating whatever I wanted all the time, not losing how I should have been. Then Hunter (son) started bringing this classes stuff home (parent newsletters) wanting to do all of it. We started with trying the snacks (many we love), then some of the activities. I make a lot of the foods for my lunches rather than fast foods or whatever I could microwave. Hunter and I both are more active and healthy than before. **I'm now at 227 lbs. and losing!** Thanks for helping me get my life back."

- Single parent of elementary youth, Grays Harbor Co.

Youth outcome: "Since Food \$ense (Snap-Ed) class I have been reading labels on foods, and I have been eating less (highly processed) food after school, and more healthy food. I used to play video games for 4 hours after school, I now walk the dog for 45 minutes and **have lost 8 pounds.**"

- 5th grade student, Spokane Co.