

Washington State University Cooperative Extension

Federal Plan of Work

FY 2000 - 2004

WSU Cooperative Extension is a partnership of federal, state and county governments and, more recently, partnerships have been developed with community colleges in the state. The state of Washington, along with the rest of American society, is experiencing a time of rapid transition. It is essential that WSU Cooperative Extension programs remain relevant. To do this and to guide our future, we are undertaking a variety of planning efforts, both at the county and state levels.

Our **mission** is to "Help people develop leadership skills and use research-based knowledge to improve their economic status and quality of life." We believe in the people of Washington and the importance of investing in their capacity to face the challenges and opportunities open to them.

We work with the people of Washington to address agricultural, natural resource, youth, family, community, and environmental issues. This is done by providing information, education, technical assistance, and local development programs. Our programs are available to all without discrimination.

This plan incorporates both core and new programs that WSU Cooperative Extension will pursue in meeting our mission and the needs of the people of Washington. Programming efforts will address emergent societal problems of statewide significance ... **critical issues** ... identified by stakeholders and include:

SUSTAINABLE AGRICULTURE AND NATURAL RESOURCES

- Plant/Animal Systems Management
- Management of Natural Resource Systems
- Integrated Pest Management

Local and Community Food Systems

FOOD SAFETY, QUALITY AND HUMAN NUTRITION

- Safety and Quality of the Food Supply
- Human Nutrition and Health

ENVIRONMENTAL STEWARDSHIP

- Water Quality Protection for Salmon Recovery
- Stewardship Ethic

COMMUNITY AND ECONOMIC VITALITY

- Leadership for Public Decision-Making
- Economic and Social Change

4-H YOUTH/FAMILIES AND THEIR COMMUNITIES

- Parenting
 - Work Force Preparation
 - Strengthening Life Skills
- Building Strong Communities
 - Character/Ethics

Goals for each of these program components are stated in the program section of the plan.

The future of the Pacific North West is dominated by environmental issues. Endangered species,

particularly salmon recovery and its impact on all aspects of life here is the single most important issue facing people in the Northwest. WSU Cooperative Extension is in a unique but risk-laden position to help address the problem. Traditional audiences, primarily agricultural producers and forest landowners, are faced with tremendous challenges in meeting regulations and changing public expectations about natural resource stewardship. At the same time they are looking to the Land Grant University to help them. They are facing the reality that simply opposing regulations will not be effective, and that there are indeed some changes they can and must make in agricultural and forest practices while still remaining viable. But a new and growing constituency of taxpayers, including residents of rapidly expanding urban areas, are deeply concerned about the environment. They are looking to Extension to adapt its traditional educational methods to help protect endangered species, particularly the salmon. They do not expect or want the state's university to advocate for agriculture, right or wrong. WSU Cooperative Extension must walk a fine line to bring people together, facilitate dialog, mediate disputes and use science-based education to help find a resolution. It is unproductive, indeed impossible, to extricate "agricultural production" programming from "environmental issues" programming.

For that reason, we have opted to include all our agricultural production programming under Goal 4, An Agricultural System that Protects Natural Resources and the Environment. This does not suggest a lack of concern for production agriculture, but a change in perspective. Indeed it is because we realize the challenges facing the agricultural community that we do not separate out these two important goals. For Washington agriculture, competitiveness in the global economy requires that the agricultural community address environmental issues to be accepted by Pacific Rim nations as well as its own regional constituents.

Stakeholder Input

Washington State University Cooperative Extension's planning process has been built from a major initiative in 1998 when four task forces were formed to help shape WSU's role in addressing significant issues facing the state. Groups of citizens, faculty and experts were brought together to assess future needs and directions for the College of Agriculture and Home Economics in instruction, research, extension and international programs. Sixteen town hall meetings were held throughout the state and this dialogue generated many ideas for the task forces to consider. This process identified four key areas for priority programming in the college. Subsequently, Cooperative Extension split one of these areas into two for more emphasis, and used a faculty process to develop specific plans to address these priority issues. Since that time, stakeholder input has been an important part of updating these programs. In addition to faculty and staff input into succeeding four-year plans, the following have been important sources of stakeholder input:

- The College has a citizen advisory council that gives input to plans. This council is made up of representatives of the agriculture industry, County government, 4-H volunteers, families and businesses. Nominations for vacant positions are sought from agencies and organizations that represent the people of the state. Consideration is given to cultural and gender diversity.

Expenses for the council to meet are paid if needed.

- A strategic planning process took place around the opportunity to approach the state legislature for new funding for a “Safe Food Initiative.” Input from the entire agricultural community was obtained in an extended and thorough process to identify the programs and positions that would be sought.
- Many of the programs and program teams in Extension have their own advisory committees made up of constituents and collaborators. An example is the two Extension Indian Reservation Programs that have strong advisory committees helping them plan and execute their work.
- All County offices have some sort of advisory system. Most have formal advisory committees that meet regularly, and all are being encouraged to do so. These committees represent the makeup of the constituents in the county, with specific efforts to obtain input from typically under-represented groups. When it is difficult to obtain formal input from such constituents because they do not want to participate in a committee, then a system of informal input is used. The county chair obtains input by personal contact, from other agencies and organizations and through the use of key people in that community.

During the next two years, Cooperative Extension will be conducting an impact assessment and collecting stakeholder input through that process.

Multistate Programming

The three states in the Pacific North West have a long tradition of collaboration. Oregon, Idaho and Washington have many programs and activities that can be described as “multistate” some formal, and many informal.

- Because of limited resources, programs and specialists are often shared. Specialists distribute their newsletters to the other states, or contribute to newsletters that reach all three states.
- Multistate teams of faculty work on programs that impact two or more states.
- Bordering counties plan and work together, and faculty respond to questions from each other’s counties.
- Faculty and staff training opportunities are frequently jointly planned, or are open to personnel from the other two states.
- Conferences are jointly planned and open to all three states.
- Satellite programs developed in Washington are downlinked nationwide with many states participating.
- Perhaps the most formal and well established collaboration among the three states is the PNW Publications process where publications that are relevant to all three states are jointly written or at least reviewed, published by the lead state, and made available to all three.

In addition to the well-established tri-state collaboration, WSU has several collaborative program efforts with other states, including several Regional Research and Extension Coordinating Committees, and individual joint programs between specialists.

Planned multi-state programs and activities between Oregon, Idaho and Washington are detailed in Appendix A. Each professional FTE is a commitment of more than \$100,000 for salary, fringe benefits, support staff, and expenses. The level of planned, multi-state programs and activities are well in excess of 25% of Washington's Smith Lever 3b and 3c allocation. These activities will continue to grow during the five-year period of this plan-of-work.

Multifunction Programming

There are three major ways in which the research and extension functions collaborate.

- First, there are formal Regional Research and Extension Coordinating Committees that meet regularly to plan, conduct and evaluate projects that include research and extension components. A new overall committee (RCIC) will meet for the first time in the summer of 1999 to review and approve the work of these coordinating committees.
- Second, there are working teams of faculty and staff that can include both research and extension personnel as well as stakeholders and collaborating agencies. These teams form to address critical issues in the state or region. Active teams include the Agricultural Horizons Team, the Livestock and Waste Management Team, the Water Quality Management Team, the Dairy Team, the Community Horticulture Team, the Compost Team, the Forestry Team, the Center for Agriculture and Natural Resources Leadership Team, the NE Washington/Idaho Small Farms team, the Food and Farm Connections Team, the Parenting Team, the Food Safety Team, and the Program for Local Government Education.
- Third, many faculty are appointed with joint appointments in extension and research to reflect and to encourage close connection to address the needs of constituents.

Appendix B presents lists of program teams formed to facilitate cross-program, multidisciplinary and multifunction work to address priority issues. Members of these working groups hold extension, research or split appointments between extension, research and/or teaching that promote multifunction work. Appendix B illustrates that extension's investment in multifunction and multidisciplinary programs is well in excess of 25% of Washington's Smith Lever 3b and 3c allocation.

Multi-institutional Programming

WSU is a unique position to participate in multi-institutional programming, with another major university in the state, a 1994 institution on the other side of the state responsible to the north west, a longstanding partnership with the community college network, and another Land Grant institution just eight miles from the main campus.

- Washington State University has several collaborations with the University of Washington, including housing a forestry specialist on the UW campus to promote collaboration.
- We have three joint grant programs with the Northwest Indian College and are working on

more informal collaborations, although the geographical distance and limited resources make it a challenge.

- Another strong multi-institutional collaboration in the state is with community colleges. The Partnership for Rural Improvement (PRI), which celebrated its 20th anniversary last year, is a community development consortium consisting of four Washington community colleges and WSU Cooperative Extension. PRI is the oldest continual community development activity at WSU. It currently focuses on local leadership development and assuring telecommunications infrastructure for rural areas.
- In addition, WSU-CE's Learning Centers collaborate closely with local community colleges. Most often housed on the college campus and sharing infrastructure, these centers offer WSU upper division degree courses by distance delivery to people with at least the equivalent of an AA degree, as well as non-credit offerings through Cooperative Extension.

Underserved Audiences

WSU is committed to reaching and meeting the needs of underserved people in the state. This includes the growing racial and ethnic diversity of residents, women and place-bound individuals. A few examples of current programs targeting underserved audiences include WSU-CE's two Extension Indian Reservation Programs where Federal grant money has leveraged state money, tribal contributions and private donations to provide a strong Extension program. The tree-fruit team, which has been very successful traditionally in production programs with growers, have focused on educational opportunities for Hispanic workers. Our nutrition programs, including EFNEP and the Food Stamp Nutrition Education Program, are targeted at limited income families. The Abuela Project, which recently won a USDA Honor Award for Public Service, solved a serious salmonella problem by working with the Hispanic community in Yakima to teach a safe method of making fresh cheese while maintaining a cultural tradition. 4-H Youth Development is now working routinely in schools and with other agencies to reach low income and minority youth.

Ways of including traditionally underserved people in our advisory system are mentioned above in the section on stakeholder input. Specific approaches to reach protected classes are included in each program element plan.

Merit Review

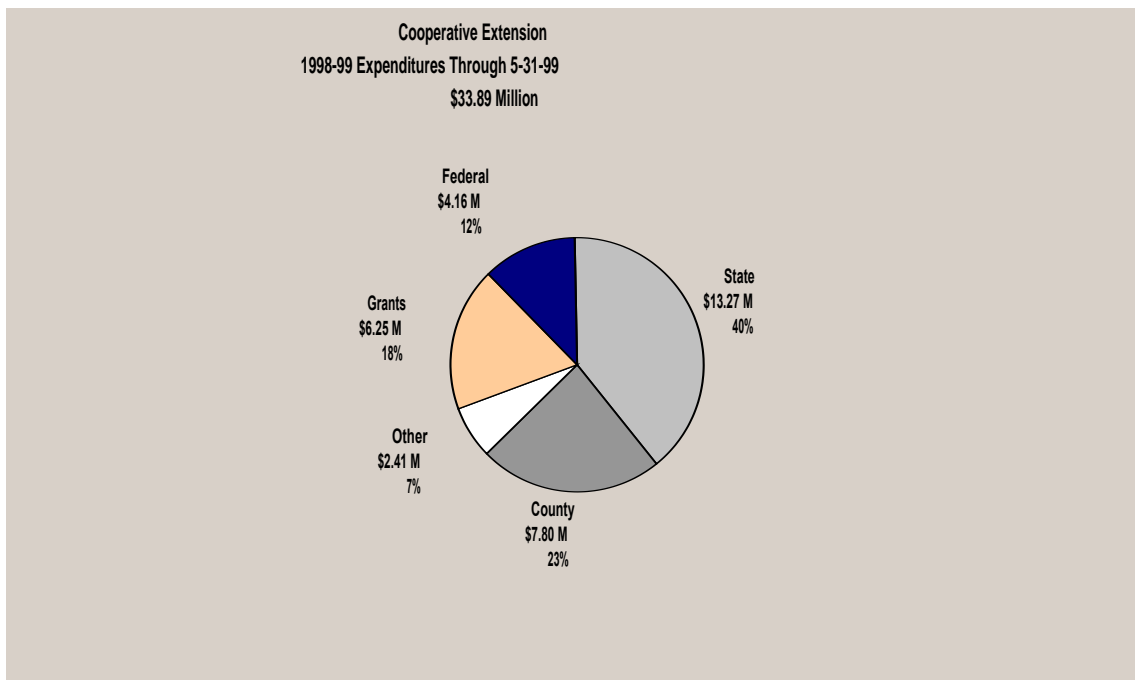
In the tradition of the Pacific North West collaboration, the directors and associate directors of Extension in Washington, Oregon and Idaho have coordinated together on the development of this Federal Plan. Each state will review the plan of the other two states, by involving their program leaders and specialists with appropriate expertise.

Allocated Resources

The following table summarizes allocation of resources from Federal 3b and c funding, State and County match, and leveraged grant dollars in terms of both expenditures and personnel FTEs. This is

the format required for fiscal reporting, and it is difficult to plan and collect data in different ways for different parts of CSREES. In general, the base programs and initiatives crosswalk fairly obviously with our state program titles. In terms of the five goals for this Federal Plan of Work, we do not plan or report to Goal 1, as explained above. Goal 2 incorporates Safety and Quality of the Food Supply. Goal 3 encompasses Diet, Nutrition and Health. Goal 4 encompasses Agricultural Competitiveness and Profitability, Natural Resources and Environmental Management and Managing Change in Agriculture. Goal 5 includes Community Resource and Economic Development; Family Development and Resource Management; Leadership and Volunteer Development; 4-H and Youth Development; Workforce Preparation; and Children, Youth and Families at Risk.

Leveraging of Federal funding is illustrated graphically in this chart which shows Federal, State and County funding, as well as grants and private contributions for FY 99 as of May '99. In addition to what shows here, \$2.9M in grants were awarded to county programs directly.



COOPERATIVE EXTENSION WORK
BUDGET BY BASE PROGRAMS AND NATIONAL INITIATIVES BY SOURCE OF FUNDS

STATE	Washington	FISCAL YEAR ENDING					September 30, 1998
		SOURCE OF FUNDS					
		FTE Federal 3b & 3c	FTE Federal 3d	FEDERAL EXTENSION	NON-FEDERAL	OTHER FEDERAL	TOTAL
BASE PROGRAMS/NATIONAL INITIATIVES							
BASE PROGRAMS:							
	AGRICULTURAL COMPETITIVENESS AND PROFITABILITY	20.11	0.30	1,985,794.00	1,123,198.00	168,269.00	3,277,261.00
	COMMUNITY RESOURCE & ECONOMY DEVELOPMENT	1.81	-	182,031.00	4,492,790.00	1,101,350.00	5,776,171.00
	NATURAL RESOURCES & ENVIRONMENTAL MGMT.	5.53	2.80	546,093.00	7,413,104.00	1,136,510.00	9,095,707.00
	FAMILY DEVELOPMENT & RESOURCE MGMT.	1.87	-	182,031.00	673,919.00	12,718.00	868,668.00
	LEADERSHIP & VOLUNTEER DEVELOPMENT	1.86	-	182,031.00	1,797,116.00	-	1,979,147.00
	NUTRITION, DIET AND HEALTH	10.55	17.33	1,042,541.00	4,717,430.00	58,279.00	5,818,250.00
	4-H AND YOUTH DEVELOPMENT	5.02	-	496,449.00	670,000.00	219,354.00	1,385,803.00
	ADMINISTRATION	3.52	-	347,515.00	1,576,393.00	-	1,923,908.00
	TOTAL BASE PROGRAM 1/			4,964,485.00	22,463,950.00	2,696,480.00	30,124,915.00
NATIONAL INITIATIVES:							
	FOOD SAFETY AND QUALITY	4.82	-	438,460.00	710,300.00	60,335.00	1,209,095.00
	WORKFORCE PREPARATION	-	-	32,000.00	3,600.00	17,245.00	52,845.00
	MANAGING CHANGE IN AGRICULTURE	-	-	80,345.00	325,600.00	56,690.00	462,635.00
	CHILDREN, YOUTH, AND FAMILIES AT RISK	2.63	-	265,320.00	246,300.00	49,103.00	560,723.00
	HEALTHY PEOPLE.....HEALTHY COMMUNITIES	-	-	-	-	-	-
	TOTAL NATIONAL INITIATIVES			816,125.00	1,285,800.00	183,373.00	2,285,298.00

1/ Total base Programs should agree with "Total All Programs" shown on the Summary Budget Statement. It is not expected that amounts reported under each line item can be directly identified in the accounting records. The amounts budgeted should be reflective of your Plan of Work. The Plan of Work and fiscal data available should provide the basis for making estimates of total dollar amounts for each line utilized.

GOAL 1: An Agricultural System that is Highly Competitive in the Global Economy.

As explained in the introduction, WSU Cooperative Extension has opted to include all our agricultural programming under Goal 4, An Agricultural System that Protects Natural Resources and the Environment. This does not suggest a lack of concern for production agriculture, but a change in perspective. Indeed it is because we realize the challenges facing the agricultural community that we do not separate out these two important goals. For Washington agriculture, competitiveness in the global economy requires that the agricultural community address environmental issues to be accepted by Pacific Rim nations as well as its own regional constituents.

GOAL 2: A Safe and Secure Food and Fiber System.

I.

SAFETY AND QUALITY OF THE FOOD SUPPLY

ISSUE:

Knowledge of the burden of food borne illnesses in the U.S. is increasing. In 1998, the Food borne Diseases Active Surveillance Network (FoodNet) identified that the most common food borne disease was campylobacteriosis (20 cases/100,000 population), followed by salmonellosis (12/100,000), shigellosis (9/100,000) and E. coli O157:H7 infections (2.8/100,000). A large outbreak of listeriosis resulted in increased attention to this less common foodborne pathogen (0.5/100,000).

The 1998 preliminary findings from FoodNet document regional and seasonal differences in the incidences of certain food borne diseases. Potential explanations for these differences include regional and seasonal variations in food - handling practices and the level of contamination of specific food items. In addition, research of consumer food consumption behaviors in Washington State indicates that some risky food safety behaviors differ among ethnic groups.

High-risk groups for food borne illness include young children, pregnant women, elderly, and immune compromised. Youth and children are increasingly involved in food preparation, yet have few opportunities to learn proper food handling techniques. These audiences need knowledge of specific food - handling recommendations tailored to their specific interests and needs. After the listeriosis outbreak, the USDA issued new recommendations for consumers in the high - risk categories for listeriosis.

Many common food borne pathogens such as some Salmonella species, *Listeria monocytogenes*, *E. coli* O157:H7, and *Campylobacter*, are also associated with animals. These pathogens may be transmitted by inadequately cooked meat and poultry or by contamination of ready - to - eat foods during food preparation. Control of *Listeria monocytogenes* requires diligence in the food processing plant. Recently, there has been increasing recognition that fresh produce is also a potential source of pathogens that can cause food borne illness. Control of pathogens on raw materials, in processing operations and through the food handling system will reduce the potential of food borne illness in humans.

Reducing the risk of food borne illness requires a farm - to - table approach. The key component of Safety and Quality of the Food Supply programs in Washington is an emphasis on HACCP across the food chain from farm to food processor to food preparer. We will continue using the approach we have used for several years, which involves faculty with a wide variety of expertise in delivery of food safety programming. Implementation of Hazard Analysis Critical Control Point (HACCP) systems is a recognized and accepted method of decreasing food safety risks throughout the food chain.

GOAL:

The target audiences in Washington will obtain knowledge and adopt behaviors that reduce the level of food borne pathogens in the food supply and/or the consumption of foods that are likely to be contaminated with pathogens.

- **OBJECTIVES:** Adopt recommended food - handling practices that reduce the potential incidence of food borne illness in commercial, non - commercial and home settings.
- Avoid consumption of foods that are likely to be contaminated with pathogens such as raw milk and raw - milk cheese, and undercooked/raw ground beef, shellfish and eggs.
- Improve practices and processes that promote the production, processing, distribution and merchandising of a food supply with minimal risk, including implementation of HACCP - based systems.
- Improve understanding of risks and responsible practices through increased knowledge of food safety public policy issues and through influences on food safety public policy.

KEY COMPONENTS:

A wide variety of training opportunities and materials are available, which include the following:

1. Better Process Schools (in English and Spanish).
2. Food Safety Farm to Table Annual Conference.
3. Food Safety Advisor training and educational materials for volunteers.
4. HACCP workshops for specific commodity applications such as seafood, meat, or poultry, and fresh produce.
5. Workshop to assist science teachers incorporate food safety into their curricula.
6. Quality Assurance Animal Care curriculum for youth.
7. Get a Jump on Germs I (for 3rd-5th graders) and II (for 6th -8th graders).
8. Extension bulletins and fact sheets on safe food handling and preservation.
9. Audio-visual materials for use by faculty and volunteers.

LINKAGES:

Internal linkages include an electronic listserv to quickly transmit information to faculty throughout the state and an established team of food safety educators representing a variety of disciplines.

External linkages have been formed with the Washington Department of Agriculture and the Washington Department of Health and many Local Health Departments, as well as food processors and agricultural commodity groups in the northwest. The nature of the collaboration involves sharing of expertise as well as occasionally co -sponsoring programs.

We also have strong linkages with other food safety educators and researchers in the northwest and nationally, including jointly publishing food safety extension bulletins as Pacific Northwest Extension publications

AUDIENCE:

The target audiences will be food handlers (home, commercial, and non -commercial quantity food preparers), processors, distributors, retailers, producers and regulators.

Specific approaches to reach protected groups

Materials will be made available in Spanish for attendees at Better Process Schools and for home food preparers and home canners. Consumer education materials will be targeted toward food consumption practices of certain ethnic groups, specifically safe cheese workshops for Hispanic consumers and small cheese vendors.

EVALUATION:

In evaluating educational activities in this program area, data will be collected and reported for these specific indicators:

- Percent of program participants increasing their adoption of the following recommended food selection and handling practices as measured by pre- and post- test:
 - Use of cooling, handling and storage methods that minimize risk
 - Use of proper hygiene practices
 - Use of recommended cooking times and temperatures
- Percent of program participants decreasing their use of foods likely to be contaminated with pathogens, including raw milk and raw -milk cheese, and undercooked/raw ground beef, shellfish and eggs.
- Percent of program participants increasing their adoption of the following practices that protect the food supply:
 - Use of safe food processing methods and control systems
 - Ability to pass a certification exam/become certified
 - Appropriate use of drugs/chemicals (e.g. antibiotics and vaccines)

- Percent of program participants increasing their understanding of food -related risks and the policy and scientific bases for risk management decisions.

PROGRAM DURATION: Long Term.

GOAL 3: A Healthy, Well-Nourished Population.

I.

HUMAN NUTRITION AND HEALTH

ISSUE:

The type and amount of food consumed determines a person's energy level and the nutrients they have available for growth and development in children and health and well-being in adults. In short, food is essential to life, health, and well-being. In addition, food provides an important focus for social interaction.

Insufficient and unhealthful food choices can occur from several reasons. For some, food and nutrient imbalances occur because of insufficient resources to access adequate amounts of foods in a culturally acceptable manner. For others, the imbalances occur through inappropriate lifestyle choices.

Nationally, between two and four percent of the population reports inadequate food intake and days without food each month. In Washington, about 10 percent of the population relies on public assistance (through food stamps and food banks) to survive. While research shows that food stamp recipients get more nutrients per dollar than higher income families, being able to make even better choices is necessary for many families. Among these young families there is a lack of information about how to prepare low cost foods.

While it has long been known that severe nutrient deficiencies lead to growth failure and reduced brain development in children, recent research has shown that even minor nutrient deficiencies reduce a child's ability to learn impacting a child's performance during the preschool and school-age years. Not just what is eaten, but the availability and timing of meals is important for children. Children who eat breakfast, do better in school. Children who eat meals in a social setting specifically with their families, also do better in school. When children receive consistent nutritional messages about what is good to eat from their family, in the school classroom, and the school lunchroom, children are most apt to adopt positive eating behaviors so that programs that integrate these aspects of a child's life are most effective. That children learn how to select, prepare and store their own food is becoming increasingly important for their life long health.

Inappropriate food and exercise choices by adults has a staggering cost in terms of disease. Some of the diseases related to nutrition include: osteoporosis, heart disease, some cancers, diabetes, and stroke. While the social and economic costs of all these diseases is of concern, diabetes has a strong negative impact on all other diseases. Thus, controlling diabetes has become a national priority to improve the life expectancy of diabetics and to reduce health care costs. Approximately 7.8% of all non-Hispanic whites 10.8% of African Americans, 10.6% of Mexican Americans, and 9% of American Indians have been diagnosed with diabetes. As people get older these rates increase, often dramatically. For example, almost 50% of American Indians over age 45 have diabetes. Some research has shown that awareness of good management techniques for diabetes helps them control their diabetes.

People need reliable culturally-sensitive information on nutrition to make the appropriate food choices. Research-based nutrition information and programs are needed to help consumers evaluate nutrition and health claims so they can be more knowledgeable and make wise choices. Helping people find ways to adopt and apply the dietary and exercise principles promoted in the Food Guide Pyramid and the US Dietary Guidelines for Americans will be necessary to help adults achieve good health, long-term quality of life, and reduce the health care burden.

GOALS:

The individuals and families in Washington will obtain the knowledge and adopt behaviors to use food resources for nourishing diets and exercise patterns that optimize health and reduce health risks for children and adults.

OBJECTIVES:

1. Adopt food selection, preparation, storage and usage practices that maximize available food resources.
2. Adopt recommended dietary habits and physical exercise practices to optimize health and reduce health risks.

KEY COMPONENTS:

Low income food and nutrition programs.
Diabetes Management Awareness Program.

INTERNAL AND EXTERNAL LINKAGES:

Extension will collaborate with the state and local health departments, university researchers, anti-hunger groups, the department of social and health services and children nutrition programs, private health care providers and other states (OR) to address issues of food insecurity.

Extension and The Joslin Diabetes Center, will collaborate with the state and local health departments, university researchers and private health care providers to provide understanding of health care, especially diabetes.

AUDIENCE:

The audience will be (1) low income individuals and families who participate in educational efforts to nourish themselves and their families, (2) young families who are helping their children establish lifelong eating habits, (3) children who are responsible for making many of their own decisions about what foods to eat, (4) adults interested in establishing eating habits that support the long-term health and well-being, (5) people with diabetes, (6) organizations that can promote the principles of good nutrition to their employees and clients, and (7) organizations and communities that can work together to provide adequate food for people in the community.

Specific approaches to reach protected classes

Networks and collaborative efforts with agencies and groups to reach targeted audiences, share resources and provide training. Programs at locations and times to reach protected classes. Train volunteers from protected classes to help extend information

EVALUATION:

In evaluating education activities, we will collect data for programs related to:

- (1) use of food resources (improved menu planning, food shopping, saving money, preparation of low cost foods, etc.);
- (2) Assessment and management of health risk factors (e.g. diabetes, obesity, or hypertension); and,
- (3) diet and exercise practices as recommended in Dietary Guidelines for Americans.

Specific indicators should address the following:

- a) Number of people who participated in a program,
- b) Number who plan to adopt one or more of the recommended practices, and
- c) Number of people who actually adopted one or more recommendations within six months of the program.

PROGRAM DURATION: Long Term

GOAL 4: An Agricultural System that Protects Natural Resources and the Environment.

I. PLANT/ANIMAL SYSTEMS MANAGEMENT

ISSUE:

Washington State's diversity in agriculture is represented by five livestock species, aquaculture, and over 220 different crops which contribute to the state's economy. The combined farmgate value of agricultural commodities in Washington reached a record high of \$5.6 billion for 1997. Agricultural production, processing, and marketing account for approximately \$29 billion of the state's total economy, or about 20 percent of the gross state product (Washington Agricultural Statistics, 1995 - 1996).

The diversity of Washington agriculture is attributed to the wide range of climate zones. Agricultural products are produced at elevations varying from sea level to over 4,000 feet, in annual rainfall zones varying from 6 to over 140 inches, and in annual frost-free growing zones varying from 75 to 300 days. The diversity of agricultural producers and processors is nearly as great as the diversity of the major racial and ethnic groups in the world. These people brought to the state both the consumer desire for and the knowledge to produce different crops and livestock. The diverse environment meets the needs of a diverse culture.

The natural environment is frequently supplemented and modified by technology. Large irrigation systems are powered by low-cost hydro power water supplies in areas of the state where annual rainfall is insufficient to produce a high-value crop. Agricultural fertilizers and chemicals are used to increase productivity and manage pests, and the application of the principles of integrated pest management are changing the way these products are used. Natural resource stewardship is a powerful social, political, and economic force in the region, increasingly influencing the management of farm and forest lands as well as urban areas. An ample supply of relatively cheap petroleum has permitted the development and use of large equipment for tillage, cultivation, and harvest of crops. Mechanical material handling equipment has permitted the development of large livestock production and feeding units. Research and Extension have expanded the production, management, and marketing skills of the owners and managers of production and processing units.

At the same time, there are many issues Washington agriculture faces many issues related to economic and biological sustainability. Among these issues are:

1. Urbanization of agricultural lands
2. Societal issues related to agriculture including:
 - public concern about food safety;
 - declining farm populations;
 - declining rural communities;
 - public sensitivity to the role of agriculture and environmental influences, particularly related to endangered species; and
 - consolidation of farms/ranches in agribusiness firms into fewer/larger units.
3. Ability to compete in international markets
4. Reduced government support programs and a shift toward market-driven product pricing for agriculture
5. Increased volatility of commodity and input prices
6. Need to build coalitions (farmers/environmentalists/others) to negotiate economically feasible, environmentally protective resolutions to agriculture/environmental problems
7. Rural infrastructure supporting agriculture, e.g. agri-services, transportation systems, communications, and governmental services
8. Quality of air, water and landscapes.

Cooperative Extension can address many of these issues directly through educational programs and developmental activities, facilitation processes, and/or leadership intervention. Other issues may emerge as a result of coalitions of citizens, communities, and

agencies, including Cooperative Extension, working together to produce a solution.

The costs of not addressing issues can be measured in several ways. A major cost is the erosion of the agriculture resource base such as:

- reduction in incomes and quality of life of agricultural families and rural areas;
- urbanization of farm land;
- loss of productivity of land through poor farming practices;
- continued deterioration of the rural infrastructure, i.e. transportation, hospitals, government services, and supporting businesses and industries; and
- overall deterioration of natural resources such as soil, water, and crop and rangeland, and loss of species.

GOAL:

To increase agricultural profitability and competitiveness while preserving or enhancing the natural resource and rural environment.

OBJECTIVES:

1. Through coordination and cooperation, public and private research and educational organizations will develop sustainable agriculture systems that are appropriate for Washington State.
2. Producers and agribusiness firms will adopt decision support systems that recognize and evaluate the economic, environmental, and social implications of alternative plant and animal production systems.
3. By use of integrated interdisciplinary educational programs, plant and animal producers will more effectively manage the risks of market price variation, adverse environmental inputs, changing government programs, and variation in public awareness about nutrition and food safety.
4. Producers of plant and animal products, agribusiness firms, and Extension faculty will adopt an integrated, interdisciplinary systems approach to the development of sustainable agriculture programs.
5. Extension personnel will work in partnership with agencies (including regulators), interest groups (e.g., agriculture, conservation, forestry), government officials, colleges and universities, and other organizations to improve programs, reduce duplication, and increase efficiency.

LINKAGES

Internal:

1. Extension program teams, e.g. Ag Horizons, Blue Mountain, Forestry, Food and Farm Connections
2. Academic department research and extension faculty and staff.
3. Research and Extension Center personnel
4. County-based Extension faculty and staff

External:

1. Interest groups: agricultural groups, e.g. Washington Association of Wheat Growers, Washington Sustainable Food and Farming Network, Washington Farm Forestry Association; environmental groups, e.g. Washington Environmental Council, Audubon Society.
2. Commissions: agricultural commodity commissions, Conservation Commission, Commission on Pesticide Registration
3. Agencies: (examples) USDA Agricultural Research Service, Natural Resource Conservation Service, US Forest Service, US Fish and Wildlife Service, Farm Service Agency, US Environmental Protection Agency, APHIS, Rural Development, Risk Management, Washington State Department of Agriculture, Washington Department of Ecology, Washington

Department of Natural Resources.

4. Extension and research faculty in other universities, especially from Oregon State University, University of Idaho, and University of Washington.

AUDIENCE:

Agricultural producers, interest groups, employees, industry support personnel, consumers, rural families, single parent subsistence farm families, and ethnic minorities associated with agriculture.

Specific approaches to reach protected classes

The people in Washington agriculture reflect the diversity found in the general population. Individual Native Americans, as well as tribal-managed farm and ranch units, are actively involved in agricultural production and marketing. Hispanic and Asian (Japanese, Filipinos, SE Asians) people are prominent among the numerous growers of fruits and vegetables throughout the state. A large number of ethnic minority seasonal workers are employed during the height of the growing and harvesting season. Women as owners and operators are frequently found both in partnership operations and as sole owners/managers of farming units.

To reach Native Americans, we will continue to enhance working relationships with tribal entities and provide programs within reservation boundaries. Educational programs will be developed to target seasonal workers. The needs of women owners/managers will be considered in planning workshops and media programs.

EVALUATION:

In evaluating educational activities in this program area, we will collect data and submit reports for these **specific indicators**:

1. **Number** of sustainable agriculture programs and demonstrations implemented.
2. **Number of producers** adopting recommended sustainable agricultural practices.
- III. **Number of acres** managed under improved sustainable stewardship practices as a result of Extension education programs.
Number of acres of farm or forest land kept in current use (i.e., not converted to other uses.)
- 5 **Number of projects funded** by extramural sources and the value of the resources received (dollars, in-kind.)
6. Number of multi-state programs and partnerships.

PROGRAM DURATION: Long term.

II.

MANAGEMENT OF NATURAL RESOURCE SYSTEMS

ISSUE:

Forest, range, wetlands cover about three-quarters of Washington. Sustainable stewardship of natural resources systems on these lands is essential to the state's and region's economic vitality and quality of life.

Approximately 51% or 21.8 million acres in Washington is classified as forest land (Waddell, 1989). The percentage breakdown of forest is: national forest 29%, state and other public lands 15%, forest industry 29%, and non-industrial private 27% (Bosinger et al. 1997). Total employment in the state's forest products industries was 52,800 in 1995 (Warren, 1997). The 1995 gross business income for the Washington forestry and forest products sector was over \$100 million (Quarterly Business Review, 1996). Forest products account for over 10% of the employment in 18 of the state's 39 counties.

We estimate that there are over 45,000 non-industrial private forest owners (NIPF) with 20 or more acres in the state of Washington. Most own their land for non-timber purposes, particularly on smaller acreage. These owners are educated in stewardship management. Of those interested in commercial production, most have limited knowledge for proper management and marketing, and in many instances, even awareness of need for management and marketing information is lacking. Our challenge is to educate those interested in intensive management to use proper stewardship techniques.

Since the knowledge and abilities of NIPF owners vary greatly, the role of public and private forest advisors, such as county agents, state farm foresters, and private forestry consultants, is very important in helping ensure proper sustainable forest stewardship. Because forest advisors play a vital role in providing advice and technical assistance to NIPF owners, it is critical that their knowledge is up-to-date.

Seventy-nine percent of the state's commercial forest land is directly managed by professional foresters. Rapid technological advances, increased resource demand, public policy changes, and greater interest in and knowledge about environmental factors are causing obsolescence of the professional natural resource manager's knowledge. Cooperative Extension is looked to for leadership in technology transfer, continuing education, and for aiding in research implementation for these professionals. Urban and community forests and windbreaks play a vital role in the environmental quality and economy of Washington. These important resources effect erosion, economics, agricultural production, wildlife, snow and dust management, water quality, and aesthetics.

Approximately one-third of Washington, including rangeland and associated agriculture and forested lands, is grazed by livestock. Among agricultural crops, cattle and calves (including dairy produced for meat) ranked fourth in product value in 1989, producing more income than potatoes or hay but less than milk, wheat, or apples. All cattle and calves were valued at 0.4 billion dollars (Washington Crop and Livestock Reporting Service, 1990). Sheep contribute another 3.9 million dollars. There are currently 1.33 million head of cattle and 83,000 sheep. Together, the rangeland resources and livestock which depend on grazing lands to various degrees are of major importance to the state's economy.

In addition to direct economic benefits, rangelands are important habitat for wildlife and plants, including threatened and endangered species. These rangelands are also important to water quality and quantity, outdoor recreation, and aesthetics.

Impaired Resource Situations

Rangeland Condition Despite progress, much rangeland is in unsatisfactory condition. Overgrazing from livestock and wildlife, as well as technical and financial limitations, could impede range improvements.

Softwood Timber Supplies Most old growth timber on industrial lands in the Pacific Northwest has been harvested, and future harvesting on public lands is limited. Reduced supply and resulting price increases have increased domestic housing

costs, added to the nation's trade imbalance, increased pressure for timber harvest on non-industrial private lands, and disrupted local communities dependent on timber industries.

Management of Non-industrial Private Land Although non-industrial private lands are not expected to be intensively managed for timber or other resources, demand will increase for these lands to satisfy a greater share of the nation's timber needs. Inappropriate management will lead to deteriorated resource conditions, loss benefits and reduced income to individuals and communities.

Non-point Source Water Pollution Although the Conservation Reserve Program is expected to reduce non-point pollution from agricultural lands, it will not apply to non-point pollution from forest lands. If non-point pollution isn't reduced, there will be limited opportunities to enhance water-based recreation; reduced opportunities to alleviate existing ecological problems; water value will be reduced because of poor quality uses, increased water treatment costs, and increased flooding potential and reduced flood storage in reservoirs.

Regional Water Supply Water shortages are projected for some arid and semiarid regions of the United States where irrigation is the predominant consumptive use of water. Increasing demands in these regions will raise production costs for irrigated crops, disrupt local economies dependent on agriculture, and increase use conflicts between Native Americans and in-stream use.

Fish Habitat and Populations Cumulative effects from urbanization, farming, fishing, and forestry activities have resulted in reduced populations of native salmonid stocks. These problems have reduced fish populations, tilted the species mix to less desirable fish, reduced fishing opportunities and economic benefits, and endangered the very existence of some species.

Wetlands and Riparian Areas The acreage of wetland and riparian areas is declining due mainly to urbanization. This conversion of wetlands to other uses will provide short-term economic gains at the expense of fish, wildlife, and other resources; harm unique ecological resource that could take up to 50 years to recover; and cause long-term site instability.

Recreation Opportunities If recreational offerings do not match changing population preference, the result could be economic inefficiencies, overuse, and deterioration of preferred sites and lost recreation opportunities. Providing such opportunities is particularly critical in the Puget Sound region.

Uncertain Resource Situations:

Threatened and Endangered Species The official list of plant and animal species categorized as threatened or endangered continues to grow. This is occurring because we are learning more about species habitat preferences. Critically small populations result in very restrictive management policies. Continuation of the decline of species will reduce benefits derived from wild species; greatly increase costs of management; require significant measures to maintain species and unique ecological conditions; and reduce human activities.

Biological Genetic Diversity As land use intensifies, natural diversity is reduced, and ecosystems are simplified. The effects of such declines are uncertain. Potential impacts include reductions in long-term productivity of ecosystems, reductions in the ability of biological communities to adapt to change or recover from disturbance, and lost options for loss of genetic material to develop new crops and modify existing crops and livestock for local environmental conditions.

Compatibility and Conflict of Multiple Resource Uses Private lands must provide a relatively greater share of future natural resource outputs if demands are to be met. However, there is not enough information about landowner's objectives and resource interactions on private lands to evaluate the feasibility of increasing total outputs from these lands. This situation could lead to misjudgments about Washington's output capabilities, stifle increases in resource outputs that could be

developed with more information, and misdirect public and private programs targeted at just one renewable resource.

GOAL:

Natural resource owners, advisors, and professional managers obtain and apply knowledge that will lead to sustainable stewardship practices, consistent with owner objectives.

OBJECTIVES/KEY COMPONENTS:

1. **Sustaining Natural Resource Systems** - Natural resource owners and managers will improve forest, windbreak, range and wetland stewardship resulting in sustained benefits through the application of systems knowledge to harmonize multiple uses within complex biological and social systems.
2. **Professional Education** - Natural resource professionals will participate in continuing education programs enabling them to put latest and most appropriate technology and policy into practice.
3. **Policy Education** - Natural resource owners and managers will better understand and participate in the development of local, state, and federal policies.
4. **Public Awareness** - Natural resource owners, policy makers, and the general public, including youth, will become better informed about the economic and environmental role of forests, windbreaks, range and wetlands.
5. **Program Coordination** - Organizations and professionals which provide natural resource education, assistance, and research programs will improve coordination to reduce duplication of services and improve the efficiency and effectiveness of programs.

Specific training

Natural resource ecosystem training will be provided through annual in-service Extension program workshops, professional meetings, university seminars, and training provided by other agencies and organizations, such as the Natural Resources Conservation Service and the Western Forestry and Conservation Association.

Major materials

Extension publications, research publications from the University, U.S. Forest Service and Department of Natural Resources, and professional journals are important sources of educational materials. Area and state newsletters such as Forest Stewardship Notes provide a significant extensive means of reaching desired audiences. Symposia proceedings from past programs provide valuable information on a broad range of natural ecosystems management, including topics on watershed, range, and forest. Electronic-based materials include WWW pages, videos, computer programs, and CD-ROM. The development of WSU Learning Centers throughout the state will provide opportunity to use distance learning methods to improve citizen access to educational resources.

LINKAGES:

WSU Cooperative Extension Natural Resources Team includes faculty and staff from the department of Natural Resource Science and Cooperative Extension. It works closely with several public and private organizations. Key among these is the Washington Nonindustrial Private Forestry Interagency Committee (NIPFIC), which includes Extension; Washington Department of Natural Resources; the USDA Natural Resource Conservation Service; the USDA Forest Service; the Washington State Association of Conservation Districts; the Washington State Conservation Commission; and the Washington Department of Fish and Wildlife. Extension representatives serve on the multiorganization State Stewardship Committee. In 1998, the Washington Private Forestry Forum was established with WSU Department of Natural Resource Sciences, the University of Washington College of Forest Resources, the Washington Farm Forestry Association, and the Washington Forest Protection Association as members.

Additionally, there is close cooperation with the Washington Rangelands Committee.

AUDIENCE:

Audiences will include; forest, windbreak, range and wetland owners and managers, natural resource advisors, natural resource professionals, natural resources and environmental interest groups, and ethnic minority forest land owners and managers.

Specific approaches to reach protected classes

Special emphasis will be made to reach Native Americans, by working through tribal councils. Managers, council members, and tribal employees will be contacted through direct mailings.

EVALUATION:

Specific references, consultants and measurement tools

Key assistance available to assist faculty includes:

Washington State University Social and Economic Research Center, Don Dillman, Director
Social Scientist, Economist, and Extension Foresters in the Department of Natural Resource Sciences

Dillman, Don A., 1978. Mail and Telephone Surveys: The Total Design Method. New York: Wiley.

Krueger, Richard A., 1988. Focus Groups, A Practical Guide for Applied Research. Newbury Park, CA: Sage Publications.

Patton, Michael Q., 1982. Practical Evaluation. Beverly Hills, CA: Sage Publications.

In evaluating educational activities in this program area, we will collect data and submit reports for these **specific indicators**:

- Number of educational events conducted.
- Number of people attending educational events.
- Number of contact hours of education, i.e. # of people x # of hours/event
- Number of people expressing change in knowledge, skills, or abilities.
- Number of individuals receiving one-on-one consultation or assistance.
- Number of acres impacted.

PROGRAM DURATION: Long Term.

III.

INTEGRATED PEST MANAGEMENT

ISSUE:

It is estimated that infestation of food, fiber, and forage crops by pests and disease reduces global agricultural production by 30 percent. Pests, parasites and disease cause hardship to humans, livestock, and pets. Pests and disease also attack ornamental plants in recreational and domestic habitats. The development and broad-scale application of pesticides during the past 50 years has insured western civilization against famine, devastating economic loss, provided for a wholesome diet, and resulted in improved public health. Unfortunately, environmental costs go along with the benefits received from pesticides. Pesticide use in certain circumstances has resulted in documented biological damage to managed and natural ecosystems. Integrated Pest Management is a strategy that uses various combinations of pest control methods; biological, cultural, and chemical in a compatible manner to achieve satisfactory pest control while maximizing favorable economic and environmental consequences. Increasing adherence to IPM principles for pest and disease management in Washington State will enhance environmental quality and provide benefits for all the citizens of the Pacific Northwest.

Washington State ranks sixth in agronomic production among U.S. states and territories. However, with over 200 commercial crops, Washington State ranks second among U.S. states and territories in diversity of crops produced. Large quantities of pesticides are used within Washington State for pest control in both agricultural and urban areas. Demographically the 5.6 million people that reside in Washington are unevenly distributed. Three million people inhabit the narrow 2,400 square mile urban corridor that comprises the greater Seattle/Tacoma area that rims the eastern and southern shores of Puget Sound. The other 2.6 million residents of Washington inhabit the other 65,000 square miles. In 1997, Washington State's gross domestic economy produced \$172.3 billion in goods and services. Agriculture is Washington State's largest industry with a value exceeding \$5.6 billion in 1997. Exports of agricultural commodities from Washington State are a significant part of the regional economy.

Agricultural producers in Washington State face an uncertain future with respect to pest management options. Registration of commonly used pesticides may be discontinued due to federal and state regulations. Many agricultural and forest producers also must address management practices needed to protect habitat associated with endangered species. Furthermore, agricultural producers, processors, and exporters are challenged economically by continuing low prices for commodities.

The agricultural industry in Washington State needs scientific and economic information on IPM to improve pest control and to maintain their economic competitiveness and leadership. Pest monitoring, crop injury assessments, pest identification, and economic feasibility to identify alternatives to conventional pesticides are specific information needs for pesticide users. Some commodity groups in Washington State provide resources to support IPM research on specific pests. The Washington State legislature provides funding for research on pesticides and alternatives to pesticides.

Status of the Washington State University IPM Project

Most WSU faculty and staff who conduct research or educational programs in agriculture and natural resources promote the principles of IPM. The extent of their integration and promotion of these principles varies widely, dependent to some degree on the amount of science-based information available. An increasing number of examples indicate collaborative research and Extension work among WSU personnel and practitioners. Most of the statewide program teams include IPM in their goal or vision statements and in their educational and research programs.

WSU has had an active IPM program and an IPM coordinator for many years. Recently, Extension and research leaders have committed to a more robust program to help solve the many pest management problems facing citizens of the state. A new IPM Coordinator has been appointed to initiate this four-year plan. An IPM website provides public access to pest management guidelines and related websites. IPM principles and practices are included commonly in Extension publications and some publications are devoted entirely to IPM practices on specific crops or environments. Faculty and staff conducting pest management educational programs regularly include IPM information, and the training program for pesticide licensing includes information about IPM.

GOALS:

- Reduce the pesticide load in the environment to safeguard human health and the environmental health of Washington State through the improved implementation of integrated pest management (IPM) strategies.
- Increase the range of benefits and opportunities achieved by enterprises and individuals through improved use of IPM strategies and systems.
- Increase the supply and improve the dissemination of information about IPM strategies and systems to IPM staff, University faculty, local government, state agencies and others.
- Enhance multi-party collaborations and the exchange of information between public, private, and non-profit stakeholders in order to foster the development and adoption of IPM strategies and systems among selected audiences.

KEY COMPONENTS:

IPM programs will be carried out through the following strategies

- I. Provide support for obtaining extramural funds (grants, gifts, cooperative agreements) to support IPM projects conducted by WSU faculty with cooperation and support of stakeholders.
- II. Increase the use and improve the quality of the Washington IPM webpage.
- III. Conduct IPM programs in collaboration with the Center for Sustaining Agriculture and Natural Resources, Pesticide Education Program, Extension Agriculture and Natural Resources Program, and the Food and Environmental Quality Laboratory.
- IV. Support the development and use of IPM educational materials such as publications, videos, and other electronic forms.
- V. Assist faculty in the development and implementation of IPM educational and research programs.

In fiscal year 1999-2000, specific crops or cropping systems will be targeted for IPM evaluation. These areas will be identified and selected by the new IPM Coordinator. Focus on specific crops or cropping systems will enable the Coordinator to establish more specific performance goals and develop evaluation procedures to assess effectiveness.

Candidate crops or systems in Washington State include treefruits (e.g., apples, pears, cherries, plums); vine crops (e.g., hops, and grapes), dry land systems, small fruits, vegetable crops, forage crops, irrigated systems, small farms (including organic) and forest systems.

Crops or cropping systems will be selected according to specific criteria, including the following:

1. The potential for defining a functional level of application for recommended IPM practices.
2. An existing IPM research-based (public or private) infrastructure through which IPM information has strong potential for being implemented.
3. Faculty, Extension educators, agricultural producers, pest control advisors, and commodity organizations prepared to collaborate on educational and research activities related to implementing IPM strategies on the target crop or cropping system.
4. Level of interest in the commodity or cropping system area for change and adoption of IPM practices.
5. The economic, environmental, and social significance of the commodity.
6. Availability of baseline information.

LINKAGES:

Internal:

- Faculty and staff in academic departments, e.g. entomology, Plant Pathology, Crop and Soil Science, Natural Resource Science, Biosystems Engineering, Animal Science.
- Faculty and staff in other units and programs, e.g. Pesticide Information Center, Pesticide Education Program, Center for Sustaining Agriculture and Natural Resources, Food and Environmental Quality Laboratory, Raspberry Program, Cranberry Program, IMPACT Center.
- County-based Extension faculty and staff working in agriculture, forestry, natural resources, community horticulture.
- Program teams, e.g. Community Horticulture, Forestry, Ag Horizons, Water Quality, Livestock, Blue Mountain, Food and Farm Connections, Vegetable Pathology.

External:

- USDA Agricultural Research Service.
- US Agricultural Statistics Service.
- US EPA, especially Region X.
- WS Departments of Agriculture, Ecology, Health and Natural Resources.
- Consultants and service providers
- Commodity associations, commissions and interest groups.
- Small farms and alternative agriculture, e.g. Washington Sustainable Food and Farming Network, Washington Tilth, Seattle Tilth, environmental groups, Evergreen State College organic agriculture program.
- Research and extension faculty at other Land Grant universities, especially Idaho, Oregon and California.
- Western IPM group.

AUDIENCES:

Targeted audiences will be drawn from the population of enterprises and individuals most likely to make use of IPM strategies and systems within Washington State, and will include growers, consultants, nursery operators, golf course operators, lawn services, pest control operators, homeowners, public facilities managers, WSU faculty and staff, local, state, and federal government representatives.

Specific Approaches to Reach Protected Groups:

Workshops will continue to be developed to reach Hispanic tree-fruit workers. Materials for pesticide applicator training will be translated into Spanish. Community gardening workshops and educational material in the Puget Sound metro area focusing on integrated pest management will target the Asian community and will use translators.

EVALUATION:

Data for analysis will be collected by written evaluations of training sessions by audience participants; surveys of producer, pest

control operator and advisor practices; commodity group support of specific demonstration practices; surveys of citizen knowledge and practices. The WSU IPM Program will work with commodity/cropping system teams to determine accurate baselines for performance indicators.

INDICATORS:

1. The total number of production units (farms, organizations, individuals) using IPM strategies and systems within the selected crops or cropping systems.
2. The diversity of IPM practices used on the selected crops or cropping systems.
3. The total input costs for the selected crops/systems among selected audiences using IPM strategies and systems .
4. The number of newly validated prevention -based pest management products, services, tactics, or practices available for use on the targeted crops/systems .
5. The total number of public forums, committee meetings, conferences, and other venues of participation, involving joint sponsorship or collaboration with the WSU IPM program .
6. Number of demonstrations advancing Integrated Pest Management practices .

PROGRAM DURATION: Long Term.

IV.

LOCAL & COMMUNITY FOOD SYSTEMS

ISSUE:

There is growing interest in local food production on a commercial and non-commercial basis. More farmers are producing specialty food crops on small-acreage, urban/suburban lands. Community supported agriculture (CSA), which was virtually unknown just a few years ago, has become a popular source of fresh produce for citizens in the Puget Sound region. Small-scale livestock production is common in and around cities. The number of farmers' markets continues to grow. Interest in community and home vegetable gardening is on the rise. And many low-income residents, anticipating reduced food-stamp benefits, will need to become more food self-sufficient.

In part, this may be a reaction to the long-term trends toward large-scale, commercial agriculture which has led to:

- *Decline of Rural Communities* - Small farms are being consolidated into larger farms, and farmland is being lost to development. Nationally, we are losing 35,000 farmers a year (Valliantos).
- *Farmland Loss* - A study, produced from a year-long analysis of USDA land-use inventories, concluded urban development is destroying 50 acres of prime and unique farmland every hour of every day." Of the 20 most threatened agricultural regions in the US, the Willamette/Puget Sound Valleys ranked #5 and the Columbia Basin is #16 (Williams).
- *Ecological Damage* - Mainstream agriculture depends on large inputs of fossil-fuel for fertilizers, pesticides, equipment operation, and transportation. As an example, the average food product travels about 1,200 miles from its point of origin and passes between 5 to 7 hands before it reaches the consumer (Garrett & Feenstra).
- *Consumers Disconnected from Food System* - In an increasingly urban society, fewer consumers have any connection to farmers or the land. This breeds lack of understanding and mistrust between agricultural producers and consumers. A growing number of urban consumers are asking for organic produce, subscribing to community supported agriculture, buying from farmers' markets, or raising some of their own vegetables, meat, and poultry because they question the quality and safety of what is available in supermarkets. But small, local producers find it difficult to stay in business if consumers only consider price when purchasing food.

There are many benefits to encouraging local and community food production, they include:

- *Community Building* - Direct connections between consumers and farmers build a sense of community. So do the interactions at community gardens, farmers' markets or between neighbors who garden and share produce. A study of the Philadelphia urban gardening project found that: "Urban gardens also provide a focal point for people to come together in a community and build neighborhood relationships at a time when disappearing resources put a strain on inner city families" (Blair, Giesecke, & Sherman).
- *Economic* - The economic benefits of small-scale, local agriculture appear minor compared to large-scale production. But standard economic indicators may not measure many of the benefits. Non-commercial food production in community gardens or backyards can reduce the cost of food for many; this can be especially important for low-income citizens. Urban pressures promote innovation so that small-scale producers often realize returns per acre that far surpass large-scale farms, and most of this money stays in the local economy.
- *Environmental Quality* - Small farms and community gardens help preserve valuable open space in urban areas. Small farms are generally able to recycle all waste materials directly on site, use efficient irrigation systems, and minimize ground and surface water contamination. Small-scale producers can often employ pest management practices that are not feasible for large farms. And pesticide use on farmland is generally less per acre than on adjacent urban landscapes

(US EPA).

- *Diversity* - Diversity is considered a sign of health in ecosystems, societies, and economies. While local food production is not likely to replace globalized agriculture, it does add more diversity to the food system. That adds more flexibility if one aspect of the total food system fails. Local farms also fill niches to which large operations do not respond well. In turn, these specialty farmers, along with gardeners, help preserve the diversity of seed stock and livestock breeds.

- *Nutrition* - People who grow their own produce have better diets. "Urban gardening is related to an increased frequency of vegetable consumption and a decrease in dairy, sweets, and sweet drink consumption" (Blair, Giesecke & Sherman).

- *Consumer Involvement* - Local food production allows consumers to become more actively involved in the food system. This may include supplying labor for planting, weeding, and harvest of crops. This fosters a sense of empowerment and helps build trust between consumers and farmers.

- *Social Well-Being* - Food gardening may be an important strategy to increase food access for poor citizens. Gardening can reconnect immigrant families torn apart by differing cultural values. Studies also confirm that people's mental and physical health are enhanced by the experience of "green" spaces such as gardens and farmland (Kaplan and Kaplan).

- *Improved Understanding* - Much can be gained by better understanding of agricultural, nutritional, and consumer issues among large scale and small scale agriculturists, consumers, and urban residents. Lack of understanding leads to unmet needs, criticism, and poorly solved problems, such as land use, environmental quality, human health, and quality of life.

GOAL:

Establishment of local food systems that are relevant to communities and enhance the economic, environmental, and social well-being of those communities.

Improved understanding of the value and characteristics of the major components of Washington's existing and emerging agriculture and food systems.

OBJECTIVES/KEY COMPONENTS:

1. Work with local policy makers to encourage the preservation of local farmlands.
2. Work with local producers and policy makers to reduce regulatory constraints to local food production (e.g., regulations often discourage the transport and sale of fresh food products.)
3. Facilitate the entry of people into local food production systems, both commercial and non-commercial.
4. Help educate consumers about the benefits of locally produced food products.
5. Support "on-farm" (including non-commercial food systems) research to provide local answers to local problems.
6. Serve as a clearinghouse for local food producers by gathering and disseminating innovative information from other areas of the world.
7. Build a stronger relationship between traditional agricultural and emerging agricultural interests in the state through improved understanding of all systems.

Cooperative Extension has expertise in agricultural sciences, agricultural economics, food and nutrition, community development, and youth development. It also has a large group of well-trained volunteer educators (e.g., Extension Food Advisors, Livestock

Advisors, Master Gardeners). All these can be mobilized in this effort.

LINKAGES:

Internal

WSU Food and Farm Connections - a Western Washington Extension faculty team that is facilitating the development of a Western Washington food system stakeholder coalition.

External

Washington State Food and Farm Network - a sustainable agriculture public policy advocacy group.

Tahoma Food System - a non-profit organization dedicated to a just and sustainable food supply in the South Puget Sound.

Extension faculty provide some management and education to the organization and its projects.

Western Washington Horticulture Association - a non-profit organization designed to meet the educational needs of farmers.

Extension provides shared leadership along with farmers and food industry personnel.

AUDIENCE:

Food consumers, small-scale food producers, farmers' markets, specialty food-crop producers, community supported agriculture enterprises, community gardens, low-income audiences (e.g., former or current food-stamp recipients).

Specific approaches to reach protected groups:

This program is specifically targeted to low income families and individuals. In the Puget Sound area, there are many SE Asian immigrants who want to produce their own food, as they did at home, but they need help with knowing how to do that in their new environment. Working with community leaders and other agencies and non-profit groups is a way to reach this target group.

EVALUATION:

In evaluating educational activities in this program area, we will collect data and submit reports for these **specific indicators**

1. Increase in number of community garden participants, most of which will low-income.
2. Increase in the number of community supported agricultural enterprises
3. Increase in the number of small farms
4. Increase in the number of vendors at farmers' markets
5. Increase in the number of consumers having direct contact with food producers through on-farm educational events.

PROGRAM DURATION: Long term.

V. WATER QUALITY PROTECTION FOR ENDANGERED SPECIES RECOVERY

ISSUE:

Nonpoint source pollution, groundwater contamination, decline of aquatic habitats and the management of wetlands are important continuing problems affecting water resources and aquatic species in Washington. The Washington Department of Ecology (DOE) reports that bacteria, suspended solids, low dissolved oxygen, high temperature, nutrients, and pesticides are among the primary causes of nonpoint source contamination (DOE 1996 Statewide Water Quality Assessment). Major sources listed are runoff from livestock production operations, irrigated and non-irrigated crop production, urban runoff, construction, and forest practices. Onsite sewage systems contribute contaminants in some locations.

Water-caused soil erosion produces the greatest contaminant of surface water--sediment. The sediment load in streams from erosion of agricultural land, forests, range land, and urban development degrades water quality for aquatic life and settles in natural lakes and reservoirs which reduces their capacity and useful life. The movement of sediment, pesticides, and manure contaminants from the landscape into surface water has degraded water quality in some areas of Washington. Current monitoring of surface water in the state indicates that sediment and plant nutrients from dryland and irrigated agriculture continue to threaten surface water and ground water quality.

Aquatic habitat has been degraded through impacts associated agricultural activities, forest harvesting, urban development and widespread rural development. These impacts include: High temperatures and low dissolved oxygen that interfere with the normal life cycles of fish; pathogens and toxins that can render fish unsafe to eat, bio-accumulate or harm them; sedimentation and other forms of habitat alteration that destroys spawning areas and food availability; and reduced instream flows which can lead to higher water temperatures, low dissolved oxygen, reduced available habitat and food sources. In March of 1999, the National Marine Fisheries Service added nine species of salmon and steelhead in Washington and Oregon to the endangered species list. Bull trout and sockeye salmon had previously been listed and more listings are anticipated in this region. Habitat alteration and destruction has been identified as one of the major impacts to these species.

Ground water is the primary source of drinking water for more than 60 percent of the state's population. Approximately 95 percent of public water supply systems use ground water as their source. Municipal water supplies are treated, whether from surface water or groundwater, and water supplies are tested under the Safe Drinking Water Act. Testing is not required, however, for private wells. Nonpoint source pollution constitutes the largest threat to these drinking water sources.

The U.S. Geological Survey (USGS) studied their data collected in the Central Columbia Plateau from 1942-94, (although most of the data are from 1980-1994), and found 19% of the 573 wells exceeded the U.S. Environmental Protection Agency (EPA) maximum contaminant level (MCL) for nitrate in drinking water. They concluded land use has the greatest influence and generally fertilizer and water use is related to nitrate concentration (USGS, 1996). Low concentrations of pesticides were found in 67% of groundwater samples collected during 1993-94 from 49 wells in the Quincy and Pasco Basins. Of the 145 compounds looked for, only EDB exceeded the drinking water MCL in two domestic wells (USGS, 1996). Surface water in the Central Columbia Plateau contains pesticides at very low concentrations. None exceeded MCL for drinking water.

DOE monitored groundwater for pesticides and summarized the results from 1988-1995 (DOE, 1996), finding that 21 of the 145 study pesticides were detected in groundwater. Of the 23,370 pesticide analyses, 168 were positive detections. Only three pesticides (DCP, EDB, DBC) were detected exceeding MCL for drinking water. DCP and DBCP were canceled for agricultural use in 1977, EDB in 1984. The data do not suggest the pesticides in groundwater pose a significant environmental or public health threat. Nor do they prove pesticides will not develop to a future threat.

A subcommittee of the IGWC (DOE, 1996) conducted an environmental and public health assessment of nitrate contamination in groundwater of the mid-Columbia Basin. The subcommittee concluded there is significant nitrate contamination in localized areas to expose part of the population through drinking water supplies. The nature and extent of adverse health effects therefore is unknown.

There were 631 domestic and public water supply wells in the study. About 20 percent (127 wells) had an average nitrate-nitrogen concentration greater than the 10 mg/L state drinking water MCL.

In 1990, 324 commercial and noncommercial shellfish farms created about 2,130 jobs in the industry. Shellfish were produced on 228,000 acres of tidelands (Washington Sea Grant, 1996). Commercial shellfish production areas must also meet state and federal water quality standards to be certified by the (DOH). Due to bacterial contamination of marine water from nonpoint sources, the DOH has restricted or prohibited the harvest of shellfish from 33,150 acres of growing area (DOH, 1995). Failing septic systems, urban storm water, livestock production, and boats/marinas have been identified as major sources of this pollution. In less than one year, nearly every part of Washington will likely have salmon, steelhead or trout listed as threatened or endangered under the federal Endangered Species Act.

The Federal Clean Water Act, DOE Centennial Clean Water Fund, DOE Water Quality Program, Puget Sound Water Quality Authority, and DOH Water Quality program expend budgets totaling millions of dollars annually. Other state and federal agencies and numerous local sources contribute funds in their water quality programs. The expenditure of millions of dollars for water quality indicates how much the public values clean water. The cost of improving and maintaining quality water by the private sector is significant, but unknown. There will also be millions of dollars spent in recovery efforts for salmon, trout and steelhead.

GOAL:

Protection and improvement of Washington's water resources. (These resources representing water quality, quantity, flora and fauna).

OBJECTIVES:

1. Increase public awareness of water resources: Washington residents will have a greater understanding of the interdependence of water resources, human health and the ecology of their region.
2. Use Cooperative Extension's technical expertise and educational programs in pollution prevention to reduce water resource degradation from contaminants such as: failing onsite sewage systems, household hazardous waste, manure pathogens, nutrients, pesticides, soil erosion.
3. Develop effective and economically feasible best management practices to minimize the movement of soil, nutrients, pesticides and other contaminants into surface and ground waters cooperatively with WA Department of Ecology, Natural Resources Conservation Service, Conservation Districts and other appropriate partners.
4. Help farm managers account for available nutrients and avoid excess nutrient inputs that can degrade surface water and groundwater.
5. Help landowners and managers adopt practices to conserve and restore wetlands, riparian areas and aquatic habitats. Specific efforts will be made for salmon protection and restoration.
6. Protecting public water supply and private wells.
 - *Teach families and youths about their water systems and sources so they recognize potential threats to the safety of drinking water supplies, test to determine problems, and be able to take corrective action.
 - *Teach well owners the dangers of unprotected wells and how to use wellhead protection measures.
 - *Teach rural dwellers about the dangers of improperly abandoned wells for both human safety and water quality, encouraging well owners to properly close abandoned wells.
7. Assist agricultural producers, small scale farms and Washington residents to improve water conservation practices to protect water resources.
8. Educate the general public and appropriate clientele about how to protect aquatic life, especially those listed as endangered species.

KEY COMPONENTS:

Outreach methods

Training programs for faculty, staff, high level volunteers and appropriate partner organizations will be conducted for drinking water protection and treatment; transport, fate and management of agricultural chemicals; nutrient management; salmon issues; riparian habitat management and horticultural effects on water quality.

Training programs for specific clientele groups, the general public and underserved populations will be conducted for drinking water protection and treatment; transport, fate and management of agricultural chemicals; nutrient management; salmon issues; riparian habitat management and horticultural effects on water quality. Other outreach techniques to be emphasized will include field demonstrations, mass media (such as newspapers, newsletters, radio and television programs), workshops/meetings on agricultural, forestry and residential impacts to water resources and ways to minimize these impacts.

Home-A-Syst drinking water protection programs will be conducted with staff and trained volunteers.

Volunteers will be trained through the Master Watershed Stewards, Master Gardeners, Livestock Advisors and 4H programs to support water resource protection efforts.

Major materials and resources

- a) Teaching materials: Water Quality for Domestic Use (handbook). Water resources/quality curricula for K-12 youths (e.g., 4-H Discovery series and Experiencing Water Resources: A Guide to the Yakima Basin - WSU Cooperative Extension; Water, Water Everywhere, Oregon Sea Grant; 4-H Challenge Water Quality Curriculum, WSU Cooperative Extension.
- b) Computer software for a mathematical model of Chemical Movement in Layered Soils (CMLS), with supporting data, and MNB: Manure Nutrient Balancer.
- c) WSU and nationwide web sites, bulletins, slide sets, and videos on water quality. Physical groundwater models.
- d) Bibliographies of national water quality reference material.
- e) Washington State Water Quality Guide (NRCS/CE/FSA); Manual of Irrigation Practices to Protect Ground Water; Salmon and ESA Resource Book.
- f) Home*A*Syst program printed materials and displays.

INTERNAL AND EXTERNAL LINKAGES:

There are a number of essential partnerships that will be utilized to further our resources, eliminate duplicative efforts and to target specific audiences. Partners local organizations, commodity and producer groups, community associations, other universities and colleges, watershed councils, non-profit groups, conservation districts, irrigation districts, and local, federal and state agencies.

Specific state and federal agencies include: WA Department of Health, WA Department of Agriculture, WA Department of Natural Resources, WA Department of Fish and Wildlife, WA Department of Ecology, Puget Sound Water Quality Action Team, University of Washington, Washington Sea Grant Program, Conservation Commission, Natural Resources Conservation Service, US EPA, US Forest Service, and the US Bureau of Land Management.

Specifically:

- Washington State University, Oregon State University and the University of Idaho and the USEPA Region 9 will develop an educational program based on mutually agreed upon regional priority concerns utilizing the resources of each of the partners.
- Washington State University, Washington Sea Grant Program and the Puget Sound Water Quality Action team will cooperatively implement educational elements identified in the Puget Sound Water Quality Work Plan.
- Washington State University will work cooperatively with state and federal agencies represented on the Governor's Council on Environmental Education to target mutually agreed upon priority audiences and water resource issues.
- Washington State University will work cooperatively with local, state, federal, private and non-profit organizations represented on the Government's Council on Natural Resources to provide education and outreach on federally listed endangered aquatic species.

AUDIENCES:

Washington adults and youths; volunteers; agricultural producers; suppliers; commodity groups; foresters; Natural Resources Conservation Service and Conservation District staff; Departments of Fish and Wildlife, Ecology, Health, and Agriculture; the Environmental Protection Agency; local and state decision-makers; private well owners; and WSU faculty and staff.

Specific approaches to reach protected groups

Protected classes will be reached by including selected subjects, such as safe drinking water, into ongoing programs reaching low-income audiences and as a part of programs with Native American tribes. The Home-A-Syst program has been developed in a Spanish version and will be used to target that underserved population.

EVALUATION:

In evaluating Extension programming, data will be collected and reported for these **specific indicators**:

- Number of program participants.
- Number of program participants who effect a change in practice that will improve/protect water resources or protect aquatic life.
- Number of acres that program participants effect change upon.

Measurement tools

Project evaluations will be conducted by using surveys of participants, focus group interviews, and participant follow-ups. Assessment will be conducted of programs designed to effect positive community and clientele actions in protecting endangered aquatic species. In some cases short, on-going evaluations will be conducted as a particular program progresses.

PROGRAM DURATION: Long Term

VI.

STEWARDSHIP ETHIC

ISSUE:

Washington's population is expected to grow to 6 million in the next ten years. Few states enjoy the abundance of natural beauty and resources that Washington possesses, but as human demands expand, the resources of the state are suffering (State of the Environment Report, 1989). As a result of strong regional growth and rising energy demands, total carbon dioxide releases in the Northwest have increased 40% in the last 10 years, (Washington Energy Strategies Commission, 1993). "Air pollution, water pollution, the destruction of wetlands, forest, farm lands and other habitat for fish and wildlife –these and many other threats are jeopardizing the sustainability of our environment and our quality of life, for us and future generations," (Environment 2010 Report, 1990).

Action and education are both necessary ingredients in meeting the environmental problems of the state. Action is important to redress pollution. There is also an important role for education to prevent future pollution. It will be important to additionally foster a spirit of collaboration and cooperation among all stakeholders for the resolution of complex environmental concerns. Particularly when there is conflict over the nature of the problem and the measures for its resolution.

If a new environmental ethic is not created, current problems will likely become worse. We will have more pollution, more regulation, less control by individual residents, fewer recreational opportunities, greater clean-up costs (which will probably place an unbearable financial burden on state and local government), and curtailed economic and community vitality. In short, the continued health and well-being of our people, wildlife, and natural resources will be in jeopardy.

Emphasis needs to be given to resolving environmental issues constructively instead of protecting entrenched positions. The development of an environmental ethic would yield a more informed citizenry that is knowledgeable about natural resource issues and empowered to become actively involved in their resolution. The adoption of collaborative interest-based problem solving and "consensus" approaches to dispute resolution could result in fewer issues ending up in litigation or legislation. The end result of all our efforts should be the return of Washington's natural systems to a more balanced state, reversing the trend of decreasing quality of air, water, soil, forest, range, and wildlife resources.

WSU Cooperative Extension has a 30 years of experience in water quality and natural resource/management programs. Building on this experience, Extension will work the people of Washington to meet the following goals.

GOAL:

Washington residents will have:

- a clearly articulated set of public values (an environmental ethic) that includes individual, organizational, and community responsibilities for preserving and enhancing our state's environment.
- a process for reaching consensus and resolving conflict over environmental issues.
- an unbiased source of education and technology transfer on energy efficiency and/or waste reduction.

OBJECTIVES:

1. Washington adults and youths will develop an enhanced environmental appreciation and environmental ethic through education programs conducted by WSU Cooperative Extension.
2. Individuals, community groups, organizations, and governments will strengthen their leadership, collaborative problem-solving, decision-making, and risk assessment skills in the environmental arena.
3. Washington residents, communities, and industries will implement programs aimed at the reduction, reuse and recycling of waste.

4. Individuals, community groups, businesses, and agencies will solve environmental problems with WSU Cooperative Extension serving as a convener and facilitator of unbiased collaborative interest-based processes and a source of research-based information.
5. Washington residents, businesses, utilities, and communities will implement programs to increase energy and resource efficiency.

KEY COMPONENTS:

Specific training will include:

1. **Program Support Workshops** in ecological systems, understanding environmental issues, skill -building for advanced facilitation/mediation/ethics/dialogue sessions/issues forum/moderation and their development, using citizen involvement and volunteers to address environmental problems, develop youth programs, inter-agency collaboration, developing creative partnerships, managing community change, and risk assessment.
2. **Energy Awareness Workshops** to develop the linkage between energy and environmental issues. Energy & resource efficiency workshops targeting K - 12, community groups, and professional associations.
3. **Mentoring opportunities** for faculty, staff, and volunteers via co-facilitation of workshops, retreats, meetings, and collaborative problem solving processes. This program will be available across district boundaries.

Major materials

1. Curriculum for youth programs and schools (example, the 4-H Discovery and Challenge programs) and adult volunteer programs (for example, proposed Environmental Stewardship Master Volunteers and additions to all Master Volunteer curricula, to include collaborative problem solving processes and facilitation).
2. Development of a hands-on manual for use in facilitating the resolution of environmental conflicts.
3. Development of publications and audio-visual materials on a variety of environmental and energy topics.

LINKAGES:

Western Rural Development Center and, through it, the member States and Territories.

AUDIENCE:

Adults and youths of Washington, including agriculturalists and agricultural/commodity groups; natural resource agency personnel; environmental and energy organizations; tribal governments; protected classes; land developers; utilities; homeowners; industries; business people; 4-H members; and WSU faculty, staff, and volunteers.

Specific approaches to reach protected classes

Approaches will include incorporation of environmental education into Extension low-income programs, co-sponsoring workshops with organizations representing culturally diverse groups, and the development of Spanish-language versions of written and video educational materials.

EVALUATION:

In evaluating educational activities in this program area, we will collect data and submit reports for these **specific indicators**:

1. Number of program participants and people increasing their **knowledge** of environmental and energy issues.
2. Number of people [e.g., 4-H, master volunteers, teachers, program participants] implementing a **practice change** that

reduces environmental pollution or degradation.

3. Specific **conflicts prevented or resolved** through environmental education and **collaborative approaches to problem solving**. Other **actions, legislation, and/or regulation** resulting from public involvement and education programs that protect or improve the environment.
4. **Habitats** improved and/or wildlife protected through actions of program participants.
5. Number of inter-agency and public-private **partnerships** created to enhance the delivery of environmental education programs.
6. Amount of public/private **support** (e.g., agency and foundation) generated for environmental and energy program development and delivery.

Specific references, consultants and measurement tools:

Recommended evaluation references are:

Dillman, Don A., 1978. Mail and Telephone Surveys: The Total Design Method. New York: Wiley.

Herman, Joan, 1987. Program Evaluation Kit. Newbury Park, CA: Sage Publications.

Krueger, Richard A., 1988. Focus Groups, A Practical Guide for Applied Research. Newbury Park, CA: Sage Publications.

Patton, Michael Q., 1987. How to Use Qualitative Methods in Evaluation. Newbury Park, CA: Sage Publications.

PROGRAM DURATION: Intermediate Term.

GOAL 5: Enhanced Economic Opportunity and Quality of Life for Americans.

I.

PARENTING

ISSUE:

In Washington State, parenting has been identified as a major need through a variety of county and state needs assessments. Results from the 1995 WSU Omnibus Survey indicate that Washington State residents, 66.8% on the east side and 65.0% on the west side, see parenting skills as a very important need. Town Hall Meetings, conducted by the College of Agriculture and Home Economics in sixteen locations around the state, identified parenting as the highest priority in the area of individual and family well being. In addition, Extension clientele have requested information and programs on parenting.

Parents are experiencing special pressures today not faced by previous generations. The National Commission on Children's 1991 national survey, "Speaking of Kids," reports that 88 percent of American adults, regardless of age, race, marital, or parental status believe that it is harder to be a parent today than it used to be, and that 86 percent of parents today often are uncertain about what is the right thing to do in raising their children.

In Washington State there are 1,261,387 children ages 18 years and younger. The majority of the population is white. However, their representation in the total population declined from 90.4 to 86.7 percent between 1980 and 1990. Blacks increased from 2.5 to 3.0 percent of the state's population and the Native American population grew slightly from 1.5 to 1.6 percent. Statewide, the biggest increase occurred in the Asian population which grew from 2.6 to 4.2 percent of the state's population, and the Hispanic population, which grew from 2.9 to 4.4 percent.

A major concern in recent years has been the increasing number of children living in poverty. In Washington, children living in poverty rose by three percentage points from 11.5 to 14.5 percent between 1979 and 1989. Concern exists that changing family structures, especially the increase in female-headed families, are related to increases in childhood poverty. Between 1980 and 1990, the number of children living in single-parent families increased from 16.0 to 19.5 percent. Nationally, over half of all children spend at least five years in a single-parent family before they are 18 years old. In 1989, 39.5 percent of poor families in Washington with children under 18 were female-headed, compared to 5.5 percent of married-couple and 16.7 percent of male-headed families. In addition to being poor, single parent families are often isolated from extended family and community support.

One of the biggest challenges facing our society in the years ahead is the increasing diversity of the families responsible for raising children. Children will be living in one- and two-parent families of married, divorced, remarried, and never-married individuals from an increasing variety of racial, ethnic and cultural backgrounds. Whatever the family structure, children will still need a loving, nurturing, stable, economically secure environment for optimal growth and development.

One of the most notable social trends impacting families has been the continued increase in the percent of women in the labor force. Between 1970 and 1990, the proportion of mothers with children under age six who were working outside their homes rose from 32 to 58 percent. Other social trends such as school consolidation and desegregation, shopping mall construction, day care centers and telephones have moved the social focus from the immediate neighborhood to the larger community. No longer do neighbors know each other, watch out for each other or serve as a support system, which leaves people isolated and alone. We live in a culture that often emphasizes violence, materialism, and self gratification, which may cause many parents to feel obligated to accelerate the maturation of their children.

According to the National Commission on Children (1991), one in four adolescents engages in social behaviors that can lead to serious long term difficulty with many more vulnerable for future problems such as dropping out of school, substance abuse, juvenile crime and violence, teenage pregnancy, teen suicide and mental illness. In both the scientific and popular press, a wide variety of

personal and social problems have been linked to inadequate parenting such as too early (teenage) parenting, child abuse, delinquency, drug problems, depression, marital conflict, crime, sexual molestation of children, school dropouts, and poor school performance.

Because of the rapid pace of change in our society and the increasing awareness of cultural and values diversity and the variety of information about parenting/child rearing, parents will certainly be challenged to do their task in a competent and successful way. Parents need and can make use of quality educational programs prepared by and available through Cooperative Extension.

GOAL:

- Parents, care-givers and professional and volunteer educators will be better able to help children become caring, competent, and healthy adults.
- Washington State University Cooperative Extension Family Living and 4-H will deliver quality family support and parent education programs. Cooperative Extension Family Living and 4-H will provide leadership and guidance across the state to enable professionals and volunteers to deliver quality family support and parent education programs and information.
- Washington State University Cooperative Extension Family Living and 4-H will encourage communities to adopt a life long, comprehensive approach to family support and parent education.

OBJECTIVES:

For building resilient and healthy families:

- Counties that have 4-H Challenge will add Family Challenge as a component.
- Community Service Learning will be incorporated as part of family advocacy activities.

For strengthening inter-generational relationships:

Statewide activities will move toward being inter-generational rather than focused solely on youth or adults.

Master programs will be reviewed with the purpose of expanding experiential learning or the non-expert model and explicitly facilitating long-term relationships.

Parents, care-givers, and volunteers will use the six critical parenting skills (self-care, understand, nurture, guide, motivate, advocate) in developmentally appropriate ways with children 0-18 (infants, toddlers, pre-schoolers, pre-adolescents, adolescents).

Fathers will increase and improve their positive involvement in children's lives.

Parents will reduce the negative impacts of separation and divorce on children.

Parents and children will know, understand and learn nonviolent conflict resolution skills and demonstrate civility and respect.

For improving effectiveness of parent educators in Washington and neighboring states

An annual parent Education Conference will result in changes of skills and knowledge of professional and volunteer parenting educators who participate.

Parent educators and community volunteers will be trained in science-based program models and specific topic areas.

KEY COMPONENTS:

Caring Families: Parenting Choices
Children Cope With Divorce
The Parenting Conference
Family Challenge

INTERNAL AND EXTERNAL LINKAGES:**Internal:**

Department of Human Development
4-H and Family Living Faculty and Staff
Neighboring states' extension programs
PIPS State Strengthening Grant programs

External:

WA Council for Prevention of Child Abuse and Neglect
Dept. of Social and Health Services -
 Division of Alcohol and Substance Abuse
 Division of Aging and Adult Services
WA State Community Colleges, Organization for Parent Education Programs
Yakima Valley Memorial Hospital
Family Policy and Community Network
WA State Dept of Community, Trade and Economic Development: Early Childhood Assistance Program
Education Service Districts and local school districts
Head Start
Confederated Tribes of the Colville Reservation
Local court systems

AUDIENCE:

Parent education professionals, parents, care-givers of children 0-18 years, Extension faculty and program assistants, and community volunteers.

Specific approaches to reach protected classes

- Work with and develop networks with relevant community leaders to determine needs and programs.
- Utilize appropriate ethnic and minority resource persons in training volunteers and program delivery.
- Recommend local faculty seek outside funding for program development and implementation.
- Recruit local volunteers for work with target audiences, e.g., Hispanic and Asians.
- Network/collaborate with other agencies and groups in order to more effectively reach targeted audiences, share resources, provide training, and maximize impacts.

EVALUATION:

Information will be gathered at programs or training events on the following:

- number of participants
- gender (males and females)
- parent status, i.e., dual parents, single parent(s), prospective parent.
- income level -- middle, low
- race and/or ethnicity -- White, African American, Hispanic, Asian, Native American.

- size of family or household.
- volunteer involvement number trained, and their outreach)
- agency collaborations (name and type of agency)

Evaluation of Caring Families: Parenting Choices:

Program participants will be asked to think about what they have learned in the classes that made a change in their life or the lives of those in their family. (sample evaluation available upon request)

Evaluation of "Children Cope With Divorce" program.

(sample evaluation available upon request)

The Parenting Conference will be evaluated using an on -site, end-of-conference evaluation form and a 6- month follow -up survey, mailed to all attendees or a sample thereof.

In evaluating educational activities in this program area, we will collect data and submit reports for these **specific indicators:**

Output Indicators:

- I. Number of program participants who increased their knowledge of parenting skills such as the following:
 - appropriate care practices for infants, toddlers, or preschoolers
 - how to create and maintain a safe home environment
 - appropriate guidance techniques
 - increased strategies for guidance
 - how children grow and develop
 - parent-child relationship skills
 - nutritional guidelines
 - how to locate and use community support systems
2. Number of program participants who plan to make improvements in their parenting practices.

Outcome Indicators:

1. Number of professional and volunteer educators who made improvements in their program in the following areas:
 - used new materials/techniques in existing programs
 - increased ability to work with diverse audiences
 - increased confidence in ability or skills.
2. Number of participants who made changes in their personal lives in the following areas:
 - increased level of confidence and satisfaction in own parenting
 - improved communication with own children
 - improved effectiveness of guidance and discipline methods.

PROGRAM DURATION: Long term.

II.

WORKFORCE PREPARATION

ISSUE:

A declining pool of qualified workers and a reduction in the overall youth population is forcing employers to draw employees from a troubled portion of the workforce pool for the future. It is therefore incumbent upon the public and private sectors of society to design and implement programs that train and/or educate youth in the skills that lead to productive and useful lives.

Negative economic conditions and single parent households have led to a loss of parental guidance for half of the nation's youth. In addition, a mood of fatalism prevails which is rooted in the poverty experience, no health care, lack of positive role models, school drop-out and failure, and the inability to find employment. Youth, therefore need more opportunities, beginning at an early age, to develop attitudes and values that will in fact, prepare them for a positive and contributing adult life.

Workforce preparation for 21st Century Youth is a national initiative embraced by Youth Development and Family Living professionals on a national and state level and can best be described as a program designed to positively develop the potential in every youth so that each youth is prepared to enter the workforce and be a success in his or her chosen profession, regardless of ethnicity, income or social status. The underlying aim is to strengthen families, interrupt the cycle of poverty, and transition youth from welfare to work.

The Workforce Preparation Initiative covers a broad area and begins as early as pre-school (experiential work with individual youth) through adult leadership (identifying new skills and abilities that have been developed through college and work). A Workforce Preparation model has been developed that is expansive and inclusive, ranging from under five years to over 21 years of age (Workforce Preparation Program Development Guide). The SCANS report that resulted from the Secretary of Labor's commission in 1991 undergirds the Workforce Preparation Initiative. Five competencies resulted from that report: youth need to master 1) **managing resources**, 2) **working with others**, 3) **using information**, 4) **understanding systems** and 5) **using technology**. The report also identified three foundation skills needed for solid job performance; 1) **basic literacy**, 2) **thinking qualities**, and 3) **personal qualities**.

Welfare Reform has impacted almost every community in the State of Washington. Each community is faced with urgency and expectations regarding the reform because state and local laws have placed time limits and constraints on benefits. Welfare recipients must enter the labor market with neither retention, experience, nor preparation skills. The basic life skills, and development of attitudes and values that frame Workforce Preparation are desperately needed by youth and families and can positively impact these audiences.

According to "Preparing Youth For Employable Futures" the role of the Extension System is to prepare youth at any early age for the world of employment by mobilizing the community staffing and expertise of the Nation's largest non-formal education system. Currently, national plans for investments in the area of school-to-work transition are centered around apprenticeships for older adolescents. Career development also operates within the sphere of family and should not begin with what to do after high school (job, higher education, vocational/technical education). The stages of career development (awareness, exploration, experience, employment) should not be bound by age or developmental stage.

The Workforce Preparation Model augments the Extension philosophy and practice. Cooperative Extension has a successful history of teaching youth and recruiting adults through community volunteers in non-formal educational settings. The skills, behaviors and knowledge that undergird such concepts as quality management can be translated and delivered to youth through experience-based activities (Workforce Preparation: A Model of Youth Experiences). Not only do youth and their families begin to learn the new requirements of working, but the adult coaches and mentors will learn to apply quality management skills to their own work.

The State of Washington's Children Report (Winter 1999) reports the following:

Washington's economy has shown strong economic growth, with employment, wages and incomes reaching new highs. Fewer children are living in deep poverty and more have access to health insurance. However, we must take note of some serious gaps and disparities, and we should be preparing for the future when economic growth is likely to slow.

- One in 3 Washington children live in families with less than minimum working family budgets. Almost two thirds of Hispanic children, and half of African American and Native American children are in families with inadequate income.
- The disparity in income between the comfortable and the poor continues to widen. The wealthiest one-fifth of families have nearly half of the total income while the bottom fifth have less than 5%.
- Most adults (nearly 90%) in the lowest income group work at least 20 hours a week; 26% of those working part time would prefer full-time work.
- Fewer than sixty percent of sixth to twelfth graders say that there are many adults in their neighborhoods with whom they can talk about something important, despite lots of organized sports and other activities.
- A large proportion of students report depressed thoughts and feelings. While such feelings seem to peak in eighth grade the level is high in all grades. Eighth graders living with only one parent are almost twice as likely to have high depression scores as eighth graders living with both parents.
- After six years of education reform in Washington, there are promising signs of improvement but also evidence that we face a long, uphill climb. There has been a substantial 8 - 10 point increase in the percentage of fourth grade students meeting math, reading and listening standards. But fewer than 1 in 3 fourth graders and only 1 in 5 seventh graders meet the math standard. Only 1 in 3 students meets the writing standard and fourth grade writing scores have declined from 1997. Little more than half of fourth graders and a third of seventh graders meet reading standards.
- We are failing to meet the needs of minority children. Only 1 in 20 African American, Hispanic and Native American seventh graders meets math standards.
- Children start school eager to learn but are progressively turned off by their experiences. Only 30 - 40% of high school students say school is meaningful, important or often enjoyable.
- By the year 2000, the teen population will have grown - compared with 1990 - by more than 25 percent. This will mean greater demand on our schools and colleges, greater demand for community service, and unless things change, a greater demand on the courts and jails of this state.
- Not only will there be more children, they are likely to be more diverse, requiring specialized medical, translation, and social services. The percentage of minority students in the state has doubled since 1980.
- Although the teen birth rate and the teen pregnancy rate declined between 1995 and 1997, it is likely that the proportion of children growing up without a father will continue to increase throughout the next decade. With the number of births to unmarried mothers and the number of divorces still increasing, we can expect that a growing share of Washington's children will never live together with both parents.

Many youth have not been exposed to family members or mentors who hold a steady, good paying job. Many families are unstable and are experiencing multiple issues: child abuse and neglect, financial crises, low paying jobs, limited education and spouse abuse.

Workforce preparation programs must include skills that will help youth be successful in life and on the job.

Other workforce related studies and organizations have proposed a variety of similar recommendations, to wit: A major recommendation that came from a series of forums of The Washington State Rural Development Council is that welfare recipients have the opportunity to learn basic life skills prior to employment. This list also included: literacy, budgeting, appropriate work behavior and maintaining a home (WSRDC, 1997). It is projected, in order for future workers to remain successful in the workforce and to be a contributing member of society, they will need a wide-range of skills including: planning, goal setting, computer skills, access to the Internet, communication skills, money management, workforce mentors, balancing work and family, basic life skills, and interpersonal development.

Many of the competencies included in the SCANS report are identical to this body's findings. The "Role of Extension Education in Welfare Reform" matrix (see Strengthening Life Skills program) summarizes opportunities and audiences for educational programs in this arena. Life skills education is highlighted in the pre and post-employment columns for audiences including families, service providers and employers. The Strengthening Life Skills and Workforce Preparation state-wide workgroups should be working closely together to share resources and information.

The Workforce Preparation initiative includes paid employment and unpaid community opportunities which strengthen the "reaching back, giving back" component of our society. Youth will learn the importance of volunteering and how it prepares one for the workforce, while simultaneously helping others. Many youth are from families with histories of mental illness and learning disabilities. About 36 percent of welfare recipients have some kind of learning disability (Washington State Institute for Public Policy, 1995). Many youth are from immigrant families with very limited English proficiency.

Workforce preparation curricula will have to include education-experience-evaluation. Once youth receive the education, they will have to work with the community and employers to develop their long-term capabilities. The curricula must also include many of the developmental assets for youth identified by the Search Institute. These include: social competencies (planning and decision-making, interpersonal skills, cultural competence, resistance skills and peaceful conflict resolution), as well as skills needed for independent living such as maintaining a household and career development.

John L. McKnight in "Building Communities From The Inside Out" states it this way, "The direct participation of young people in the community can be facilitated by associations and community organizations that are on the alert for specific ways to utilize the unique capabilities of the young." One example that demonstrates 'walking the talk' cited in his book, "A community center employs youth to do research on community organizations and institutions. Youth interview leaders or administrators at churches, schools, hospitals, businesses, health care centers and other organizations. At the end of the summer, the youth host a community forum to inform people about the resources in their community."

GOAL:

Washington youth will be educated in all areas of workforce preparation (**education**), will work in the community in a variety of capacities- educators, business, organizations and parents working together (**experience**) and will carefully review their experiences to make adjustments so that they can be successful in the workplace.

OBJECTIVES:

- I. Youth will learn fundamental skills (literacy, thinking and personal qualities).
- II. Youth will be prepared to engage in apprenticeships through a series of non-formal education experiences.
- III. Youth will acquire management skills.
- IV. Youth and adults will learn networking skills.
- V. Youth and adults will learn to understand and use technological skills.
- VI. Youth and adults will learn to manage resources.

- VII. Youth and adults will learn to think critically.
- VIII. Youth and adults will develop interaction skills.

KEY COMPONENTS:

Events such as **College Knowledge for the Mind** will continue to reach young people of color and will expand to include workforce preparation.

Basic Life Skills curriculum will reach traditionally underserved audiences using volunteers.

The Basic Life Skills curriculum will be **translated into Spanish**.

LINKAGES:

Internal

- County Extension offices
- Other disciplines within Extension
- Research units
- WSU Colleges, such as Education, Sciences and Athletics
- WSU Service Units (Multicultural Student Services, WSU Learning Centers, Extended Degree Program, etc.)

External

- Federal, state, and local government agencies
- Local partnerships and coalitions
- Public School systems
- Businesses
- Land Grant System including the 1890 and 1994 institutions
- Other Higher Education Institutions

AUDIENCE:

- Local groups, targeted through existing partnerships and coalitions
- Government organizations
- Public organizations
- Private organizations
- Ensure that adult and youth organizations are included

Specific Approaches to Reach Protected Groups

Make concerted efforts to reach communities of all ethnic and racial groups and other nontraditional audiences.

Work in partnership with agencies and organizations that do offer access to these groups. Link with other university efforts to reach racial and ethnic minority youth.

Solicit input from communities to locate and serve underserved audiences and request current program recipients to assist in identifying multi-racial, ethnic and culturally diverse audiences.

EVALUATION:

In evaluating educational activities in this program area, we will use these measurement tools such as the following: Quantitative and qualitative (pre and post tests), job placement profiles and questionnaires, follow-up interviews, videotape sessions, family case studies, focus groups, employer surveys. We will collect data and submit reports for these **specific indicators**:

- I. Number of program participants learning
 - to effectively use technology
 - to manage their resources
 - critical thinking skills
 - job, interpersonal relationship, and social skills.

- II. Number of program participants participating in job training or finding jobs.

PROGRAM DURATION - Intermediate Term.

III.

STRENGTHENING LIFE SKILLS

ISSUE:

Life skills can be defined as strengths that help individuals and families succeed in leading productive and satisfying lives. The scope of life skills education is broad, ranging from general skills like decision making and conflict management to more specific abilities such as managing financial resources and preparing nutritious meals. The audience for life skills education is also broad, encompassing both youth and families.

In many communities, welfare reform has created a new sense of urgency for educating low income families in basic life skills. Changes in federal and state law set new time limits on welfare benefits and require recipients to be more involved in employment activities. To be successful under the new system, families will need to strengthen a wide repertoire of life skills that include planning, goal-setting, and managing both work and family demands.

The Washington State Rural Development Council held a series of forums on welfare reform in fall 1996. Among the major recommendations for state action made by forum participants was the suggestion that welfare recipients have the opportunity to learn basic life skills prior to employment. Their list of skills included: literacy; budgeting; appropriate work behavior; and maintaining a home (WSRDC, 1997). A matrix titled "Role of Extension Education in Welfare Reform," Figure 1., (Rupured, 1997), summarizes opportunities and audiences for educational programs in this arena. Life skills education is highlighted in the pre and post-employment columns for audiences including families, service providers, and employers.

Through the 4-H Youth Development program, up to 35 life skills have been identified that are vital to positive youth development (Hendricks). Youth development encompasses the processes of mental, physical and social growth during a young person's life. The Search Institute, a private social research agency, has also developed a list of forty developmental assets which they view as the essential building blocks of adolescent development. Included in both lists are life skills that include social competencies (planning and decision-making, interpersonal skills, cultural competence, resistance skills, and peaceful conflict resolution), as well as skills needed for independent living such as maintaining a household and career development. Life skills education provides an opportunity for youth service providers to intentionally strengthen the assets of young people in the community.

Life skills curricula that emphasize experience-based approaches to learning are particularly appropriate for both youth and family audiences. About 41 percent of women receiving AFDC in Washington have neither a high school diploma or GED, and about 20 percent are at the lowest literacy level. In addition, 36 percent of AFDC recipients have some kind of learning disability (Washington State Institute for Public Policy, 1995). Immigrant families are a group severely impacted by welfare reform.

Figure 1.

Role of Extension Education in Welfare Reform

	Individual Development: Pre-Employment		Individual Development: Post-Employment		Community Development	
Audience:	Unemployed Individuals	Service Providers	Newly Employed Individuals	Entry-Level Employers	Service Providers	Policy Makers
Educational Methods:	Professional development programs, collaborating with providers	Train-the-trainer programs, collaborative arrangements for direct teaching	Work-site programs, self and home study programs, one-on-one advising	Programs for local chambers of commerce, fact sheets, workshops	Community forums, coalitions, inter-agency councils	Position papers, research summaries
Content:	Basic life skills education focused on individual development, building strong families, maximizing family resources, job readiness and citizenship		Balancing work and family, maximizing transitional assistance, maximizing employee benefits and life skills education	Understanding transitional assistance programs, info/referral systems for employees, family-friendly work environments	Strengths-based assessment, building community capacity, collaboration, strengthening support networks	Research-based information related to various aspects of welfare reform
Strengths:	<ul style="list-style-type: none"> • Grass-roots delivery system • Flexibility • Expertise 	<ul style="list-style-type: none"> • Reputation for high-quality programs • Unbiased, research-based information • Expertise 	<ul style="list-style-type: none"> • Existing relationships with clientele • Availability of education resources • Expertise 	<ul style="list-style-type: none"> • Relationship with providers • Relationship with local chambers of commerce • Local presence 	<ul style="list-style-type: none"> • Process skills • Relationship with players • Knowledge of the local community 	<ul style="list-style-type: none"> • Unbiased, research-based information • Expertise • Resources of the land-grant system
Challenges:	<ul style="list-style-type: none"> • Reaching significant portions of the target audience • Motivating behavior changes • Determining greatest areas of need 	<ul style="list-style-type: none"> • Evaluation, particularly with train-the-trainer programs • High turnover of provider staff • Availability of appropriate curricula 	<ul style="list-style-type: none"> • Reaching the audience • Keeping up with changes in benefit programs • Devising new methods for providing information 	<ul style="list-style-type: none"> • Identifying employers • Convincing employers to cooperate with Extension • Documenting impacts 	<ul style="list-style-type: none"> • Turf issues • Getting the appropriate players to the table—especially in large urban areas 	<ul style="list-style-type: none"> • Walking the line between education and advocacy • Dealing with politically sensitive issues

Developed By Michael Rupured, Family Financial Specialist, Kentucky State University Cooperative Extension Program

Experiential learning is also emphasized in teaching life skills to youth. Life skills are integral to youth programming. As Hendricks (1996) explains, "The goal of youth programming is to provide developmentally appropriate opportunities for young people to experience life skills, to practice them until they are learned, and to be able to use them ... throughout a lifetime."

Cooperative Extension has a rich history of teaching life skills experientially. The organization is well positioned to directly deliver life skills programming and collaborate with other youth and family serving agencies in this work.

GOAL:

Washington youth and families will develop and increase their life skills to lead productive and satisfying lives, and to make contributions to their communities.

OBJECTIVES:

Communities will identify priority audiences for life skills training based on criteria defined by community members.

Communities will identify, through strengths and needs assessments, the specific life skills most vital to the development of productive and caring citizens.

Cooperative Extension will assist in providing the resources needed (e.g., curricula, training, collaboration) to implement life skills development programming based on the uniqueness of each community.

KEY COMPONENTS:

4-H Program
Basic Life Skills Program
Partners in Promoting Strengths Project
Challenge and Family Challenge
Family Focus

LINKAGES:

Internal:

Extension Family Living faculty, staff and volunteers; 4H youth development faculty, staff and volunteers; Partners in Promoting Strengths project staff; Challenge and Family Challenge project staff and volunteers; Family Nights Out project staff; Web Wizards project staff and volunteers; Life Skills Advisor project staff and volunteers.

External:

Head Start and other early childhood education and child care programs; local school districts and individual schools; Work First providers; family support centers; WSU Learning Centers; public housing sites; public health and social service agencies; youth development organizations; churches.

AUDIENCE:

Partners for program planning and implementation

Staff of youth and family agencies, for example: family support centers, after school programs,

Salvation Army, juvenile justice, homeless shelters, corrections personnel, Boys and Girls Clubs
Community volunteers
School staff
Congregations
Employers and employment-related service providers (job training programmers, Chambers of Commerce)

Participants in Life Skills Programs

Families in transition from welfare
Families with limited resources
4-H youth and adults
Youth and families identified by community as priority audience

Specific steps to reach protected classes

1. Recruiting and training volunteers from protected classes.
2. Involving diverse members of the community in program development, recruitment, and advisory structures.
3. Collaboration with agencies serving members of protected classes
4. Producing and utilizing culturally sensitive materials.

EVALUATION:

Measurement tools are currently under development to evaluate life skills education effectiveness. Both quantitative (e.g., pre-post tests, surveys) and qualitative (e.g., focus groups, case studies, videotaped interactions) methods will be used to collect the data, with an emphasis on developing appropriate tools for low literacy and limited English-speaking participants.

We will collect data and submit reports for these **specific indicators**:

Output Indicators

1. Number of adults and youth participating in Extension programs to learn ways to become more self-responsible.
2. Number of adults and youth participating in Extension programs to learn leadership skills.
3. Number of adults and youth participating in Extension programs to learn how to make healthy lifestyle choices.
4. Number of adults and youth participating in Extension programs to learn marketable skills.
5. Number of adults and youth participating in Extension programs to learn how to use resources wisely.
6. Number of adults and youth participating in Extension programs to learn communication skills.
7. Number of adults and youth participating in Extension programs to learn decision-making skills.

Outcome indicators

1. Adults and youth participating in life skills education programs will report or demonstrate higher levels of self-responsibility.
2. Adults and youth participating in life skills education programs will increase their leadership skills.
3. Adults and youth participating in life skills education programs will make healthier lifestyle choices.
4. Adults and youth participating in life skills education programs will increase their marketable skills.

5. Adults and youth participating in life skills programs will use resources more wisely.
6. Adults and youth participating in life skills programs will improve their communication skills.
7. Adults and youth participating in life skills programs will improve their decision -making skills.

PROGRAMDURATION: Long Term

IV.

BUILDING STRONG COMMUNITIES

ISSUE:

Community building strategies in America have multiple roots with some critical examples including the civil rights movement, cooperative business practices in agriculture, and the rise of community based strategies for crime reduction. These community capacity building activities are based in the principles of participatory democracy and personal responsibility. Because of this long tradition, the 'technology' of community building is well - developed and includes the following areas of effort: community organizing and mobilization, consensus building, coalition development and maintenance, conflict resolution, group leadership, effective communication skills, and evaluation skills.

As an approach to problem solving, community building strategies offer a legitimate compliment to professional and institutional efforts to meet social needs. Institutional programs tend to be problem specific in mission and to focus on problem reduction as the principal outcome in measuring success. Because so many social problems are not solved but rather managed, community building proponents acknowledge the need for tangible problem reduction but place equal emphasis on the resources that are created through the effort to solve problems. These resources are first and foremost the skills and leadership of residents in the community of interest.

Secondarily, the building of the relationships, material resources, and the social means (formal community groups and informal networks) for continued problem solving are also significant products. In the community building view, building the capacity of the community residents as effective problem solvers is a major independent outcome in its own right.

Because community professionals and institutions are themselves community assets, a community building perspective involves finding a balance between citizen and institutional leadership. Community building can represent a new alliance between citizens and professional organizations. This new alliance builds on two central premises (1) that the communities affected by problems need to directly guide program design and management, and (2) that programs need to enhance the community's existing resources as broadly as possible.

Within the content areas of Extension, community building has always been central to the Cooperative Extension mission. This initiative will build on this tradition by making community building a content area in its own right. First, by concentrating on the specific skills of community building we can create resources which are supportive of existing cooperative extension content areas. Second, by systematically building the skills of citizens to lead in community building, we can help expand the core of community leadership capable of addressing a range of new concerns. Programs such as Family Focus already provide models for the role of extension in such local Washington efforts.

While a new community building emphasis could support existing Extension programs with materials and training opportunities for volunteers, building efforts necessarily will move Extension into new areas of effort in alliance with local community leaders. Because development grows from locally defined needs and strengths, every community needs to discover its own priorities and this requires that extension staff flexibly adjust to these local areas of concern. Extension staff could play a significant and continuing role by providing leadership in the broad areas of capacity building, asset identification, needs assessment,

community mobilization, leadership training, and group building.

GOAL:

1. To develop the specific skills of community building and create resources supportive of Cooperative Extension content areas.
2. To expand the core of community leadership capable of addressing community concerns.
3. To integrate community building skills and approaches in extension programming with youth and families.

OBJECTIVES:

1. Define community needs and strengths and organize around priority areas at the local level.
2. Support the definition of clear action plans which produce demonstrable community change.

KEY COMPONENTS:

Major program efforts include the Partners in Promoting Strengths Project, Family Focus and Community Policing. See also the attached table.

LINKAGES:

See attached table.

AUDIENCE:

Local community residents (youths and adults) and professionals concerned with issues having an impact youth and families. Specific participants would be defined by locality and the specific issue.

Specific steps to reach protected classes

1. Recruitment and training of volunteers from protected classes.
2. Involvement of recognized community leaders in community program definition and in recruitment.
3. Assurance of culturally diverse content in all materials.

EVALUATION:

In evaluating educational activities in this program area, we will collect data and submit reports for these **specific indicators:**

1. The number of communities statewide engaged in extension -assisted building efforts.
2. The number of citizens involved in local community building efforts.
3. An increased understanding of local issues and willingness of citizens to participate in community building efforts.
4. The number citizens involved in non -formal training in community building training.

Extension programming with youth and families will integrate and increase community building skills and approaches in educational activities. Measurable results of citizen involvement in community building

will be defined to match the specific project.

PROGRAMDURATION: Long Term

LINKAGES

Name of Partner	Organization Purpose	Nature of Project or Partnership
Forum Land Use, Transportation, Economic Dev.	Provide participatory education on public issue	Agent sits on the board, co-plans programs
Economic Development Assoc. of Skagit County	Economic development, job retention	On an as needed basis, most recently on Y2K
Whitman Co. Business Development Assn.	Business Development in all of Whitman County	Partner in development of a Learning Center
Bureau of Justice: Office Comm. Oriented Policing	Funding agency for WRICOPS	Community policing training & leadership development
WA State Association of County	Local government association	Local government training
WA Assoc. of County Officials, County	State Association of County clerks	Training & strategic planning
WA Association of Sheriffs & Police Chiefs	State association	Training, consultation, project partner
Community Health & Safety Network	Grassroots coalition to serve community	Membership on Network Board
Greater Pasco Chamber of Commerce	Promotion of Pasco area	Farm Fair project for 5th grade students
Asotin County elected officials/department heads	Develop and implement county policy	Unify county business, policy strategies
Community Based Planning: Inter-Agency Task Force	Initiate Community-wide youth advocacy	Social services, education, law enforcement
Lewis County Social Services	To provide funding/oversight for abuse programs	We receive funding & support for Family Focus
Lewis County Community Network	Provide funding/leadership youth programs	Funding our Spanish Family Focus and Family Night
Sustainable Agriculture Research & Education	Research and Education	Granting agency for "Building Community Support"
Chelan-Douglas Together! For Drug Free Youth	Community Mobilization	I organized this entity 12 years ago and set it up
NW Regional Facilitators	Facilitate Non-Profit Social Service Entities	Resilient Communities Satellite Project
Neighborhood Leadership Institute	Train Grassroots Leaders	Neighborhood Leadership Institute
Y2K City-County Task Force	Education and Contingency Planning, Risk Assess	Multiple partner organization
Pend Oreille County Commissioners	Administer county government	Funding source
West 1st Project	Urban Development	Community Development in Urban Setting
West Valley School District	Education	Community Building for Healthy Youth and

		Families
East Valley School District	Public School District	Asset Focus on Community Building for Youth/Family
Tacoma Urban League	Equity, Education, Employment	4-H works with their Alternative High School
Yakima Valley Community College	Degree programs, technical/vocational education	Partnership for Rural Improvement Program
Yakima Co.Comm. Public Health & Safety Network	To engage citizens with agencies	Collaborative community development programming
Community Resource Consortium	To develop an Electronic Database and Directory	A collaborative project
Lincoln County Community Mobilization	Educational & Funding source for Drug-Free Programs	Collaborate on educational programs
Adams County Community Network	Identify and fund grass-root county need projects	Network funds our Adams County 4-H Outreach Youth
Far West Fertilizer & Agrichemical Assoc.	Addresses issues of importance to agricultural	Cooperation on education and technical issues
United Farmworkers of America	Promote farm labor rights and working conditions	Citizenship Education

V.

CHARACTER/ETHICS EDUCATION

ISSUE:

Ethics refers to standards of conduct, standards that indicate how one *should* behave based on moral duties and virtues, which themselves are derived from principles of right and wrong. Ethics is about character and courage and how we meet the challenge when doing the right thing will cost more than we want to pay. Character building is putting ethics into action.

Dr. Michael Schulman and Eva Mekler, in Bringing Up a Moral Child (1985) suggest that the need for character education is greater than ever and that even the most well-meaning parents need help: "Concerns about moral training of children have taken on a new sense of urgency. The traditional sources of moral guidance are not as influential as they once were. Yet young people today are confronted by serious moral issues, often at a younger age than ever before. In today's world, moral training has largely become the responsibility of parents alone. But many parents are uncertain how to go about it." According to education scholar Jon Moline, "People do not naturally or spontaneously grow up to be morally excellent or practically wise. They become so, if at all, only as a result of lifelong personal and community effort."

The ultimate goal of character education is the creation of a citizenry that acts ethically. Ethical conduct and decision making involves a combination of three attitudes and skills: ethical commitment, ethical consciousness and ethical competency -- all of which can be taught or enhanced by parents, youth groups, religious organizations and schools. The goal is to teach kids not what to think, but how to make good judgements, says Jay Mulkey, president of the Character Education Institute.

The Aspen Declaration on Character Education concludes that because the character and conduct of our youth reflect the character and conduct of society, "Every adult has the responsibility to teach and model the core ethical values and every social institution has the responsibility to promote the development of good character." and "Although the responsibility for developing the character of the young is, first and foremost, an obligation of families; it is also an important obligation of faith communities, schools, youth, and other human service organizations." Character development is best achieved when these groups work in concert in entire communities.

Should schools be teaching character development? The research organization Public Agenda has found that large majorities of U.S. parents want schools to teach values that encourage harmony and civility while avoiding social critiques that foster discord. For example, 95 percent of all parents say schools should teach "respect for others regardless of their racial or ethnic background." A 1993 Phi Delta Kappa study showed that 90 percent or more of Americans support public schools teaching values such as honesty and acceptance of cultural differences.

In order to satisfy the 4-H goal of developing youth to their greatest potential, we cannot overlook the importance of thinking about ethics, talking about ethics, and more importantly modeling ethical behavior. Youth leaders are in an ideal position to help develop and nurture ethical character in young people.

GOAL:

Participants in character/ethics education programming will develop their ethical decision-making and leadership skills, become more responsible for their behavior and more accepting of differences.

Community members will develop and model positive character traits.

OBJECTIVES:

Counties that implement character education will report fewer instances of unethical behavior among youth, adults, parents, families, and volunteers in their respective program areas.

Youth, parents, volunteers, and adults will learn and practice ethical decision making based on the consensus ethical values of trustworthiness, respect, responsibility, fairness, caring and good citizenship. (6 Pillars of Character as agreed upon by a diverse group of educators, youth leaders and ethicist in 1992 in Aspen, Colorado)

KEY COMPONENTS:

Cooperative Extension is one of the human service organizations that can provide character education based on the consensus ethical values of trustworthiness, respect, responsibility, fairness, caring and good citizenship.

Extension professionals and volunteers can model ethical behavior in word and action.

Parents and teens can be guided in how to model and teach character building and ethical decision making to younger youth.

Extension professionals have the skills to mobilize entire communities to join in modeling and teaching character education and ethical decision making to youth and adults.

AUDIENCE:

Audiences will include youth, adults, families, and community partners.

Specific approaches to reach protected classes

- I. Network/collaborate with other agencies and groups in order to more effectively reach targeted audiences, share resources, provide training, and maximize impacts.
- II Work with and develop networks with relevant community leaders to determine needs and programs.
- II Recruit local volunteers for work with target audiences, e.g., Hispanic and Southeast Asians.
- II Utilize appropriate ethnic and minority resource persons in training volunteers and program delivery.
- II County faculty seek outside funding for program development and implementation.

EVALUATION:

In evaluating educational activities in this program area, we are currently working on an evaluation system for life skills programs that will be used to collect data and submit reports for these **specific indicators:**

Output Indicators:

1. Number of adults and youth participating in Extension programs to learn ethical decision -making skills.
2. Number of adults and youth participating in Extension programs to learn leadership skills.
3. Number of adults and youth participating in Extension programs to learn ways to become more self -responsible.
4. Number of adults and youth participating in Extension programs to learn ways to become more

accepting of differences.

Outcome Indicators:

1. % of adults and youth participating in character/ethic education programming will increase their ethical decision-making.
2. % of adults and youth participating in character/ethics education programming will increase their leadership skills.
3. % of adults and youth participating in character/ethics education programming will become more self-responsible.
4. % of adults and youth participating in character/ethics education programming will be more accepting of differences.

Specific references, consultants and measurement tools

Josephson Institute, "Ethics, Values, Attitudes and Behavior in American Schools" (1992)

Schulman, M. and E. Mekler, Bringing Up a Moral Child (1985)

Assets Magazine, Search Institute, Spring 1997

Consult "Evaluating for Accountability -- A Practical Guide for the Inexperienced Evaluator" by Barbara J. Sawyer for useful ideas.

PROGRAM DURATION: Intermediate term.

VI.

LEADERSHIP FOR PUBLIC DECISION-MAKING

ISSUE:

Public officials and community leaders are facing escalating responsibilities and increasingly sophisticated problems. Devolution has brought programs from the federal level to state and local control (welfare reform) and from the federal level to the private sector (FAIR). Local officials and community organization leaders are continuing to take steps to become more efficient in their operations, to think strategically, to seek creative solutions to problems, and to manage their resources more effectively. Citizens with diverse backgrounds and interests have increased the demands for services as well as increased conflict over what public and organizational decisions are made and how they are made. The number of special interest groups has increased and they are more active than in the past.

Local government education is important for two reasons:

1. Local government is the level at which problems of today and tomorrow must be solved. The responsibility for dealing with these increasingly sophisticated problems has fallen upon local elected and appointed officials, many of whom are volunteers, often with limited training, and generally having limited time, skills, and resources to deal with changing issues.
2. Elected officials, appointed advisory board members, and professional staff contribute informed judgment and expertise to the definition and implementation of community goals and to the public - private partnership on which community vitality depends.

Individuals are demanding participation in community decision -making. They need the same skills and information as the defined community leaders and elected officials if they are to participate effectively in a democratic community.

Community leaders of public institutions, organizations, businesses, and volunteer associations are faced with complex organizational problems arising from economic, social, and political change. Many of these concerns stem from public issues and require group decision -making for their resolution. Community organizations and local governments are mobilizing volunteer forces to deal more effectively with issues. The success of these community and volunteer forces are dependent upon how well they are led and understand the issues.

Leaders of organizations (public, private, non -profit, and volunteer) frequently have limited training, time, and skills for meeting the decision -making challenges they face. The situation is often exacerbated because group members are frequently in conflict. Organizations, associations, as well as local governments may be unfamiliar with problem solving, conflict resolution, planning, and management techniques. Organizations often appear unproductive because of poorly defined member responsibilities, run away meetings, and inadequate planning or facilitation to assure constructive participation in decision -making. These and other leadership problems can have significant detrimental effects on the productive accomplishments of volunteer associations, public or private organizations, institutions, businesses, and industries.

As community volunteer organizations pick up the slack on public -funded services, their need for leadership and decision-making skills increases. Partnerships become crucial vehicles for effective social and economic change. Extension can become a valued link between higher education and local decision -

makers. Training public officials, state government agencies, and community organization leaders in administrative and leadership skills is a continuing program priority for WSU Cooperative Extension.

State agencies also struggle with the number of complex responsibilities entrusted to them. It has become increasingly important to attract, train, and retain a skilled workforce. State agencies need assistance with assessing training needs, determining training focus, and evaluating effectiveness of existing training.

GOAL:

- Increase educational support for local elected and appointed officials as they cope with their expanding responsibilities in a rapidly changing environment.
- Assist state agencies, community organizations, commodity and business associations, and non-profit groups with skill development thus expanding the pool of quality leaders addressing future issues.
- Encourage community organizational leaders to look to WSU Cooperative Extension for leadership education and public issues education.
- Increase educational activities that address emerging public issues e.g., telecommunications policy and transition to an information society.
- Assist local governments and communities work through problems, rebuild and develop effective working relationships, develop durable agreements for resolving complex public problems, and work together for a sustainable future.

OBJECTIVES:

1. Local government officials will improve their leadership, administrative, and decision-making skills for dealing with complex issues and coping with change.
2. Public officials and state agency personnel will improve their ability to collaborate with colleagues within and across agency lines, in the private sector, and with the general public. Public officials will improve their ability to form and participate in partnerships designed to address social, and economic problems within the community.
3. Statewide interest groups will improve their planning, organizing, analyzing, evaluating, and decision-making processes.
4. Members and leaders of community and voluntary organizations will improve their skills in initiating, carrying out, and evaluating group/organizational goals through representative and participation methods.
5. Business, industry, and commodity organizations will effectively identify issues and seek solutions to problems by organizing and implementing problem solving strategies for responding to these concerns and evaluating outcomes.
6. Low-income, minority, and multi-cultural groups will become more informed and actively in public decision-making and group process.
7. Government officials and citizens alike will improve their understanding of complex public issues that

affect them and their communities.

KEY COMPONENTS:

Training for faculty will include programs on managing change, growth management issues, and group development, including team building, goal setting, decision -making, facilitation, and dispute resolution. Additional topic areas include conflict management, social capital and community development, community - oriented governance and problem solving, and the use of research -based information in community -based decision-making.

Local governments can receive assistance through the **Program for Local Government Education (PLGE)**, to build further capacity in local government, strengthen the support capability of the local government associations, and improve the ability of Washington State University to respond to the needs of local government. Program objectives are to be met by: (1) providing training opportunities for local officials in the areas of leadership strategies, administration, and decision-making skills for dealing with complex issues and coping with change and conflict; and (2) issue analysis and applied research concerning emerging social problems faced by local government.

State agencies can receive assistance through the **Division of Governmental Studies and Services (DGSS) and the Department of Political Science**. The DGSS objectives are met through a) applied research; b) training of state agency personnel; and c) change management and organizational intervention.

Local and state law enforcement can receive help through the **Washington State Institute for Community Oriented Policing or The Western Regional Institute for Community Oriented Public Safety**. This consortium sponsors training, technical assistance and organization development in the areas of community policing and community governance.

The **Family Community Leadership (FCL)** program is delivered from four regional locations. This program trains key community leaders and faculty on materials including: basic leadership skills, conflict management, time-management, problem-solving, working with groups, issue analysis, communication and listening, personal power and group power. The three major goals of FCL are to: 1) broaden participants' understanding of public issues and methods for resolution; 2) increase the participation by women and men in resolving public issues affecting the quality of family life; and 3) strengthen and further develop educational support systems for public leaders and groups involved in the decision -making process.

The **Partnership for Rural Improvement (PRI)** brings together a consortium of institutions with a central goal of improving the quality of rural life. Toward this end, PRI has promoted more effective cooperation and communication among rural service providers and between service providers and users. PRI convenes groups for community development; conducts leadership development training needs assessments; and publishes technical assistance publications. Partner institutions include: Skagit Valley College, Spokane Falls Community College, Yakima Valley Community College, Grays Harbor Community College and WSU Cooperative Extension.

LINKAGES:

Western Rural Development Center and, through it, the member States and Territories.

AUDIENCE:

Audiences include elected and appointed officials and staff in counties and municipalities and the state's three local government associations (WA State Association of Counties, WA Association of County Officials, and Association of WA Cities). We will continue to work with WA State Rural Development Council, the Planning Association of WA, Pacific NW Regional Economic Conference and Washington State Association of Sheriffs and Police Chiefs. Additional audiences include local civic organization leaders; statewide and local interest groups; state agency personnel; business/industry and commodity groups; communities of citizens, and low-income, minority and multi-cultural groups.

Specific approaches to reach protected classes

Targeted protected classes can be reached in one or a combination of the following ways: developing Spanish-language written and video educational materials; co-sponsoring projects with ethnic-based organizations; and working with radio stations that market their programming to local ethnic populations.

EVALUATION:

Individual leadership skill assessments will be conducted by using adaptations of the following materials: a) evaluation materials from the Center for Creative Leadership, Greensboro, N.C.; b) The Letherman Leadership Questionnaire produced by the International Training Consultants, Richmond, VA.

Group practice changes will be evaluated through sensing interviews, pre and post; self-assessment by group members; process observation; and document analysis.

Training effectiveness can be evaluated via sensing interviews to retrospectively trace change and through document analysis, assessing end results.

In evaluating educational activities in this program area, we will collect data and submit reports for these **specific indicators**:

- II. Number of workshops/trainings conducted to improve leadership, administrative, and/or decision-making skills. Include number attending and an estimate of those in target protected classes.
- I. Number of new collaborative efforts among local government entities and/or community groups because of Extension involvement.
- II. Number of local government and community volunteer organization leaders and members who have augmented their strategic planning skills as a result of Extension programming.
- III. Evidence of increased interest in the goal setting process (initiating, follow-through, and evaluating).
Number of participants who received training on this subject.
- IV. Number of low-income and minority groups who have become involved in community decision-making.
- V. Evidence of increased social capital and community governance within targeted communities.
Evidence may include adoption of community policing as a working philosophy, team management of local county or municipal government, and/or participation in civic journalism efforts to increase community social capital.

PROGRAM DURATION: Long Term.

VII.

ECONOMIC AND SOCIAL CHANGE

ISSUE:

Most counties and communities in Washington are in a transition, the effects of which are aggravated by uneven growth throughout the state. The importance of traditional economic activities in resource-based counties is decreasing as industries in these areas strive to remain competitive in an increasingly global environment by expanding their output while employing fewer workers. In many rural counties, population stagnation during the 1980's has changed to consistent population gain during the 1990's, but this gain is not tied to a rebound of growth in traditional rural industries.

Non-metro counties on the fringe of large metro areas are rapidly becoming ex-urban, recreational, and retirement areas. Employment and population are growing rapidly in these counties, but their character and economic base are being fundamentally altered. The State's metro counties are also experiencing a sustained period of growth.

This transition confronts communities' policy makers at all levels with a variety of problems. Rural growth is no longer tied to traditional rural industries and some areas may have difficulty accommodating new-comers. Communities contending with rapid growth face a variety of problems including the loss of open areas, farms, and forested sections as low density subdivisions, shopping malls, and office "parks" contribute to urban sprawl.

The Puget Sound area has been rated as one of the worst in the nation for traffic congestion, substantially increasing travel times to work and leading to high levels of carbon monoxide and particulate emissions. Finally, many families find it increasingly difficult to locate affordable housing.

Widespread changes in political, social, and economic conditions are producing a highly interdependent global marketplace. This presents an opportunity for rural businesses in Washington to market products and services to an expanding number of consumers worldwide.

Extensive planning efforts are needed in rapidly growing areas to preserve open and wooded tracts, assist with the expansion housing and businesses in ways that minimize commuting in private vehicles, and plan for affordable housing for low and moderate income households, and to cope with conflicts between newcomers and long-term residents.

In addition, even in areas experiencing growth, it is important to continue to assist in the growth and development of local businesses that are more responsive to the needs of local areas.

GOAL:

WSU Cooperative Extension faculty will assist:

- Local policy-makers, community/economic development organizations, and others who guide social and economic change by:
 - providing timely social, economic, and demographic information and analysis;
 - assisting in the development of realistic solutions to community problems; and
 - building local capacity to respond to community and regional changes.

- Communities and areas facing economic decline in community development planning, business retention/expansion efforts and an increasing participation in the global marketplace.
- Food processing enterprises with technical training assistance to increase their profitability and maintain sound environmental practices.

OBJECTIVES/KEY COMPONENTS:

Local policy-makers, community/economic development practitioners, and others will:

1. Utilize social, economic, and demographic information, trends, and principles, and develop skills in analyzing alternative economic development programs and approaches to community issues and goals.
2. Improve their abilities to build cooperation among individuals and community organizations through team-building and problem-solving in community and economic development.
3. Increase cooperation and linkages between local economic development organizations, higher education resources, and state agencies to facilitate community development efforts.
4. Assist with starting, retaining, and/or expanding local businesses, including home based businesses with special emphasis on food processing and value added industries, and expanding participation in export markets.

Specific training

Specialists will receive training and support from state and national organizations, including the State Data Center at the Office of Financial Management, the Regional Office of the Census Bureau, and the Bureau of Economic Analysis. In turn, specialists will provide training for county faculty through in-service training programs and on an individual, county level basis when such help is needed.

Specific training programs are planned in several areas. One program will focus on enhancing interaction between Extension agents and state agencies conducting programs and/or providing grants to assist local economic development efforts. Another focus of training will center on release and use of 2000 census data with both agents and clientele as an audience. In addition, agents and other local government personnel will participate in strategic management workshops.

Major materials

Extension specialists work with several large, computer based data systems from the Bureau of Economic Analysis, the Census Bureau, and state agencies. These systems are periodically updated and used to analyze and disseminate the local, regional, and national social, economic, and demographic data central to this program.

There are two major ongoing publications produced by WSU Cooperative Extension specialists. One, in print form, is the "Washington Counts" series which examines county social and demographic trends. The second is Web based (URL www.niip.wsu.edu). It analyzes economic structure and trends for counties and regions throughout the Northwest.

This program also provides access to materials through the World Wide Web and several national data bases containing a wide variety of research and applied publications on economic revitalization, business expansion and retention in rural areas, cooperatives, rural health care, business incubators, home based businesses, and other issues. A more limited collection of economic development information is available on the WSU campus. Information and assistance on many aspects of business initiation and development are also available from the Small Business Development Center with offices at Washington State University and local community colleges.

LINKAGES:

- Western Rural Development Center and its member States and Territories.
- Oregon State University Energy Extension.
- Oregon State University and University of Idaho food and nutrition departments.
- Washington Manufacturing Extension.

AUDIENCE:

The targeted audience includes the following:

Elected and appointed public officials, including county commissioners, city council members, port and planning commissioners, school board representatives, public utility district supervisors, and tribal council members.

Professional agency personnel, including directors and staff of economic development, planning, social service and other local, state, and regional agencies.

Private citizen groups, including chambers of commerce, business firms and corporations, private industry organizations, civic organizations, and minority group associations and organizations serving the needs of minorities, producers, processors, and small businesses.

Specific approaches to reach protected groups

Organizations and individuals representing targeted protected groups are on the mailing lists for the publications discussed above. Through these publications they receive periodic information on activities in this program, and specialists and agents provide further information and assistance when contacted by these groups. In addition, specialists periodically provide social, economic, and demographic analysis of specific interest to these groups and ask members to review these publications before they are finalized. Statewide and local ethnic-based organizations should be approached to co-sponsor workshops and projects. The development of Spanish-language versions of written and video educational materials should be considered. Also consider reaching ethnic populations through local radio stations that market their programming toward specific groups.

EVALUATION:

When organizing and coordinating workshops and programs, agents and specialists will seek to obtain

written
evaluations
from
participants

where possible. Specific action or practice changes resulting from program efforts will be documented. In evaluating educational activities in this program area, we will collect data and submit reports for these **specific indicators:**

- Number of social, economic or demographic analyses conducted.
- Number of organizations and individuals reporting use of economic or demographic analyses in their work.
- Number of business incorporating technical assistance from Extension.
- Number of business retained or expanded.
- Number of new enterprises created.

Specific references, consultants and measurement tools

Project evaluations will be conducted by using surveys of participants, focus group interviews, and participant follow-ups. In some cases short, on-going evaluations will be conducted as a particular program progresses.

Three good evaluation references are:

- Patton, Michael Q., 1987. How to Use Qualitative Methods in Evaluation. Newbury Park, CA: Sage Publications.
- Miller, R. W., 1979. Evaluative Research in Rural Development. Northeast Regional Center for Rural Development. Cornell University.
- Dillman, Don A., 1978. Mail and Telephone Surveys: The Total Design Method. New York: Wiley.

PROGRAM DURATION: Long Term.

CIVIL RIGHTS

Racial and ethnic diversity grew notably in Washington between 1990 and 1995.

While the state's White population grew by 7.6 percent, minority populations increased by between 19 and 49 percent. Persons of Hispanic origin remain the state's largest minority. In the first five years of this decade, their numbers grew by 44.6 percent. They increased from 4.4 to 5.7 percent of the population. Asian and Pacific Islanders are the second largest minority and the fastest growing, increasing by just under 100,000 in 5 years - an increase of 48.6 percent. If the relative growth rates of these two minorities are maintained for the last five years of this decade, Asian and Pacific Islanders would be the state's largest minority in 2000. The Black and American Indian populations are considerably smaller, but each experienced a growth rate well above the state's average, increasing by 21.6 and 19.4 percent respectively.

WSU Cooperative Extension places high priority in reaching low income and minority constituents and focuses on bringing the resources of the university to these people in innovative ways. Specifics of programming efforts are found throughout the program plan.

GOAL - EQUAL EMPLOYMENT OPPORTUNITY:

To achieve and maintain optimum diversity in the workforce. To provide awareness of and access to remediation services and systems.

Procedures:

Since Washington State passed Initiative 200 last year, banning preference for women and minorities, the university has carefully examined its hiring procedures. The Associate Director of Extension and the affirmative action coordinator have been involved in meetings and discussions with the Center for Human Rights to ensure that there is consistency and mutual understanding of requirements. Very little has had to be changed in our procedures in light of I-200. The emphasis was and continues to be on *recruitment* of the broadest possible pool of candidates for positions and on ensuring that there are no barriers for anyone to successfully apply and be selected for positions with the university. The Associate Director will serve on a university-wide committee to revise the recruitment manual, incorporating new regulations and law.

WSU Cooperative Extension, independently and in cooperation with other missions of the College of Agriculture and Home Economics and the university's central administration, will experiment with alternative recruitment procedures to attract more diverse applicants. This will include but not be limited to accessing data banks, direct personalized mailings, and campus recruitment visitations. We will continue to use electronic listservs and web pages to broaden the exposure of available extension positions. Position announcements will state need for bilingual skills, familiarity with diverse cultures, or other qualifications which reflect a sensitivity to the population to be served and an appreciation of diversity. Screening committees will be selected and trained to avoid discrimination and seek diversity.

All employees will be notified at least annually of the variety of services and systems available to resolve complaints. WSU will maintain a set of Equal Employment Counselors, peers specifically trained to assist complainants and answer inquiries. Both informal and formal complaint procedures will be maintained in Cooperative Extension as well as available through the WSU Center for Human Rights.

In collaboration with the Center for Human Rights which collects data for the university, employment actions will be summarized and analyzed annually. Unit heads will be evaluated in regard to their actions to maintain

non-discriminatory employment settings.

GOAL - PROGRAM DELIVERY:

Specific efforts will be made to reach the underserved people of Washington. New programs and activities will be introduced and existing curriculum adapted to meet the needs of traditionally unreached audiences such as people of color, low-income, disabled and aged.

Procedures:

Specific approaches to reach protected classes are included throughout the four-year Plan of Work.

GOAL - CIVIL RIGHTS TRAINING:

Employees (paid and volunteer) will understand their roles and responsibilities for implementing the spirit and letter of civil rights laws and regulations.

Participants serving in advisory capacities will be aware of the CE mission, policies, implications of increased diversity, and civil rights expectations.

Procedures:

Each newly hired employee will be informed of the civil rights program during the initial orientation. This information will be reinforced throughout the first years of employment through unit head mentoring, goal setting conference, performance appraisal, and peer counseling. New and veteran faculty will be included on civil rights review committees, and will be fully involved when their county is being reviewed.

Civil rights in-service education opportunities will be provided to all faculty and staff through the WSU Center for Human Rights, WSU Human Resource Services, and the College of Agriculture and Home Economics, as well as Cooperative Extension.

Course designers of technical training events will be encouraged to incorporate elements of diversity as the principal subject matter allows. For example, courses focused on program need analysis and impact evaluation will heavily emphasize diversity while courses in nutrition may identify and explore cultural preferences as a determinant of food choices.

Friday Update, the informal, weekly CE e-mail message from the director's office that is most widely read, will carry civil rights items as appropriate.

New County chairs will receive training necessary to lead the civil rights plan and use the Civil Rights. They, in turn, will engage county faculty and staff in the implementation of the compliance plan. Effective engagement will include training and study related to the local population and its leadership, the represented cultures, and civil rights requirements.

Faculty will be encouraged and supported to learn about diverse populations and to incorporate appropriate aspects of those learnings into educational offerings. Particular effort will be made to educate both advisors and volunteers who speak on behalf of Cooperative Extension.

GOAL - PUBLIC NOTIFICATION:

Program participants and potential program beneficiaries will be aware of the non - discriminatory policies of Cooperative Extension and provisions for remediating complaints.

Procedures:

All publications including newsletters, media releases and promotional materials will carry a non - discrimination statement. Marketing banners, printed in both English and Spanish, will be available.

All office and unit - controlled meeting rooms which serve the public will be posted with "...and justice for all" posters. Replacement of supplemental posters will be available through the Bulletins Department.

Faculty and staff will ascertain the non - discriminatory policies of organizations and groups prior to rendering services and periodically thereafter. Written record of confirmation of non - discrimination will be kept.

Documentation of public notification will be retained in county offices. Annually, units will confirm compliance with basic requirements and report special approaches to reach protected classes.

GOAL - ONSITE COMPLIANCE REVIEWS:

Offices maintained by Cooperative Extension will be in compliance with civil rights laws and regulations.

Procedures:

Annually a minimum of two counties will be selected for on - site compliance review. An “external review team” will be appointed by the Director to include faculty from counties recently reviewed and soon to be reviewed. Both department - based and county - based faculty will be represented. The entire faculty and staff of the county program being reviewed comprise the “internal review team.”

The faculty and staff of each selected county will undertake a self - study and after sharing the results of the self - study with the external review team, they will host a site visitation. Following the site visitation the external review team will make recommendations to the unit and to the Director's office.

Reviewed units will respond to the recommendations by reporting what actions they plan to take to complete required remedial steps within the year following completion of the review. If issues of general concern or interest are identified, the Director's office will take appropriate action.

WSU - CE will develop a civil rights desk audit procedure for follow - up with compliance reviews. This procedure will select two previously reviewed counties with and follow up with questions to determine if and what type of steps were taken by the county to resolve compliance concerns addressed in the review.

Planned Multi-State Extension Programs			
	WA (FTE)	OR (FTE)	ID (FTE)
Program/Activity			
CSREES Goals 1 & 4			

Direct Seeding (no till) PNW STEEP	0.50	1.00	0.50
dryland systems of the NW			
Small Grain Variety Testing	1.25	1.00	0.50
Potato Variety Testing and Production	1.00	1.00	1.00
Grass Seed	0.05	0.50	0.50
Reduced field burning			
NW Center for Small Fruits	1.00	1.50	0.50
NW Berry & Grape information network			
Tree Fruit Production	0.30	0.50	0.25
Horticulture and Nursery Programs	0.60	0.50	0.50
Master Gardeners, ornamental seminars			
Reciprocal PAT Training Program	1.50	1.00	1.00
Livestock Production	1.50	1.00	1.50
Cow-calf management guide, Nat'l Beef handbook and database, intermountain			
cow symposium, Pork 2000, western dairy management, forage programs			
Sustainable Agriculture	1.00	1.00	1.00
SARE Ext., beef marketing A to Z-Retained ownership, small acreage programs, riparian grazing projects, composting, IPM			
Salmon Restoration-all program areas	1.00	2.00	1.50
Forest & Ag practices, watershed stewardship, watershed councils, urban			
impacts, waste management, economic impacts			
Proper Functioning Condition	0.15	1.00	0.50
Grazing of riparian areas working group, public lands issues			
Forestry	1.00	0.50	0.75
Native hardwoods, spiral forest products, Mid-Columbia Valley Forestry Ext.			
Christmas trees, Continuing Education, Agro-Forestry			
Situation and Outlook	2.00	1.00	0.50
Farm management, marketing, policy, rural development, Agr-Credit, risk			
management			
CSREES Goal 2			

Food Safety	0.25	0.20	0.25
Master food preserver, better process control schools, training for meat processors			
CSREES Goal 5			
4H Youth Development Education	2.75	2.00	2.00
Curriculum development teams, leader forum, professional development, leader training, national development, team leadership comp, regional 4H marketing,			
WA/ID HUB group, child care network, impact assessment project			
Family and Consumer Sciences	1.00	0.50	1.00
High school financial planning, gerontology, parenting, welfare reform, community food systems			
Pacific Northwest (PNW) Publication Series	2.00	2.00	2.00
4-H Youth, IPM, FCS, Agriculture Production			
Community Development			1.00
Totals (FTE)	18.85	18.20	16.75
EPA Liaison Position	\$7,000	\$7,000	\$7,000

Ag Horizons Team

<u>Name</u>	<u>Expertise</u>	<u>Location</u>	<u>Extension</u>	<u>Research</u>	<u>Teaching</u>	<u>Comment</u>
			<u>FTE</u>	<u>FTE</u>	<u>FTE</u>	
Ed Adams	Plant Pathology	WSU Spokane	1.00	0.00	0.00	
Lynn Alderson	Agronomy	Douglas County	1.00	0.00	0.00	
Randy Baldree	Livestock	Whitman County	1.00	0.00	0.00	
Dave Bezdicek	Crops and Soils	Pullman	0.00	0.49	0.51	
Dave Bragg	Chair, Entomology	Garfield County	1.00	0.00	0.00	
John Burns	Chair, Agronomy	Whitman County	1.00	0.00	0.00	
Phil Crawford	Program Administrator	Pullman	0.70	0.30	0.00	
Don Dysart	Resource Center Coordinator	Spokane	1.00	0.00	0.00	
Aaron Esser	On-farm testing coordinator	Adams County	1.00	0.00	0.00	
Walt Gary	Chair, Agronomy, Entomology	Walla Walla Co.	1.00	0.00	0.00	
David Granatstein	Area Agent-Sus. Ag.	WSU Wenatchee	1.00	0.00	0.00	
Jim Lindstrom	Chair, CRD, 4-H	Spokane County	1.00	0.00	0.00	
Linda Loos	Secretary Senior	WSU Spokane	0.75	0.00	0.00	0.25 county
Jon Newkirk	Chair, Ag Economics	Adams County	1.00	0.00	0.00	
Martin Palmer	Editor, Newsletter	Davenport, WA	0.00	0.00	0.00	
Sue Palmer	Support Staff	Lincoln County	1.00	0.00	0.00	county
Tom Platt	Chair, Livestock	Lincoln County	1.00	0.00	0.00	
Diana Roberts	Area Agent; Agronomy	Spokane County	1.00	0.00	0.00	
Karen Robertson	Support Staff	Lincoln County	1.00	0.00	0.00	
Dennis Roe	Nat. Resource Conservation Service	Spokane	0.00	0.00	0.00	
Dora Rumsey	Eastside Regional Coordinator	WSU Tri-Cities	1.00	0.00	0.00	
Bill Schillinger	Agronomy	Adams Co.-Lind	0.40	0.60	0.00	
Roland Schirman	Chair, Agronomy	Columbia County	1.00	0.00	0.00	
Roger Veseth	Agronomy	U of Idaho/ WSU	1.00	0.00	0.00	

Livestock Team

<u>Name</u>	<u>Expertise</u>	<u>Location</u>	<u>Extension</u>	<u>Research</u>	<u>Teaching</u>	<u>Comment</u>
			<u>FTE</u>	<u>FTE</u>	<u>FTE</u>	
Randy Baldree	Livestock	Whitman County	1.00	0.00	0.00	
Tom Brannon	Natural Resources	WSU Colockum Res.	1.00	0.00	0.00	
Jan Busboom	Animal Sciences	Pullman	0.65	0.35	0.00	
Shulin Chen	Bio. Systems Engineering	Pullman	0.00	0.40	0.60	
Phil Crawford	Program Leader	Pullman	0.70	0.30	0.00	
Brian Cummings		Nespelem	0.00	0.00	0.00	1.00 grant
John Fouts	Livestock	Spokane County	1.00	0.00	0.00	
W. Frank Hendrix	Livestock	Yakima County	1.00	0.00	0.00	
Gary Fredricks	Livestock; Dairy	Clark County	1.00	0.00	0.00	
John Froseth	Animal Sciences	Pullman	0.60	0.00	0.40	
Charles Gaskins	Animal Sciences	Pullman	0.00	0.30	0.70	
Clive Gay	Animal Sciences	Pullman	0.00	0.41	0.59	
Jeff Goebel	Facilitation, Holistic Management	Pullman	1.00	0.00	0.00	
Betsy Greene	Animal Sciences	Pullman	0.40	0.00	0.60	
Mike Hackett	Livestock	Skagit County	1.00	0.00	0.00	
Bruce Heimbigner	Animal Sciences	Pullman	0.00	0.00	1.00	
Susan Kerr	Chair; Animal Sciences	Klickitat County	1.00	0.00	0.00	
Ron Kincaid	Animal Sciences	Pullman	0.00	0.60	0.40	
Art Linton	Animal Sciences	Prosser	0.17	0.83	0.00	
Wayne Madson	Animal Sciences	Stevens County	1.00	0.00	0.00	
Carol Miles	Alternative Crops	Lewis County	1.00	0.00	0.00	
Donald Nelson	Animal Sciences	Pullman	1.00	0.00	0.00	
Jerry Newman	4-H	Pullman	1.00	0.00	0.00	
Tom Platt	Chair; Livestock	Lincoln County	1.00	0.00	0.00	
Penny Ramey	Animal Sciences	Clark County	1.00	0.00	0.00	time slip
Janet Schmidt	Animal Sciences	Whitman County	1.00	0.00	0.00	
Jean Smith	Animal Sciences	Benton Co, Kennewick	1.00	0.00	0.00	
Douglas Stienbarger	Chair; Livestock	King County	1.00	0.00	0.00	

Water Quality Management Team

<u>Name</u>	<u>Expertise</u>	<u>Location</u>	<u>Extension</u> FTE	<u>Research</u> FTE	<u>Teaching</u> FTE	<u>Comment</u>
Karen Blyler	Water Quality, Home *A*	WSU Puyallup	0.00	0.00	0.00	1.00 grant
Tom Brannon	Water Quality, Forest Management	Colockum Res. Unit	1.00	0.00	0.00	
Shulin Chen	Bio. Systems Engineering	Pullman	0.00	0.40	0.60	
Phil Crawford	Program Leader	Pullman	0.50	0.00	0.50	
Chrise Feise	Water Quality EPA Liaison	Seattle	1.00	0.00	0.00	
Gary Fredricks	Dairy	Clark County	1.00	0.00	0.00	
Marilyn Freeman	Water Quality	King County	0.00	0.00	0.00	
Joan Million	Team Coordinator	Pullman	1.00	0.00	0.00	
Jerry Newman	Environmental Education	Pullman	1.00	0.00	0.00	
Becky Peterson	Water Quality	Whatcom County	1.00	0.00	0.00	time slip
Roland Schirman	Chair; Agronomy	Columbia County	1.00	0.00	0.00	
Bob Simmons	Water Quality	Mason County	1.00	0.00	0.00	
Bob Stevens	Water Quality	WSU Prosser	1.00	0.00	0.00	
Douglas Stienbarger	Water Quality	King County	1.00	0.00	0.00	

Dairy

<u>Name</u>	<u>Expertise</u>	<u>Location</u>	<u>Extension</u> FTE	<u>Research</u> FTE	<u>Teaching</u> FTE	<u>Comment</u>
Roger Cady	Dairy	WSU Puyallup	0.75	0.25	0.00	
Craig Cogger	Dairy Waste Management	WSU Puyallup	0.50	0.50	0.00	
Phil Crawford	Program Leader	Pullman	0.70	0.30	0.00	
Larry Fox	Animal Sciences	Pullman	0.00	0.70	0.30	
Steve Fransen	Dairy, Forage	WSU Puyallup	0.40	0.60	0.00	
Gary Fredricks	Dairy	Clark County	1.00	0.00	0.00	
Joe Harrison	Dairy	WSU Puyallup	0.25	0.75	0.00	
Lynnel Rowan	Dairy	Yakima County	1.00	0.00	0.00	
Bob Stevens	Water Quality	WSU Prosser	1.00	0.00	0.00	

Community Horticulture

<u>Name</u>	<u>Expertise</u>	<u>Location</u>	<u>Extension FTE</u>	<u>Research FTE</u>	<u>Teaching FTE</u>	<u>Comment</u>
Phil Crawford	Program Leader	Pullman	0.70	0.30	0.00	
Margaret Duncan	Past president, Master Gardener foundation		0.00	0.00	0.00	
Sheila Gray	Master Gardeners, Community Hort. et al.	Cowlitz County	1.00	0.00	0.00	
Marianne Ophardt	Consumer horticulture	Benton County	1.00	0.00	0.00	
Nancy Rausch	MG Volunteer Coordinator	Cowlitz County	0.00	0.00	0.00	
Mary Robson	Area agent; horticulture	King County	1.00	0.00	0.00	
Tom Schultz	Chair; plant disease, disease management	San Juan County	1.00	0.00	0.00	
Roy Van Denburgh	Vegetables	Yakima County	1.00	0.00	0.00	
Holly Kennell		Snohomish County	1.00	0.00	0.00	

Compost

<u>Name</u>	<u>Expertise</u>	<u>Location</u>	<u>Extension FTE</u>	<u>Research FTE</u>	<u>Teaching FTE</u>	<u>Comment</u>
Andy Bary	Soils, waste management	WSU Puyallup	0.00	1.00	0.00	
David Bezdicek	Cropping systems, soils, Sustainable ag.	Pullman	0.00	0.49	0.51	
Craig Cogger	Dairy Waste Management	WSU Puyallup	0.50	0.50	0.00	
Mary Fauci	Res. Tech.- Crop & Soils	Pullman	0.00	1.00	0.00	
David Granatstein	Compost, Ecolabeling, organic farming	WSU Wenatchee	1.00	0.00	0.00	
Craig MacConnell	Chair; water quality	Whatcom County	1.00	0.00	0.00	
Dan Sullivan	Soils, water quality, organic	OSU, Corvallis	0.00	0.00	0.00	
Bob Stevens	Water quality	WSU Prosser	1.00	0.00	0.00	

Forestry Team

<u>Name</u>	<u>Expertise</u>	<u>Location</u>	<u>Extension FTE</u>	<u>Research FTE</u>	<u>Teaching FTE</u>	<u>Comment</u>
David Baumgartner	Forest Mgmt, Int'l development, Ecosystem	Pullman	1.00	0.00	0.00	
Don Bender	Wood and Forest Products, composite mat.	Pullman	0.00	0.00	1.00	

Arno Bergstrom	Forest Stewardship, Urban Forestry LC's	Pierce County	1.00	0.00	0.00	
Tom Brannon	Range Mgmt, Forest mgmt, Ecosystem rest.	WSU Colockum Res.	1.00	0.00	0.00	
Phil Crawford	Asst. Director - ANR, Forest Management	Pullman	0.50	0.00	0.50	
Janean Creighton	Wildlife mgmt, Wildlife educ., Forest steward.	Pullman	1.00	0.00	0.00	
Ed DePuit	WSU NRS Dept. Chair, Ecosystem, Range	Pullman	0.17	0.34	0.49	
Jim Freed	Special Forest Products	Olympia	1.00	0.00	0.00	
Sheila Gray	Forest Stewardship, Forest Management	Cowlitz County	1.00	0.00	0.00	
Peter Griessman	Forest Stewardship, Forest Health	Stevens County	1.00	0.00	0.00	
Marlene Guse	Program Coordinator, Publications	Pullman	1.00	0.00	0.00	
Don Hanley	Forest Stewardship, Forest Management	U of W, Seattle	1.00	0.00	0.00	
Linda Hardesty	Range Mgmt, Ecosystem, Agroforestry	Pullman	0.25	0.25	0.50	
Ole Helgerson	Forest Stewardship, Forest Management	Skamania County	1.00	0.00	0.00	
John Munn	Wildlife Educ., Forest Stewardship, Environ.	Snohomish County	1.00	0.00	0.00	
Steve Sax	Forest Education, Forest Stewardship	Seattle	0.00	0.00	0.00	
Steve Webster	Forest Stewardship, Forest Soils, Logger Ed	Lewis County	1.00	0.00	0.00	
Tony Wright	Computer Models, Computer Applications	Pullman	0.90	0.10	0.00	
WSU Food and Farm Connections Team						
Name	Expertise	Location	Extension FTE	Research FTE	Teaching FTE	Comment
Gayle Alleman	Food Safety, nutrition	King County	1.00	0.00	0.00	
Andy Bary	Soils, waste management	WSU Puyallup	0.00	1.00	0.00	
Curtis Beus	Livestock, sustainable farming systems	Clallum County	1.00	0.00	0.00	
Charles Brun	Small Fruits, medicinal herbs	Clark County	1.00	0.00	0.00	
Lorna Butler	Social dimensions of sustainable ag.	WSU Puyallup	0.75	0.25	0.00	
Dick Carkner	Agricultural economics	WSU Puyallup	0.75	0.25	0.00	

Susie Craig	Food safety, elementary food system educ.	Thurston County	1.00	0.00	0.00	
Phil Crawford	Center for Sustaining Ag. & Natural Resources	Pullman	0.70	0.30	0.00	
Steve Fransen	Forages, pastures, grass, corn silage	WSU Puyallup	0.40	0.60	0.00	
Gary Fredericks	Animal science & nutrition, bacteriology	Clark County	1.00	0.00	0.00	
Steven Garrett	Community food systems, food security	Pierce County	1.00	0.00	0.00	
Sheila Gray	Ornamental and production horticulture	Cowlitz County	1.00	0.00	0.00	
Michael Hackett	Animal science, water quality, volunteer mgmt	Skagit County	1.00	0.00	0.00	
Janet Hammer	Community development, planning & policy	WSU Puyallup	1.00	0.00	0.00	
Dyvon Havens	IPM, small fruits, cover crops	Skagit County	1.00	0.00	0.00	
Raymond Jussaume	Local and global systems interactions	Pullman	0.25	0.55	0.20	
Jim Kropf	Commercial horticulture, marketing	Pierce County	1.00	0.00	0.00	
Carol Miles	Vegetable crops, alternative crops	Lewis County	1.00	0.00	0.00	
Penny Ramey	Cranberry production, aquatic weed control	WSU Long Beach	1.00	0.00	0.00	
Kim Patten	Cranberry production, marketing	WSU Long Beach	0.50	0.50	0.00	
Tom Schultz	Plant disease, disease management	San Juan County	1.00	0.00	0.00	
Bob Simmons	Environmental education, water issues	Thurston County	1.00	0.00	0.00	
Doug Stienbarger	Environmental education, water issues	King County	1.00	0.00	0.00	
Don Tapio	Christmas tree, small fruit, ornamental plants	Grays Harbor County	1.00	0.00	0.00	
Joyce Weber	Administrative Support	WSU Puyallup	0.60	0.40	0.00	
Blair Wolfley	Livestock, farm planning, water quality	Clark County	1.00	0.00	0.00	
Center for Sustaining Agriculture and Natural Resources Leadership Team						
<u>Name</u>	<u>Expertise</u>	<u>Location</u>	<u>Extension FTE</u>	<u>Research FTE</u>	<u>Teaching FTE</u>	<u>Comment</u>
Phil Crawford	Director	Pullman	0.70	0.30	0.00	
Jeri Bough	Administrative Assistant; Team Coordinator	Pullman	1.00	0.00	0.00	
Ed Adams	Plant pathologist, alternative cropping systems	WSU Spokane	1.00	0.00	0.00	
Chris Feise	EPA Liaison	Seattle	1.00	0.00	0.00	

David Granatstein	Sustaining agriculture, eco-labeling	WSU Wenatchee	1.00	0.00	0.00	
Don Nelson	Animal sciences, Holistic management proj.	Pullman	1.00	0.00	0.00	
Lorna Butler	Social dimensions of sustainable ag.	WSU Puyallup	0.75	0.25	0.00	
NE WA/NE Idaho Small Farm Team						
Name	Expertise	Location	Extension FTE	Research FTE	Teaching FTE	Comment
Toni Fitzgerald	Horticulture, native plants	Spokane County	1.00	0.00	0.00	
Wayne Madson	Livestock, small farms	Stevens County	1.00	0.00	0.00	
John Fouts	Livestock	Spokane County	1.00	0.00	0.00	
Vickie Parker-Clark	Small Farms, community food systems	Kootenai County, ID	0.00	0.00	0.00	
Tom Platt	Livestock	Lincoln County	1.00	0.00	0.00	
Don Dysart	Resource Center Coordinator	Spokane County	1.00	0.00	0.00	

Parenting Team						
Name	Expertise	Location	Extension FTE	Research FTE	Teaching FTE	Comment
Kenn Barber	Parenting	Pullman	0.50	0.00	0.50	
Ann Diede		Chelan County	1.00	0.00	0.00	county
Sheliah Johnson		King County	1.00	0.00	0.00	county
Chris Koehler		Spokane County	1.00	0.00	0.00	county
Betty Meloy		Grant County	1.00	0.00	0.00	county
Janet Lambarth		Pend Oreille County	1.00	0.00	0.00	county
Drew Betz		Lewis County	1.00	0.00	0.00	county
Marilyn Trail	Community and Family	Spokane County	1.00	0.00	0.00	county
Cathy DeSautel	Family Living	Ferry County	0.00	0.00	0.00	100% grant funds
Lori Carraway		Snohomish County	1.00	0.00	0.00	county
Sandy Bailey	Post-divorce families, child care	Pullman	0.00	0.00	1.00	research & teaching
Kathleen Boyce-Rodgers	Parent-child relations	Pullman	0.00	0.50	0.50	research & teaching

