Track One

Risk Management

Cultivating Success: Sustainable Small Farming and Ranching Education Program

Marcy Ostrom and **Malaquias Flores**
Washington State University
Puyallup, Washington
Cinda Williams and **Theresa Beaver**
University of Idaho
Moscow, Idaho

Cultivating Success is a collaborative educational program of Washington State University (WSU), the University of Idaho (UI), and a non-profit, Rural Roots, designed to address the risk management issues, and production, business and marketing needs of beginning and existing farmers, as well as agricultural professionals and students. The program consists of semester-long courses and intensive short courses that are offered through Extension and on campus at both WSU and UI. The goal of the program is to *create and implement new educational programs that will increase the number and foster the long-term success of small sustainable farmers and ranchers in Washington and Idaho.* With this goal in mind, the courses utilize a community-based, experiential approach. Experienced farmers, community resource people, and university specialists are brought together with students in the classroom and in the field. Farmer-student mentoring relationships are fostered. Since the program's beginning in Fall, 2001 over 700 participants have taken one or more classes.

Two of the courses developed as part of the Cultivating Success program have proven particularly useful in county extension settings and, to-date, have been offered through 14 county extension offices in Washington and five in Idaho. The first, Sustainable Small Acreage Farming and Ranching, was designed to provide beginning and existing farmers with the planning and decision-making tools and the knowledge of farm production and management systems needed to develop a whole-farm plan for an economically and environmentally successful small acreage enterprise. Weekly evening course sessions cover such topics as goal setting, resource assessment, sustainable pest and soil management techniques, alternative cropping and livestock systems, and marketing strategies. The course model encourages co-learning and interactive discussion among experienced farmer mentors, university agricultural specialists, and students. Field trips are taken to farms, value-added businesses and direct market outlets. By the end of the course students have completed a whole-farm plan for their unique farm enterprise.

A second course, Agricultural Entrepreneurship, focuses on farm business planning and the reduction of financial risks. Students gain knowledge of the business planning process, financial management techniques, and successful marketing strategies. By the end of the course, they are expected to have completed a farm business plan and made a presentation on it to the rest of the class. Topics covered include setting enterprise goals, planning and research, regulatory and legal structures, insurance, market analysis, marketing strategies, record-keeping, budgets & cash flow, financial statements, and federal farm programs and resources. Over 200 farm business plans have been developed as a result of students taking this course. Student evaluations indicate that many have improved or changed their farm management strategies as a result of

course participation. Other positive outcomes of course participation have included many new start-up farm businesses, the diversification of existing farm businesses, and strong farmer networking. Over 80 percent of participants report having taken advantage of additional educational activities and public agricultural resources as a result of being introduced to them in the classes.

New Programs for Immigrant Farmers

Recently, the Cultivating Success Program has expanded to include courses for Latino and Hmong audiences. Washington has growing numbers of immigrant farmers who need access to capital, land, and business management skills. Many formal extension formats have been a poor fit for these audiences due to limited English and literacy skills and extremely low incomes. Very little information exists on the actual numbers of these farmers or the extent of their needs and farming goals. While the 2002 Agricultural Census listed 1,821 Latino-owned farms in Washington, a 14 percent increase from 1997, this was most certainly an undercount. The last agricultural census missed all of Washington's growing population of Hmong farmers.

New partnership agreements with the USDA Risk Management Agency and a grant from the Sustainable Agriculture Research and Education program have allowed us to conduct initial needs assessments and begin developing and adapting our curricula for Latino and Hmong audiences. Listening sessions and interviews with Hmong farmers in the Puget Sound area and Latino farmers in central Washington have helped to identify educational and informational priorities. Over 350 Latino farm families and 99 Hmong farm families in need of assistance have been identified. In accordance with the stated farmer needs, educational programs on various aspects of business planning and whole farm management are being offered in cooperation with county extension offices in the form of courses, workshops, farm walks, radio talks, and one-on-one counseling. Over 50 Latino and 35 Hmong farmers have participated in these educational programs. Participants have gained knowledge about financial management and marketing, alternative pest and soil management, drought mitigation, and federal assistance programs.

Additional Educational Opportunities

Annual workshops are held in Washington and Idaho to train new course instructors and extension educators to offer Cultivating Success courses in additional counties. Student and instructor manuals are continually being improved to make it easy for such educators to adapt instructional materials to their unique audiences. New certificate programs in Sustainable Small Acreage Farming and Ranching have been approved at both Washington State University and the University of Idaho for academic and continuing education (CEU) students. Courses can be taken individually or in a series in designated topic areas to earn a certificate in Sustainable Small Acreage Farming and Ranching. The certificate program includes a strong emphasis on practical, on-farm experiences and farmer mentoring relationships. With the help of Higher Education Challenge grants, many new courses are under development for the certificate program, including courses in sustainable livestock management, organic farming, and applied soil management. Many of these courses will be available for distance delivery. For more information on the certificates, individual course offerings, or the Cultivating Success Program, please visit our website at http://cultivatingsuccess.org

What Are Animal Feeding Operations? Do The New Regulations Affect My Farm?

Gregory Beatty
U.S. EPA
Washington, DC

Introduction
On February 12, 2003, EPA published in the *Federal Register* revisions to the 25 year old regulations for concentrated animal feeding operations (CAFOs). The revised rule replaces 25 year old technology requirements and permitting regulations that did not address today's environmental needs and did not keep pace with growth in the industry. Effective manure management practices required by this rule will maximize the use of manure as a resource for agriculture while reducing adverse impacts on the environment.

The new rule applies to about 15,500 livestock operations across the country. Under the new rule all CAFOs were required to apply for a permit, submit an annual report, and develop and follow a plan for handling manure and wastewater. However, following a court challenge to the revised regulations brought by both industry and environmental petitioners, on February 28, 2005, the 2nd Circuit Court vacated the "Duty to Apply" and added the requirement that nutrient management plans (NMPs) must be submitted with the National Pollutant Discharge Elimination System (NPDES) permit application or notice of intent to provide for adequate public review. In addition, the court required the terms and conditions of the NMP become terms and conditions in the NPDES permit. EPA is currently in the process of revising the regulations to comply with the court decision.

EPA may approve states to run their own regulatory and permitting programs for CAFOs. If EPA has approved your state, the state is the permitting authority and will issue an NPDES permit for your CAFO. EPA has approved most states to run the CAFO program. Alaska, Idaho, Massachusetts, New Hampshire, New Mexico, and Oklahoma are states that EPA has not approved to run the permitting program for CAFOs. In those states, Tribal lands, and in all territories except the Virgin Islands, EPA is the permitting authority and will issue NPDES permits for CAFOs.

What are the CAFO Regulations?
For CAFOs and certain other industries, EPA has preset some of the minimum requirements that go into each permit in regulations called "effluent limitations guidelines" (ELGs). When the permitting authority issues a permit for your CAFO, it does not set your permit requirements on its own. Instead, it places the requirements of the ELGs directly into your permit. These requirements may consist of both limits on the amount of a pollutant that can be discharged (numerical limits called "discharge limits") and other ELG requirements (management practices and record-keeping requirements). Your state permitting authority may also set additional requirements that are needed to protect water quality or other requirements that apply under state or local law.

The ELGs for CAFOs include both discharge limits and certain management practice requirements. Note, however, that for most animal types, the ELGs for CAFOs apply only to large CAFOs. Permitting authorities will set effluent limitations for medium and small CAFOs on a case-by-case basis depending on the specific situation at the CAFO and based on the best professional judgment (BPJ) of the permitting authority. In many cases, those requirements may be similar to the requirements for large CAFOs.

The revised regulations focus on the CAFOs that pose the greatest risk to water quality. By regulating mainly large CAFOs and some smaller CAFOs that pose a high risk to water quality, EPA is regulating close to 60 percent of all manure generated by operations that confine animals.

Do These Regulations Affect Me?

These regulations apply to owners and operators of animal feeding operations (AFOs) that are CAFOs because they meet certain conditions. If your animal operation meets those conditions and discharges or proposes to discharge to waters of the U.S., it is regulated and you must apply for an NPDES permit.

All concentrated animal feeding operations, or CAFOs, are covered by these regulations. A CAFO is a specific kind of AFO. The regulations describe which AFOs are considered CAFOs. To be regulated as a CAFO, your operation must first meet the regulatory definition of an AFO.

An AFO is an animal feeding operation that meets both of these conditions:

1. The animals are confined for at least 45 days during any 12-month period.

   The 45 days of confinement do not have to be 45 days in a row, and the 12-month period can be any consecutive 12 months.

2. Crops, forage growth, and other vegetation are not grown in the area where the animals are confined.

   This does not mean that any vegetation at all in a confinement area would keep an operation from being defined as an AFO. For example, a confinement area like a pen or feedlot that has only "incident vegetation" (as defined by your permitting authority) would still be an AFO as long as the animals are confined for at least 45 days in any 12-month period.

For a facility to be a CAFO, it must first meet the regulatory definition of an AFO. A CAFO is an AFO that has certain characteristics. There are two ways for an AFO to be considered a CAFO:

- An AFO may be defined as a CAFO
  or
- An AFO may be designated a CAFO.

An AFO can be defined as a CAFO if it has a certain number of animals and it meets the other criteria contained in the regulations. The regulations set thresholds for size categories based on the number of animals confined at the operation for a total of 45 days or more in any 12-month period.

An operation is defined as a Large CAFO if it:

- Meets the regulatory definition of an AFO and
- Meets the large CAFO threshold for that animal type.

An operation is defined as a Medium CAFO if it:

- Meets the regulatory definition of an AFO;
- Meets the Medium CAFO thresholds for that animal type; and
- Meets at least one of the following two criteria (called "discharge criteria"):
  - A man-made ditch, pipe, or similar device carries manure or process wastewater from the operation to surface water
    or
  - The animals come into contact with surface water that runs through the area where they are confined.

The discharge criteria apply to only the parts of the operation where you confine animals, store manure or raw materials, and contain waste. For example, if you dig a ditch or install a pipe that drains water from your confinement area into a stream or lake, your operation would meet the first discharge criterion. Open tile

drains in the areas where animals are confined, wastes are collected and stored, or raw materials are kept also meet the first criterion if the tile drains carry pollutants from these areas to surface water. Your operation meets the second discharge criterion if a stream runs through the confinement area and the animals have direct access to the stream.

The second way for an AFO to be a CAFO is to be designated as a CAFO. If an AFO does not meet the definition of a large or medium CAFO but the permitting authority finds it to be a significant contributor of pollutants to surface waters, the permitting authority may designate that operation as a CAFO. To designate an AFO as a CAFO, the permitting authority must inspect the AFO and must find that the operation is a significant contributor of pollutants to surface waters.

EPA has set thresholds for operations that confine different kinds of animals. Thresholds are used with discharge criteria to determine which AFOs are defined as Large or Medium CAFOs and which should be designated as Medium and Small CAFOs.

How Do I Apply for a Permit?

You must get the forms you need to apply for an NPDES permit from your permitting authority. Under the federal NPDES regulations, there are two kinds of permits—general permits and individual permits. Each permitting authority adopts its own rules about what types of permits operations need, so you should contact your permitting authority.

An NPDES general permit has one set of requirements for a group of facilities. For example, all CAFOs or all poultry CAFOs in a particular area, such as an entire state or watershed within the state, might be covered under one general permit. The permitting authority sets the permit conditions, issues a draft permit, and requests comments from the public. The permitting authority makes changes to the draft permit based on the public comments and then issues the final permit. The general permit specifies what kinds of operations can be covered. Owners and operators of eligible operations may then apply for coverage under the permit.

Operators of CAFOs that are eligible for coverage under a general permit may notify the permitting authority that they want to be covered by submitting a Notice of Intent (NOI). If an NPDES general permit is available in your state and your operation meets the eligibility requirements, you must fill out an NOI and submit it to your permitting authority to apply for coverage under the general permit. The general permit will tell you how to apply for coverage and when your coverage will become effective.

An NPDES individual permit contains requirements specifically for one CAFO. You must apply for an NPDES individual permit if:

- A general permit is not available
- Your CAFO is not eligible to be covered under the general NPDES permit
- You want an individual permit, or
- Your permitting authority requires you to apply for an individual permit.

To apply for an individual permit, you must fill out either NPDES Forms 1 and 2B or similar forms required by your state. (Contact your permitting authority for the proper forms). You must complete the forms and submit them to your permitting authority.

When your permitting authority receives your permit application, it will use the information you have submitted to draft a permit for your operation. Your permitting authority will base your permit requirements on the unique conditions at your operation. After a public comment period on the draft permit, your permitting authority will modify the draft, if necessary, and then issue your final NPDES individual permit.

What Requirements Will my NPDES Permit Contain?

Your NPDES permit will say what you have to do to comply. Certain minimum requirements must be in every NPDES CAFO permit. Your permitting authority may include more than the minimum requirements in your NPDES permit. Read your permit carefully to find out exactly what you have to do to your CAFO.

Your NPDES permit will have four main sets of requirements:

1. Effluent limitations
2. Special conditions
3. Standard conditions
4. Monitoring, record-keeping, and reporting requirements

The CAFO regulations establish two special conditions that must be included in all NPDES CAFO permits and one additional condition for only large CAFOs. Your permitting authority may include other special conditions in your NPDES permit as well. Remember to read your permit to find out what you have to do, and contact your permitting authority if there is anything in your NPDES permit that you do not understand.

First special condition for all CAFOs: The terms and conditions of your nutrient management plan. If you own or operate a CAFO of any size your NPDES permit will contain the terms and conditions of your nutrient management plan. The goal of the nutrient management plan is to minimize your CAFO's impact on water quality. Your plan must describe the practices and procedures that will be implemented at your operation to meet all of the production area and land application area requirements that apply to your operation.

Second special condition for all CAFOs: Duty to maintain permit coverage. Every CAFO operator must maintain coverage under an NPDES permit until the CAFO is properly closed. In general, an operation is considered properly closed based on showing that there is no remaining potential for a discharge of the manure, litter or process wastewater that was generated while the operation was a CAFO. This condition applies to CAFOs that are closing down and to CAFOs that are downsizing or making other changes so that they will no longer meet the CAFO definition. If you are closing or downsizing your CAFO and your NPDES permit expires before the facility is properly closed or while the facility might still discharge CAFO-generated manure or wastewater you must reapply for an NPDES permit.

Additional special condition for large CAFOs: Transfer of manure, litter, and process wastewater to other persons. If you own or operate a Large CAFO, your NPDES permit will have a special condition for transfers of manure, litter, or process wastewater to other persons.

If you own or operate a large CAFO, and you transfer manure, litter or process wastewater to other persons, you must:

Give nutrient content information to the recipient. If you give away or sell manure, litter, or process wastewater from large CAFO, before the transfer you must give the results of your most recent representative nutrient analysis to the person who takes it away.

Keep records of your transfers.

These requirements apply no matter how much manure you sell or give away or who takes it.

What Is the Compliance Assurance Process?

For help in understanding the regulations, permitting process, and permit requirements, it is best to contact your NPDES permitting authority. Even if you do not have an NPDES permit, the permitting authority for CAFOs in your state can explain what the regulations are all about and whether you need an NPDES permit. You can find contact information for your permitting authority on EPA's Web site at www.epa.gov/npdes/afo/statecontacts

EPA can also help you understand the regulations and permitting process. You can find contact information about the regulations (including animal sector-specific brochures, frequently asked questions, and the text of the regulations) on EPA's Web site at www.epa.gov/npdes/caforule.

In addition, EPA plans to publish more information to help you use different technologies and management practices at your CAFO to comply with the regulations.

EPA's National Agriculture Compliance Assistance Center, or Ag Center has information on many topics, including best management practices, education and training, laws, and research.

EPA's National Agriculture Compliance Assistance Center
901 North 5th Street, Kansas City, KS 66101
1-888-663-2155
E-mail: agcenter@epa.gov
Web site: http://www.epa.gov/agriculture

Are Managed Onsite Wastewater Systems a Permanent Element of Wastewater Infrastructure or Can You Keep an Onsite Wastewater System Smelling Sweet?

A. R. Rubin
McKim and Creed
Cary, North Carolina

Infrastructure constitutes those essential services and functions necessary to support a society or culture. Historically we have considered the municipal water supply and wastewater system, the transportation network, the power grid and communication network as essential elements of infrastructure. These managed elements of our service infrastructure provide the underlying framework or foundation for protecting our collective well being. Onsite wastewater treatment systems have been utilized extensively for over 100 years and they too are a part of infrastructure if managed properly and professionally.

To develop sustainability of the onsite wastewater system as a permanent element of infrastructure we must begin with a basic change in our mindset, the mindset of the public served by wastewater systems, and by the elected and appointed officials supporting the development and proliferation of wastewater systems. Our challenge as managers is to assure:

1. Program Direction
2. Budget and operating capital available
3. Fiscal management adequate to sustain system
4. Maintenance Management
5. Operations Management
6. Project Management
7. Comprehensive planning
8. Management Review and Program Modification/Modernization

For many of these years, the system was considered a temporary system, destined to fail and to be replaced by municipal sewerage. The traditional onsite wastewater treatment system consisted of a tank followed by a soil absorption system. For many of these 100 years, little time was required to develop any innovation to the traditional system. This philosophy changed dramatically in the 1970s as the Clean Water Act Amendments recognized the value of innovative and alternative technologies to address serious water quality and public health issues.

To assure the sustainability of the onsite and decentralized system as a permanent element of the nation's wastewater infrastructure, those essential activities and practices listed previously must be implemented, operationalized, and sustained. These are not unique to the wastewater industry, but necessary in any activity/service considered an essential element of infrastructure.

To assure the sustainability of the industry, practitioners must continue to address:

1. Analysis of wasteflows and quality,
2. Evaluation of site and soil limitations and associated assimilative capacity,
3. Available treatment and dispersal technologies
4. Management Requirements
    a. Essential Management Issues
        1. Permanence
        2. Sustainability
        3. Indispensability

Wastewater Flow and Quality

Onsite and decentralized wastewater treatment systems were initially developed to accommodate the wastewater generated at small, rural homesteads. Today, onsite and

decentralized systems are utilized to treat wastewater generated in the traditional rural homestead generating 50 to 60 gallons per person per day to the trophy home containing over 10,000 square feet of living space, employing a cadre of service providers and generating thousands of gallons of water per day; rural businesses and industries, and community based systems generating many thousands of gallons per day.

Critical to the development of the on site wastewater system as integral to infrastructure is acceptance that these systems can cope with a wide range of waste volumes and qualities. Our task as managers, designers, installers and operators is to assure that the clients - the landowner and the elected officials responsible for the proliferation of onsite systems - are well acquainted with the management requirements of the system developed for a specific site.

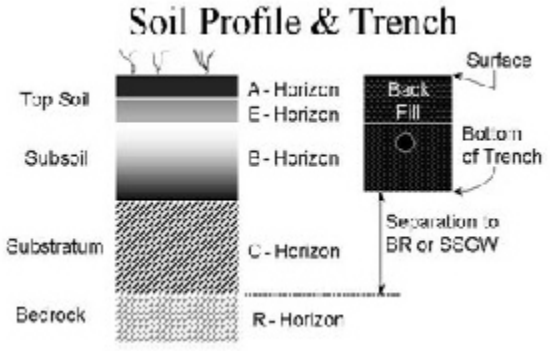
Site and Soil Assessment

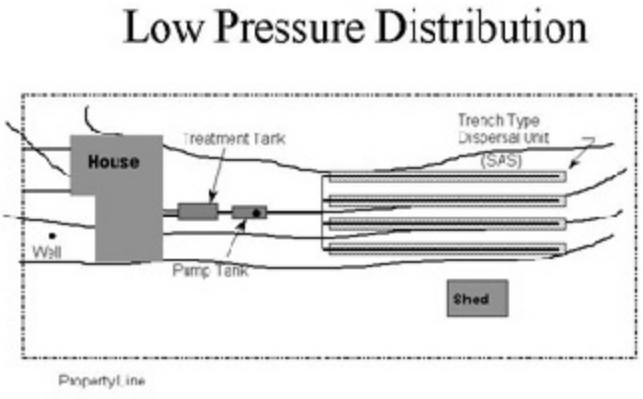
Throughout the country onsite wastewater management systems are commonly used in rural and urban fringe areas. Presently many state laws (see for example Virginia Department of Health, 12 VAC 5 or North Carolina Laws and Rules for Onsite Sewage Disposal, 15A NCAC .1300) allow a variety of onsite wastewater management options and alternatives. Prior to determining which of the options to utilize on any parcel of land, the local environmental health specialist accomplishes both a comprehensive analysis of the wastewater to be treated on the site and a site and soil assessment to determine the treatment potential of the proposed wastewater receiver. These analyses of the waste and the receiver are essential to assure that the system selected will protect public health, environmental quality, the homeowner investment in the property, local tax base and the community's image and investment potential.

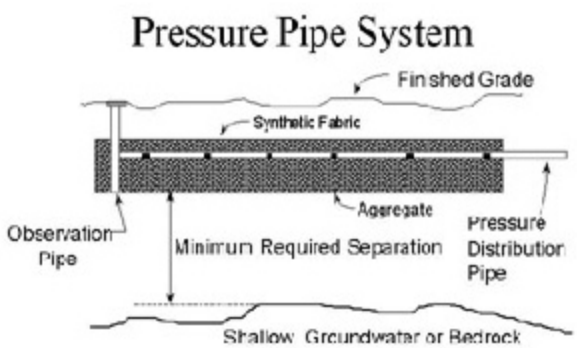
The site evaluation examines the area available on site for wastewater management, the slope and topography of the site, and the landscape position occupied by the property. This assessment is essential to assure that the property is sufficiently large to host the wastewater system and to insure that when installed, the onsite wastewater system is buffered adequately from wells, surface waters, and the adjoining property.

The soil evaluation is required to determine the soil properties deemed critical for a properly functioning soil absorption system. The properties evaluated include: depth to limiting layers or horizons (such as rock or shallow groundwater) on the site, soil texture and structure, mineralogy and consistence, the estimated permeability of soil on any receiver site, and whether the native soil is adequate to provide the necessary treatment of wastewater applied. Each of these factors is critical in the design process. For example, states have specific regulatory requirements addressing separation distance. In several states including North Carolina, wastewater which has been treated to secondary levels can be in as little as 6 inches of suitable soil.

The selection of the wastewater management option or alternative is dependent on maintaining the appropriate separation distance between the zone of waste application and any restriction that will reduce treatment capacity of a site. State and Local rules must be consulted prior to design and specification for any onsite wastewater treatment system.







Wastewater Treatment Options

Maintenance of these separation distances is important. Where soil is deep, a conventional or traditional gravity dosed soil absorption wastewater treatment system is often adequate. These traditional systems are typically placed in a 30 inch to 36 inch wide by 30 inch to 36 inch deep trench. The trench is typically filled with approximately 12 inches to 18 inches of gravel, expanded polystyrene, or a chamber type system all of which serve to support a trench type system and utilize gravity to facilitate the distribution of wastewater to the soil. Soil material is used to fill and close the trench. These traditional systems require a soil at least 42 inches in depth to maintain adequate soil cover over a system and adequate separation distances to a restriction. In some jurisdictions around the country, the soil depth required to install a traditional, gravity dosed wastewater soil absorption system is as much as 6 feet.

Where the depth of the soil is restricted, one of the pressure dosed options may be designated. The low pressure pipe (LPP) system was developed in North Carolina in the late 1970s and more recently drip/spray irrigation systems have been utilized extensively where soil limitations exist.

In areas where there are serious site or soil limitations, where the environment is particularly sensitive, or where there are sources of drinking water that may be impacted by onsite wastewater systems, some form of advanced treatment may be required before liquid is placed into the soil for final treatment and dispersal. In other instances, there may be no option available to repair an improperly operating onsite wastewater system than a mechanical treatment device. In either of these examples, aerobic treatment units or media filters may be employed to provide extensive pretreatment of the wastewater before it is placed in the receiver environment. In order for these systems to function properly for the life of the property, continuous, high level operation, maintenance, and management is essential.

These technically advanced wastewater treatment and dispersal systems will not function in a sustainable manner without a comprehensive management effort. Several states have now mandated essential management requirements associated with the use of advanced systems. Experience indicates that the management may be either public or private, but it must be performed by competent service providers. These requirements are contained in the USEPA Voluntary Guidelines for Onsite and Decentralized Wastewater Treatment (2003).

Management

All onsite wastewater treatment systems will require routine and recurring inspection, operation and maintenance, and management. In order for a county to issue a development or improvement permit which specifies one of these mechanically intensive options, a public or private, certified management entity must be available. This can be accomplished either as contract or service agreement with a private management entity or through an agreement with a county management entity. Both public and private management entities are operating in North Carolina and throughout the country. Recently the USEPA developed a comprehensive set of management guidelines which, although voluntary at this time, encourage local units of government to become much more involved in the management of onsite and decentralized wastewater management systems. These systems are a permanent part of the wastewater management infrastructure and they must be managed accordingly. The USEPA has proposed 5 levels of management for onsite and community wastewater treatment systems. Communities are strongly encouraged to examine management needs associated with onsite wastewater programs. Management will be necessary to assure any system is managed properly and in a sustainable manner. The technologies and management strategies are essential to develop this infrastructure.

Conclusions

Onsite wastewater treatment systems have been a part of the rural landscape for over a century. Since the early 1980s the use of these systems has resulted in development of millions of dwelling units throughout the country. On sites with few limitations, the conventional treatment and dispersal technologies of a septic tank and gravity dosed leach field are appropriate. In areas with site or soil limitations, degree of technology employed to address site and soil conditions becomes more complex. Today on-lot wastewater treatment facilities are capable of producing high quality treated liquid suited for unrestricted reuse. The levels of treatment required on a specific site and the associated management are the subject of the recent EPA Guidelines and Strategy statement concerning onsite and decentralized wastewater systems. The agency has concluded that these systems are a permanent element of infrastructure and must, like any element of infrastructure, be managed comprehensively.

Children's Health: Are Your Children at Risk from their Environment?

Lisa McKinley
EPA, Region 4,
Atlanta, Georgia

Children's Environmental Health (CEH) has been identified as one of the top priorities by the U.S. Environmental Protection Agency (EPA). Children are often more heavily exposed to toxins in the environment. Pound for pound, children breathe more air, drink more water, and eat more food than adults. Children's behavior patterns, such as playing close to the ground and hand-to-mouth behavior, increase exposure to potential toxics. In addition, children may be more vulnerable to environmental hazards; they are less able than adults to metabolize, detoxify, and excrete toxins due to developing body systems. Environmental risks to children include asthma-exacerbating air pollution, lead-based paint in older homes, and persistent chemicals resulting from multimedia exposures (air, soil, water) in a variety of settings. Environmental risks include cancer and reproductive and/or developmental changes.

The principal objective of the EPA Region 4 CEH Partnership is to develop capacity, enhance communication, and facilitate coordination of partnership states to reduce children's exposures to environmental health hazards. Efforts to reduce children's exposures to environmental health hazards consist of a variety of outreach efforts highlighting hazards, the effects of such hazards, and practical ways to protect children from exposure in home and school environments.

Beginning in 2000, EPA Region 4 Children's Environmental Health Program established a partnership with the U.S. Department of Agriculture Cooperative State Research, Education, and Extension Service (CSREES) through regional land grant universities to develop state capacity in children's environmental health. Land grant universities include: Alabama Cooperative Extension System—Auburn University, Clemson University, University of Georgia, University of Florida, University of Kentucky, Mississippi State University, North Carolina A&T State University, North Carolina State University, and the University of Tennessee. Through this partnership, EPA and CSREES have conducted educational activities to increase awareness of children's environmental health hazards. Education and outreach material addressing health hazards are being utilized and distributed in over 80 percent of the counties in the region via programming and special education efforts. Special efforts have included the promotion of Children's Environmental Health Month (October), which collectively reached over 17 million people via conferences, health fairs, and media programming. In addition to serving as an education and outreach resource, CSREES also provides compliance assistance for EPA's lead program in each of the partnership states.

Each of the partnership states has designated an extension professional, as listed on the proposal cover page, to serve as the state contact to promote children's environmental health activities. To further expand the level of expertise/resources for the promotion of children's environmental health, each state contact has established a state-specific children's environmental health State Working Group. State-specific working groups include representation from the state level organizations, including but not limited to the Departments of Agriculture,

Environment, and Health. Other examples of effective partnering include:

- Schools of Pharmacy. Cooperative efforts include addressing childhood asthma (three states have established this partnership).
- 1890 - Traditional Black Land Grant Institutions. Cooperative efforts include focusing on under-served audiences (seven states have established this partnership).
- Cherokee Indian Reservation. Cooperative efforts include the development of materials specific for Native American audiences. (NC has established this partnership).

Additionally, state-specific work groups include representation from local level organizations and movements.

EPA Region 4 CEH Partnership maintains regular contact via conference calls, electronic/hard copy correspondences, and regular meetings. An annual meeting/training is held each year to share the past year's accomplishments and determine the future direction of the program. Since 2001, annual meetings focusing on topics including but not limited to asthma, lead, mercury, mold, air quality, and safe drinking water have provided training to over 160 participants.

LPES Small Farms Fact Sheet Series

Mark Rice
North Carolina State University
Raleigh, North Carolina

Practical, science-based fact sheets developed for small-scale animal producers by 20 national experts from 12 land-grant universities, EPA National Ag Assistance Center, MWPS, and USDA-CSREES:
http://.lpes.org/Small_Farms.html

Introduction
Small-scale farms make up 92% of the farms in the United States. They contribute significantly to the nation's food supply and to local economies. They strengthen rural communities and contribute to a diverse and pleasing rural landscape.

Exceeding $100 billion annually, animals and animal products account for the majority of U.S. agricultural products. However, livestock and poultry farms, regardless of size, are facing increasing attention about the way they affect the environment. Many factors can affect a farm's impact on the environment. These factors include the animal type (kind), size, and number; the distance to water; the soil type; the weather; and the distance to neighbors.

Good stewardship is important for everyone, including small-scale farmers. Using best management practices can protect the environment. These practices can also improve the health and well-being of the animals and increase farm profits. The first step is to evaluate individual farm situations and then adopting best management practices suitable for each farm situation.

Purpose
The ***LPES Small Farms Fact Sheet*** series was prepared to inform the large, diverse population of small-scale animal producers about environmental stewardship and to equip the educators who advise them with appropriate information. With this information, producers are encouraged to practice environmentally sound management with the goal of increasing the success of their animal operations.

Producers may prefer to use the ***Small Farms Fact Sheet*** series as a reference guide, viewing the online PDF files of each fact sheet at www.lpes.org/SmFarms.html The PDF files can also be printed or downloaded for future reference. These files can be accessed at no charge.

Educators may choose to purchase unlimited access to the MS Word files. By purchasing access to the materials, they can download the files and modify them to meet their specific educational needs.

At present, the series consists of seven completed fact sheets that can be printed as is or modified. Two of these fact sheets are being translated into Spanish, and additional fact sheets are being prepared.

Currently available fact sheets include:

1. Small-Scale Farmers and the Environment: How to be a Good Steward
2. The ABCs of Pasture Grazing
3. Manure on Your Farm: Asset or Liability?
4. Protecting the Water on Your Small Farm
5. Managing Animal Deaths: Your Options
6. Got Barnyard and Lot Runoff?
7. Good Stewardship Practices for Horse Owners

Summaries of Each Fact Sheet

1. Good stewardship is important for everyone, including small-scale farmers. Using best management practices can protect the environment. These practices can also improve the health and well-being of your animals and increase your farm's profits. The first step is to evaluate your farm. By adopting management practices suited to it, you can protect your investments as well as the environment.

2. Well-managed pastures are Always the Best Crop for the environment, for the grazing animal, and for you. A well-managed pasture is a dense, healthy crop of grass and legumes that can provide a security blanket for the land, good nutrition for the animal, and more money in your pocket. Achieving a well-managed pasture does not take a big investment. It does require animal and plant knowledge, identification of your goals, some equipment, and practice.

3. If farm animals spend any part of the year in barns, stalls, pens, loafing areas, or feeding areas, you will need to deal with manure from those areas. What do you think about that manure? Do you view it as an asset? Or, do you see that pile as being a liability? This fact sheet compares the value of different types of manure as sources of nutrients and organic matter. It describes how to make manure on your farm an asset rather than a liability.

4. Groundwater such as wells and surface water such as streams and ponds are important sources of water for drinking and recreation in the United States. In recent years, reports of bacteria, nitrogen, chemicals, and other pollutants in groundwater and surface water have increased concern about its quality. What causes water pollution? This fact sheet answers that question and discusses ways to protect water quality.

5. Animals routinely die on a small farm. Selecting a method of disposing of them is an important decision because it affects animal and human health. Factors that should be considered include the number of dead animals, use or destruction of the nutrients contained in the dead animals, farm location, soil type, labor available, cost, and availability of alternative options. Planning and preparing for animal deaths, including deciding on the best method to use, developing the best setup, and ensuring that it meets local and state regulations, is very important.

6. Uncontrolled runoff can contain nutrients and runoff from manure. If allowed to enter nearby surface water like rivers and ponds, it can cause significant harm. This fact sheet discusses ways to prevent or reduce the possibility that runoff from barnyards and open lots will pollute the surrounding environment.

7. This fact sheet provides a brief overview of some good soil and water stewardship practices for horse owners. It focuses on basic pasture and paddock management and on manure management. Two manure treatment options, composting and fertilizer nitrogen enhancement, are presented along with a method to calculate the proper manure application rate on pastures and crops.

New Fact Sheets Under Development

Small-Scale Farmers and the Environment: How to be a Good Steward (Spanish translation)

The ABCs of Pasture Grazing (Spanish translation)

Nutrient Management Basics

Managing Runoff from Open Lot Livestock Facilities with Vegetative Systems

The ABCs of Livestock Watering Systems

The ABCs of Livestock Fencing

Manure Management for Small Swine Farms

Modified Dry Litter System for Small Swine Farms

Animal Waste Management in Tropical Island Environments

Small Farms Fact Sheet Team Members
A national team of 20 subject matter experts from 12 land-grant-universities, the EPA's National Ag Assistance Center, MWPS, and the USDA CSREES collaborated in the development of the *Small Farms Fact Sheet* series.

Project Co-Leaders
Mark Rice, North Carolina State University
Ben Bartlett, Michigan State University

Project Manager
Diane Huntrods, MWPS, Iowa State University

Project Members
Charlie Abdalla, Pennsylvania State University
Roy Bullock, Tennessee State University
Craig Cogger, Washington State University
Denis Ebodaghe, USDA CSREES
Carl Evensen, University of Hawaii
Carol Galloway, EPA National Ag Assistance Center
Doug Hamilton, Oklahoma State University
Joe Harner, Kansas State University
Joe Harrison, Washington State University
Chris Henry, University of Nebraska-Lincoln
Frank Humenik, North Carolina State University
Jimo Ibrahim, North Carolina A&T State Univeresity
Randy James, Ohio State University
Rick Koelsch, University of Nebraska
Ginah Mortensen, EPA National Ag Assistance Center
Marion Simon, Kentucky State University
Glen Fukumoto, University of Hawaii
Jill Auburn, USDA CSREES
Mark Risse, University of Georgia
Tommy Bass, University of Georgia

Obtaining Small Farms Fact Sheets
The fact sheets can be obtained at the LPES website: http://www.lpes.org , under the "Educational Products" button. PDF or Word files are available. The PDF files are accessible free of charge; the Word files, suitable for modification, can be downloaded for a one-time fee of $35.00. Both MasterCard and Visa are accepted.

For More Information
Contact Mark Rice, project co-leader, NCSU
E-mail: **mark_rice@ncsu.edu**
Phone: 919-515-6794

Finally, Revenue Insurance for Small Farm Families

Thomas R. McConnell
West Virginia University
Morgantown, West Virginia

There are five types of risk that farm families face. Human risk is related to the personal aspects of agriculture like, retirement and health and health insurance and the effect agriculture has on them. Our effect (real or perceived) on the environment is becoming more contentious every day and is recognized as risk for farm families. The fact that our society is becoming more litigious and that our trading partners operate at greater distances every day makes recognizing and managing legal risk more important. The last two types of risk - production and marketing- have long been identified as the only risk farm families face. The majority of the current risk management tools reflect that.

However, farm families must first learn to recognize the risk in their lives and then explore every opportunity to manage and minimize risk. Luckily, today there are many risk management strategies and tools available. That's good because every operation is different and every family's set of resources, needs, and desires is different too.

The agriculture service industry including the USDA have developed many tools to help farm families minimize risk and many individuals have developed and adopted both management and production strategies that are important, too. They might include crop diversification or simply an irrigation system. Some farmers may choose to specialize in one enterprise and be as efficient and aggressive as possible where another may choose to add value or diversify within their segment of the industry. An example might be pre-conditioning feeder calves or feeding your cattle to a finished weight and marketing them to townspeople and neighbors. Others may diversify to another enterprise that is completely different like sheep and a market garden; where two enterprises do not follow the same market structure, peak labor needs, or demand curves. Each of these examples is normally profit driven rather than risk inspired, but the end result is the same that these options allow farm families to spread their marketing and production risk. Many farmers have engaged in production contracts and yet others have simply added a hay wrapping system to eliminate harvest (production) loss. There are many, many risk management strategies being used every day by many, many different farm families that are specific to their needs. These strategies for managing risk could be classified as pro-active, as requiring increased marketing and production knowledge and effort.

One other strategy available to farm families is buying crop insurance. This is classified as passive risk management where after the policy is put in force the insured has very little else to do, except report to the insurance agent. Many of the early developed crop insurance products insure against production risk and others against market risk. And now a new type of policy called Adjusted Gross Revenue-Lite can insure the family against decreases in gross revenue is available.

It's important to mention that a mix of pro-active and passive strategies would allow the manager the broadest risk management protection. Meaning crop insurance should be added to the overall risk management program because a well understood crop insurance policy may cover all the unknown and un-anticipated events, as well as, the unintended consequences of non-related events that happen to farm families throughout the production and marketing season.

Most small and diversified farm families have no experience with crop insurance as there have never been products available to match the agriculture they have. But that changed when the Federal Crop Insurance Corporation released a new policy- Adjusted Gross Revenue –Lite. It is now available to farm families in CT, DE, ID, MA, MD, ME, NH, NJ, NY, RI, VT,WV, AK, NC, OR, WA, and VA. The problem is farm families are limiting their risk management options by not taking the time to learn about this valuable tool. Many different types of operations can attain protection against declines in their adjusted gross revenue at an affordable price by using the AGR-Lite crop insurance tool. You owe it to your family to carefully study Adjusted Gross Revenue – Lite.

Grass based animal and vegetable, fruit, and vegetable, operations (including organic) appear to have found a special niche with Adjusted Gross Revenue-Lite as premiums are affordable considering the level of coverage and just what is required to file a claim. The policy provides insurance against loss of revenue from any unavoidable natural peril or market fluctuation that causes a loss in revenue. Let's review the facts.

AGR-Lite

Insures against decreases in gross revenue of the farm based on a 5 year average from the 1040 Schedule F
Based on the level of diversification, farm families may buy different levels of coverage to protect their gross farm income that range from 65 to 80% and at different payment rates of either 75% or 90%
The plan provides protection against low revenue due to unavoidable natural disasters and market fluctuations that affect income during an insurance year.
The government will pay a portion of the premium for the AGR-Lite policy that ranges between 48% and 59% based on the level of protection.

How it works: Small vegetable operation example:

Let's assume your market garden has an adjusted gross revenue of $17,100 per year based on a five year average. Let's also consider that your family depended on the profit from this revenue to be added to it's off- farm income. You could buy coverage to insure 80% of the adjusted gross income at a "90 cents on the dollar" payback option. The premium for this coverage level at this gross revenue would be $340 (There is variation of premium between states and counties within states)

Continuing with the example let's assume that because of a drought the market garden grossed only $5000 for this insured year. What would happen? Without the insurance, the operation would obviously gross $5000. But with the AGR-lite coverage at the 80% level and a 90% payment rate the gross revenue would be different. First the farmer would receive the $5000, and then the additional would be derived from the following breakdown. Eighty percent of the difference between his coverage level and his actual gross income would be calculated as follows:

1. Coverage level = $17,100 X 80% or **$13,680** called your target income

2. Target Income $13,600 minus the actual gross income of $5,000 equals **$8680** which is called the income deficit.

3. The indemnity payment is derived by multiplying the income deficit by the repayment rate of $0.90. In this example the computation would be $8,680 times $0.90 equals $7,812 when added to the original $5000 would gross the family $7,812 plus $5,000 or **$12,812**.

So, in this case, the family has insured 80% of their gross income at a $0.90 on the dollar payment rate for a premium of $340. Every individual situation is different as there is variation between counties and

enterprises. Also, the family has insured gross revenue levels not profit. This means though, that for operations like vegetables where the margins are generally higher than for livestock enterprises by insuring 72% of the gross revenue **the family has indeed insured a profit!**

Considering even larger operations using the same crop mix but considering a higher gross revenue of $100,000 and the coverage level of $72,000 the premium was $2,074. That makes sense for a high margin crop and the premium is considered an allowable expense by the IRS.

But if a dairy family was considering this risk management strategy the scenario would appear to be similar, but the nature of the business would cause the manager to take a closer look. The premium for a small dairy with an adjusted gross income of $90,000 and a 75% coverage level with a 90% payment rate is calculated at $2,488. That means that family can buy protection for $60,750 of their average gross revenue of $90,000. As their gross revenue falls below $67,500 the insurance company will pay an indemnity of $0.90 on each dollar below the target. The manager must understand two points about this product and its relationship with a dairy operation. First, since this is revenue insurance; what happens when the feed supply is reduced because of dry weather and the manager buys extra feed to get the cows and replacement through the winter? The answer is, considering the AGR – Lite indemnity nothing. Because this policy insures only the gross revenue not the increased expenses associated with buying feed crops (another policy may be available for the feed crop protection-but not all feed crops have a back-up policy) that reduced profit experienced by the droughty farm. So, replacement feed prices will not be covered, while low milk prices will affect the gross revenue and, if severe enough, qualify the policy holder for an indemnity payment. Obviously the farms that raise all their feed or those that graze and thus have less dependence on purchased feed will be able to consider this opportunity with more enthusiasm. Secondly, unlike the vegetable operations, dairy farm margins are slim and the policy holder cannot insure a profit. This is not to say that this type of policy cannot help with financial commitments and add to the farm's financial stability. It should be considered by every family farmer.

To get started each farm family must evaluate their operations from a risk management point of view and determine what the effects of a major reduction in income would mean. If the family farm income were reduced by 30% would the family have enough money to buy food and could they buy insurance? If the average gross income were reduced by 25% could all the bills be paid? Would there be enough money to pay all the lenders? The list of financial responsibilities of each individual farm can grow after this consideration is given serious study. Next the family should factor in the bottom line with and without an AGR-Lite indemnity. To complete the analysis call a crop insurance agent. All this information including the location of insurance agents and the rate calculator can be accessed on the Risk Management Agency website at http://www.rma.usda.gov

If you live in a state that does not offer AGR-Lite and you want to change that; there is a process that can be followed. First the interested party should appeal to their State Department of Agriculture to apply to the Pennsylvania Department of Agriculture at 717-772-3094 (they own the policy) to start the process. The Federal Crop Insurance Corporation will approve the policy application after the state that is applying has gathered much information so the product may be "rated" for use in that particular state.

Constructing Small Farm Enterprise Budgets

Shannon Potter
Maryland Cooperative Extension
Easton Maryland

Objectives

- What are enterprise budgets
- Why use enterprise budgets
- How to design your own budget for a new enterprise
- Budget tips

What are Enterprise Budgets?

- Enterprise budgets
  - An organized listing of your estimated gross income and costs which can be used to determine the expected net income for a particular enterprise
  - Budget on a per unit basis – 1 acre or 1 animal
  - Sections include
    - Income, Costs, Profit

What are Enterprise Budgets?

- Traditional Crops
  - Very common
  - Very detailed, more accurate
    - Livestock
  - Dairy
  - Beef
- Forages
- Specialty crops and livestock
  - Less common
  - Less detailed, less accurate

Who can use these budgets?

- Agricultural producers
- Extension specialists
- Financial institutions
- Governmental agencies
- Advisors of food and fiber

Budgets are used for:

- Itemize the receipts (income) received for an enterprise
- List the inputs and production practices required by an enterprise
- Evaluate the efficiency of farm enterprises
- Estimate benefits and costs for major changes in production practices
- Provide the basis for a total farm plan
- Support applications for credit
- Inform non-farmers of the costs incurred in producing crops
- Not an exact science – Difficult to estimate drought, disease etc….

6 Parts of a Budget

- Investment
- Gross Income
- Variable Costs
- Fixed Costs
- Net Income

Budget Suggestions

- Should be prepared with specific objectives
  - Markets, establishment, soil types
- Receipts and costs are often difficult to estimate
  - Numerous, variable ie rent land
  - Be sure to have a column of your estimates
- Should contain receipts for every product and by product – processing, stalks etc
- Prices used should reflect market values and productivity of enterprise resources – i.e. land, labor, equipment

Cost Components

Variable costs –

These are expenses that vary with output within a production period

- Feed
- Marketing
- Fuel
- Fertilizer/Lime
- Disease/Insect control

Variable Costs

Some costs are easy to estimate

Seed, fertilizer, and chemicals

Some costs are more difficult

Labor, repairs and machinery

Cost Components

Fixed Costs

Fixed costs are expenses that do not vary with the level of output.

- Building costs
- Machinery costs
- Taxes
- Insurance
- Mortgage

Fixed Costs

These can also be difficult

Fixed costs need to be allocated over each enterprise

Vary because size, new, used, field operations

Land should be valued

Income (receipts)

Determine yield goals

High, medium and low

Prices

High, medium and low estimate

Net Income (=Income-Cost)

Income over variable costs

Income over variable and fixed costs

Decision making time….

Tracking Enterprise Costs

It is important to know the cost of each enterprise you have year to year

Can be by grain/livestock or tomatoes/peppers

This can easily be tracked in record keeping software

Resources http://www.agnr.umd.edu

FS-545 - Enterprise Budgets in Farm Management

Risk-Assessed Business Planning for Small Producers

Marion Simon and **Louie Rivers, Jr.**
Kentucky State University
Frankfort, Kentucky
Daniel Lyons
North Carolina A&T State University
Greensboro, North Carolina
Nelson Daniels, Allen Malone and **Jeff Kock**
Prairie View A&M University
Prairie View, Texas

The Association of Extension Administrators' Small Farm Task Force under the leadership of South Carolina State University received a competitive USDA-CSREES Risk Management National Project to develop an educational curriculum on risk management for low literacy and small farmers. In 2002, this project was revised with Prairie View A&M University (responsible for the development of educational materials), North Carolina A&T State University (responsible for facilitating the project), and Kentucky State University (responsible for education, promotion and dissemination of the materials to 1890 Land Grant Extension Programs) as the collaborators, and the USDA-CSREES National Program Leader for Farm Business Management and the Southern Region Risk Management Education Center (SRRMEC) as advisors. This team chose to subcontract with Texas A&M University to convert the Texas Cooperative Extension's "Tomorrow's Top Agriculture Producer" educational materials to a manual suitable for small farmers, low literacy farmers, and 1890 Extension Programs. Prairie View A&M University worked closely with the Texas Cooperative Extension Service to develop the materials. The resulting manual is entitled "Risk-Assessed Business Planning for Small Producers." The Risk-Assessed Business Planning for Small Producers manual targets small farmer education needs including: 1) alternative farm enterprises, particularly vegetable and livestock enterprises; 2) low literacy educational materials, particularly for farm financial management decisions; 3) cooperatives, farmers markets, direct marketing, and marketing issues; 4) issues related to minority farmers; and 5) risk management education including production and marketing risks. It includes theory, lesson plans, overheads for teaching, and a case study farm.

Justification:

Agriculture varies throughout the states that have 1890 Land Grant Institutions. Ranging from small farms on the eastern seaboard, through the Appalachian and Ozark mountain regions, the Mississippi River delta, the Gulf states, to the Southwest, agriculture crosses highly erodible, karst areas, to productive flatlands, to forestlands and woodlands, to rangelands and prairies. Temperatures, rainfall, and humidity range from the colder, temperate Northeast, through areas with excellent rainfall and water resources, to the sub-tropical areas of Florida, to areas known for heat, drought, rapidly decreasing water resources, and near desert conditions. The agricultural enterprises in the region are quite diverse. Enterprises range from forages, and traditional row crops including rice, cotton, tobacco, peanuts, grain sorghum, wheat, corn, soybeans to beef and dairy cattle, hogs, sheep, goats, horses, aquaculture, bees, and wildlife, and other livestock; forestry and agroforestry to urban forestry, nurseries, and wood/forest

products; and the vast diversity of horticulture crops from apples, grapes, oranges, and other fruit crops to flowers, vegetables, turf grasses, and ornamentals. Evaluating the different climates, topographies, soil types, natural resources, and the vast range of enterprises, make 1890 multi-institutional collaboration in the agriculture area both a critical need and a major challenge.

The region's demographics show rapidly expanding diversity among its agricultural population. The region is historically known for its concentration of African-American farmers. However, it has rapidly expanding populations of Hispanic/ Latino, Middle Eastern, and Asian immigrant farmers, along with populations of Native-American farmers. The region has high percentages of women, tenant/ share-cropping, and part-time farmers. The region includes the historically lowest income, lowest literacy/educational attainment populations in the mainland U.S., most notably Appalachia, the "Ozarks," the "Black Belt," and Native-American tribal nations. The rapidly growing areas of immigrant farmers, particularly the Rio Grande Valley and southern Florida, are becoming low income/low literacy areas with language challenges and/or barriers. Small farms comprise significant percentages of the farms in the region. The region has the top five states in the numbers of small farms and the contributions of small farms to their state's economies. The numbers of small farms, the diversity of the farming populations, combined with the lowest literacy and income regions of the mainland U.S. and limited or non-English speaking populations, make the need for Extension small farm educational materials, particularly low literacy materials, and the multi-state sharing of experience and expertise of paramount importance for 1890 Small Farm Extension staff.

Because many small farmers targeted by 1890 programs produced government supported crops that were coming under political scrutiny, particularly tobacco, rice, cotton, and peanuts, risk-assessed farm planning is critical. These farmers, farm owners, and farm operators, were at risk of losing their primary, or only, source of farm income. Within these states, Extension staff needed to look at the many facets of risk management, i.e., marketing, financial management, farm management, production, alternative farm enterprises that were appropriate and affordable, enterprise diversification, value-added, farm safety, insurance for commodities and families, farm family health and stress management, and impacts on local communities and economies. In August of 2002, Dr. Don West (USDA-CSREES National Program Leader), Mr. Nelson Daniels (Prairie View A&M University, collaborator), Dr. Marion Simon (Kentucky State University, Project Developer/ Writer), Mr. Louie Rivers, Jr. (Kentucky State University, collaborator), Dr. Daniel Lyons (North Carolina A&T State University, Project Director), and Dr. Kenneth Stokes (advisor and Director of the Southern Region Risk Management Education Center, SRRMEC), met at Kentucky State University to outline the initiative.

Objectives

Objective 1**:** Small farmers make informed risk management decisions and plans for their farms thereby stabilizing their farm's net income.

Objective 2**:** 1890 Extension professionals and paraprofessionals have a uniform, system-wide curriculum for teaching risk management education to a diversity of small farmers, with a particular emphasis on low-literacy farmers.

Objective 3**:** New linkages and collaborations are developed within the 1890 Extension System.

Objective 4**:** 1890 professionals and institutions become more visible in the risk management area.

Objective 5**:** 1862 and 1890 Extension staffs use the curriculum in teaching small farmers.

Outlined Overview of the "Risk-Assessed Business Planning for Small Producers" curriculum manual

Risk-Assessed Farm Business Planning

Farm business planning develops a roadmap for the management of the operation that helps all parts of the farm to flow smoothly.

The Roles of Farm Business Planning are:

- Identify farm goals
- Inventory the farm resources
- Assess the farm business & its environment
- Analyze its past performance
- Decide on actions (What to do now)
- Implement strategies (How will you do it)
- Evaluate the farm plan (Is it working)

Step 1: Identify the Farm's Business Goals: SMART

- Specific (in what it is),
- Measurable (it can be measured and proven),
- Attainable (realistic),
- Rewarding (it moves the operation along its expected path, and
- Timely (there is a time limit to reach the goal).

Step 2: Create the Farm's Resource Inventory

- Human & Personnel
- Soils, topography, water, annual rainfall, land, buildings, fences, farm map
- Equipment
- Animals & Wildlife
- Crops
- Financial Resources

Step 3: SWOT Analysis

- Internal Strengths of the operation
- Internal Weaknesses of the operation
- Opportunities - the External business environment
- External Threats to the operation

Step 4: Farm Business Transactions

- Transactions are exchanges of resources
- Cash or Non-cash
- Inflows into the operation or
- Outflows from the operation
- For the Farm business or Personal
- Lead into Income Statement & Balance Sheet analysis

Step 5: Cash Transaction Logs for Farm Activities:

- Profit Centers: Where direct costs and returns are recorded by enterprise for products sold in the production year, i.e., cow enterprise-sell weaned calves; fresh market sweet corn enterprise
- Support Centers: Where cost are compiled to be allocated back to the enterprises, i.e., tractor fuel, finance charges, labor, rent
- Cost Centers: Where the product is not sold in the production year, i.e., cow enterprise-sell stocker calves

Step 6: Information from the Transaction Logs are used for financial analysis:

- Income Statements
- Balance Sheets
- Cash Flow Statements
- Financial Ratio analysis
- To determine the farm's financial position

Step 7: Enterprise Budgets from Transaction Logs show full cost accounting

- Income potential for the commodity
- Its Variable costs
- Its Fixed Costs
- Its Expected Net Income
- Its contribution to the farm

Step 8: Evaluating Market Alternatives

- Farmers Markets
- Roadside Stands
- Cooperatives
- Retail Markets
- Brokers
- Livestock Auctions
- Retained ownership
- Video/Tele-auctions

Latino Farmers: Characteristics and Risk Management Education Programs in the Midwest

José L. García
University of Missouri-Columbia
Columbia, Missouri

Introduction

The efforts of the Community Food Systems and Sustainable Agriculture Program of the University of Missouri are to increase the number of Latino producers using Risk Management tools and products. We wanted to share with the audience and readers our experience in planning and conducting three workshops on managing risks of production, marketing, financial, and legal, as well as the use of computers on the farm to manage risks. Additionally, we organized a visit with Latino farmers to the Southwest Center experiment station of the University of Missouri to see examples of risk management strategies on production and marketing on the field. We discuss the accomplishments and challenges that emerged in planning and conducting workshops and the strategies used in overcoming them. We also pointed out ideas and approaches in working with non-traditional audiences on risk management education. Finally, we are using the workshop experience to address the issue of a better understanding of Latino farmers and their needs with our partners in Extension within the states and federal agencies.

Demographics and trends

The nation has experienced a steady growth of Latino farmers in the last decades. According to Agriculture Census Data, Latino farm operators increased from 20,956 in 1992, to 33,450 in 1997, and to 72,329 (up to 3 operators/farm) in 2002. On the other hand, the U.S. lost over 86,000 main stream farmers between 1997 and 2002. In the 12 states of the North Central Region of the Sustainable Agriculture Research and Education Program (MO, IL, IN, IA, KS, MI, MN, NE, ND, OH, WI, SD) there were 3,636 Latino farms in 1997. That number increased to 7,246 in 2002 (up to 3 operators per farm) operating 2.6 million acres. Missouri, in particular, has experienced an 87% Latino producers increase from 266 in 1992 to 444 in 1997; and by 2002 the number was close to 1,000. Despite the increase in numbers, it is apparent that Latino producers are often isolated and unaware of state and federal services and programs.

A report of the Natural Resources Conservation Service of USDA (Buland & Hunt) identified various trends in Latino operated farms including:

- Numbers are increasing faster than other demographic groups.
- Average sales increased faster than most groups.
- Latino farmers with less than 5 years on the present farm have increased steadily.
- But many have not been on the farm long enough to establish long-term relationships with USDA-programs.
- Distribution of Latino farms went from a regional to a national phenomenon.
- 589 counties counted Latino farms in 1982. It changed to 1,775 counties in 1997
- There were 2,289 rural counties with a Hispanic presence in 2000 (Kandel & Cromartie, USDA-ERS).
- USDA program participation is low

Issues Impacting Latino Producers

Latino farmers not only face the same issues that their main stream peers face, but also additional, more "distinctive" challenges. In a survey conducted in 2004 in Missouri, we concluded:

- Latino farmers have little or no awareness about (and access to)

services and programs (federal, state, extension).
Latino farmers have a diversity of backgrounds and different needs. Their major concerns about farm and family include production, marketing and financial risks.
Agencies and Extension are hardly aware of Latino producers' needs.
Latino producers may be less organized than other groups.
Latino producers are harder to count because of little use of federal and state services, low response to agriculture census surveys, and different perceptions of what makes a Latino/Hispanic farmer.

In another survey conducted in Michigan, some obstacles for Latinos to farming were:

Purchasing a Farm (access to loans and capital) is a major issue.
Infrastructure Development
Technology Availability
Familiarity with Crops
Language and Culture
Participation in USDA Programs

University of Missouri Extension Programs Supporting Latino Farmers

University of Missouri Extension has various programs and projects that support Latinos and other minorities in Missouri and partners with other higher education institutions to assist and educate minorities connected to agriculture. The University's Community Food Systems and Sustainable Agriculture (CFSSA) Program serves Latino and other minority producers with training, education, information, and technical assistance in all aspects related to sustainable production and community food systems.

CFSSA launched new initiatives to serve Latinos in agriculture in 2004. One of them is the "Empowering Latino Producers Through Risk Management Education" Project funded by the North Central Risk Management Education (NC-RME) Center.

Latino producers are generally isolated from state and federal agricultural services, have no visibility, are not organized and have no political or economic leverage; hence are more vulnerable to financial and production risks than the main stream producer. In talks with agencies and Latinos in various regions of Missouri, it was apparent that Latino producers are not targeted by USDA or state programs, services, or even known by other Latinos. Information about Latino producers is minimal and exists mostly as data tables in the agriculture census website. Risk management needs, business and financial planning, production practices and farm and family priorities among many others are examples of areas not studied/researched by agencies and universities.

A typical Latino producer in Missouri operates on small to mid size scale, is not usually connected to services, nor is a member of producer organizations. Further, his or her relations to other Latino or main stream producers may be limited and because of these disconnections and relative isolation, the risks on his or her farm and family are greater than on a main stream producer. The workshops represent the opportunity to access information and education on topics of interest on their farms and families. Challenges such as language barriers and cultural differences that may prevent the targeted producers to participate in this educational opportunity have been addressed.

Objectives of the project

The outcomes of this project are expected to be Latino producers with an increased awareness, a new attitude, and a change of behavior towards the need of risk management for their farms and families. The Community Food system and Sustainable Agriculture (CFSSA) Program set the following objectives for this project:

Latino farmers will increase their awareness and interest in risk management tools.

Latino farmers will begin using risk management tools/programs including production, financial, legal, and human short after the project activities are completed. Latino farmers are more confident with the regional risk management agents and agricultural business extension educators, and better articulate their needs and interests.

Approach and methods

The project has organized three one-day bilingual workshops on risk management tools and products, and a visit to a model dairy farm (the Southwest Center) of the University of Missouri. Topics at the workshops included recognizing and assessing economic and marketing risks for the farm, financial resources and analysis, insurance products, and how to use computers to help manage risk on the farm. We encouraged through the workshops to set up individual meetings between producers and agriculture business specialists or insurance agents to discuss risk management tools/products and prepare risk management plans for the family.

Qualified extension agriculture business specialists have collaborated facilitating the risk management portion. The project director, José García, has been the language and cultural liaison between facilitators and the Latino producers. CFSSA has partnered with state wide grass roots organizations, the Missouri Farmers Union and the Social Concerns Office of the Diocese of Jefferson City to publicize the workshops and disseminate the risk management materials.

CFSSA staff will follow up and assist with further information and referrals a few months after the workshops. The project can be expanded to Latino producers in the same and other regions and new workshops could address additional risk management issues for Latino farmers.

The success of the project will be measured by the increase in Latino farmers understanding and using risk management tools and products. The project has used (and will continue to use) pre-test and post-test tools, phone and email communications with participants and instructors as means of verification. Finally, it is expected that this project will help extension and insurance agents be aware of Latino producers' needs and offer appropriate programs and services.

Challenges and accomplishments

Organizing and conducting the workshops for Latino producers have proved to be a challenging and rewarding experience. Some accomplishments were:

Workshop topics were well received
Knowledgeable presenters
Positive evaluations
Bilingual workshops and materials
Interest in more training and additional meetings/materials

We also faced some challenges that made us realize the complexity of serving an underserved population. The most important challenges were:

Low turn out
Competing with farm activities
Hard to persuade farmers to go far away from home and overnight
Low interest in establishing a network
Simultaneous interpretation

Final thoughts

Although the project hasn't finalized yet, we believe that the training provided had a positive impact on Latino farmers. Two additional workshops on risk management are being planned and, if funding allows, another farm visit. Furthermore, because of the importance of the project and the potential impact on Latino farmers, we will develop (with funding from the North Central Risk Management Education Center) a "Business Planning Guide" in English and Spanish for minority producers in 2006.

The Movable School Approach to Farm Futures (Ethiopia's Teff)

Edgar Hicks
Kansas Black Farmers Association
Nicodemus, Kansas

Many farmers market their grain production at harvest with no underlying knowledge of any of the discovery factors that make up their farmgate price. They also may not understand the relationship in grain marketing between cash and futures (basis) which is a party to every contract made with a commercial grain company. For black grain farmers the penalty for this lack of marketing nomenclature has been traumatic.

This presenter was introduced to agriculture by summer visits during high school to grain and cotton producers in the U.S. Department of the Interior's National Heritage Area of Cane River, Louisiana. After a thirty year career with international grain firms there was a desire to share the acquired grain marketing experience with high school families. Unbelievably, none of the Cane River families are currently engaged in farming!

The only remaining black community of farmers in the Midwest is Nicodemus, Kansas, and Kansas is without an 1890 Land-Grant Institution. Inspired by reading the 1936 book published by The Tuskegee Press, The Movable School Goes To The Negro Farmer, the idea for incorporating the names of Booker T. Washington and George Washington Carver into sustainable price risk management format was incubated.

Recognizing the colloquialism of early 1900s, there seems to be a useful place at the table today for the spirit in which Thomas M. Campbell (the USDA's first extension agent) wrote his biography.

The KBFA feels price *risk management education* (RME) should draw from some part of the following Campbell historical commentary (page 82):

"Let us now consider the first annual Negro Farmers Conference, which was held in February, 1892, and out of which grew the present agricultural extension work among Negroes.*

*To Dr. Washington's surprise this first conference brought five hundred farm people to Tuskegee Institute. To this gathering many came afoot. Great numbers, in order to be on time for the opening session, left home as early as midnight prior to the meeting, in various types of vehicles and conveyances, including wagons drawn by oxen. At this and subsequent conferences, Dr. Washington always conducted the program and discussions in such an informal and simple manner that farmers were assured of their welcome to the school and readily made to feel that they were an integral part of the meetings. Usually someone was called upon to lead an old time plantation melody. Soon all present joined in, humming, nodding, and softly patting their feet. Many times when the climax of a spiritual was reached, the atmosphere was surcharged with that oneness of spirit which so completely characterizes the Negro rural church gathering. The constraints of fear and self-consciousness were swept away, and kindred souls felt only the stir of emotion which served to open their hearts and minds to the inspiration that was to follow. Dr. Washington, in his tactful way of approaching the most ' **delicate subjects'**, would launch into his program, calling the attention of the people to the '*

***vital facts affecting their lives'**, without offending or embarrassing them."*

The "delicate subject" and "vital fact" for the KBFA's presentation is: marketing grain as a commodity (with no farmer control of price, {input/output}) is not in the best interest of community, family, and rural development! Having said that, we trod on, presenting the KBFA's version of RME in a Movable School manner, while moving the Nicodemus community towards a sustainable agri-tourism format connected to its designation as a National Historic Park Site.

We are doing this in two ways: For current "Farm Futures" commodity education we are embracing the farm marketing business of Mrs. Ida Hurley of Charleston, Missouri (Hurley and Associates). This decision is based after recognizing the applicability of Mrs. Hurley's early *mission statement: The application of sound Christian principals to achieve positive results for the client's farm enterprise; It is a belief from within, not a behavioral attitude to learn:*

- *The Law of Use*
- *Accountability*
- *Reciprocity*
- *Perseverance*
- *Service*

"The Movable School" approach is the future direction of community which the KBFA seeks to sustain. We are embracing the Ethiopian grain (grass) teff as the most significant valued-added crop the Nicodemus community can grow to reach 'self determination'. Teff can be our bridge to a cultural connection, water conservation, medical, health, nutrition, animal feed, and an area that has not been invaded (currently) by multinational niche destroyers.

References:

Campbell, Thomas M. 1936. The Movable School Goes To The Negro Farmer. Tuskegee Institute Press.

Mayberry, B.D. 1991. A Century Of Agriculture In The 1890 Land-Grant Institutions- 1890-1990. Vantage Press.

Schor, Joel. 1982. Agriculture In The Black Land-Grant System To 1930. USDA.

Hurley, Ida. 1975-2005. "Simple is Hard". *Various Communications.* Charleston, Missouri

Evert, Sarah. 2005. Teff: An Alternative Dry Land Crop for Western Kansas. Kansas State University (graduate work)

Agricultural Law: What Every Small Farmer/ Rancher Needs to Know

Janie Simms Hipp Rogers
University of Arkansas
Fayetteville, Arkansas

Legal Issues

What we don't know can hurt us; Prevention is the key; Try not to ever need a lawyer; Planning is critical; Courage to examine your situation; If you need a lawyer, be prepared; Time; Money; Emotional

Farmers, ranchers and rural citizens need to know and think about legal issues relating to: Their Personal Lives; Their Professional Lives Both In & Out of Farming; Their Communities; Aspects of Legal Issues – Local, State, Federal

Personal & Professional - First, are your affairs in order? - Have you planned for your operation? - Short term, Long term, After you are gone - What about Property issues - What about Contract Issues - Injury/harm/tort issues - Environmental issues - Emerging issues, Property issues, Boundary lines – where are they? - Title issues – do you know where it is? Could you find it in a pinch? - Fences – fence disputes are still very popular conflicts – good fences make good neighbors - Adverse possession – what is the time period in your state for adverse possession of your property…what must be proven - In all 50 states a trespasser can acquire ownership by continuously occupying a parcel of land until the statutorily set period of limitations runs out.

Liability related to your property – when you allow individuals onto your property – do you know what the law is in your state - Your duty of care owed to those coming onto your property - What this realistically means - Transfer of ownership of your operation - How to do this - Who to transfer to and under what circumstances - Terms of transfer - Acquisition of new lands for your operation - What's been there - May be acquiring environmental liability

Contract Issues - How to form a contract – offer & acceptance still the rule –can be written, can be verbal - Who can enter into a contract & regarding what types of issues - What types of contracts must be in writing - How do breaches of contracts occur - What happens when someone breaches the contract – remedies – damages – what are the rules in your jurisdiction - What types of relationships involve contract issues - Warranties when you sell products

When you advertise your product as having certain characteristics – you are creating a warranty - If the product doesn't have those characteristics, you may have breached your warranty - Express warranties – can be verbal or written - Implied warranties – fitness for general purposes; general merchantability; fitness for particular purpose - How to disclaim warranties

Injury/harm/tort issues - Negligence – setting in motion, through less than careful behavior, a chain of events leading to harm to another - Trespass – coming on to another's property and interfering with their quiet use and enjoyment of their property

Nuisance – common agricultural-

related harm - public nuisances and private nuisances - Flies, dust, noise, odor common – regardless of size - Harm to employees – commonly caused by failure to maintain safe working environment or employ or properly train co-employees - Harm to third parties – your liability for harm caused to third parties - Harm to another's property

A tort is a civil wrong or injury - Does not involve breach of contract disputes - Generally, tort law is judge-made law - In all jurisdictions tort law changes as new cases are decided - Much change in 20th Century (esp. post-1950) - Tort law is concerned with substandard behavior; its objective is to establish the nature and extent of responsibility for tortuous conduct

General areas of tort law:
Intentional torts -Liability regardless of fault - Privileged torts; Negligent torts (90% of all tort cases) - Fault-based system; The line between intentional and negligent torts is one of degree - Intent is a desire to bring about a result which will invade the interests of another in a way that the law forbids; A person may be held liable for any resulting injury although intending nothing more than a good-natured joke, or honestly believing that the act would not injure the plaintiff, or acting under the belief that it is for the plaintiff's own good

Trespass - A trespass consists of two basic elements: Intent - Plaintiff must show that the trespasser either intended the act that resulted in the unlawful invasion or acted negligently or in a dangerous manner. Force - Any willful act, whether the intrusion is immediate or an inevitable consequence of a willful act. Intentional interference with real property - Every possessor of land must use the land so as to avoid injury to possessory rights of neighbors - Conceptually similar to nuisance

Intentional disparagement of food products- Common law -Many states recognize a claim for tortious interference with business relations - State legislation - Designed to protect perishable food products from false and malicious statements - Based on belief that perishability makes market value of food products vulnerable to false statements - Common law approach believed to be inadequate - Statutes in 13 states

Access to Land – Liability for torts that occur on your land - The traditional approach created a hierarchy of status based upon the benefit the entrant bestowed upon the owner or possessor - Invitees and child trespassers - Social guests and licensees - Adult trespassers
Hierarchy of status approach - Adult trespasser - Owner or possessor only has duty to refrain from willfully or wantonly injuring; Child trespassers -Attractive nuisance ("turntable") doctrine - If a landowner has a reasonable expectation that children will be attracted to the premises by a dangerous artificial condition, the "attractive nuisance doctrine" applies - The child is treated as a licensee or invitee
Child trespassers -Farm ponds - Usually are held not to be artificial conditions (doctrine does not apply unless child is invitee) - But, items associated with farm ponds can be attractive nuisances - Remoteness may be the key factor - Swimming pools are likely to be attractive nuisances
Child trespassers - Reach of the attractive nuisance doctrine - Smoldering ashes - jury question; Top-heavy newspaper stand - jury question; Large machine with exposed gear wheels - jury question; Rain-filled ditch on construction site - jury question;

Extra rails stored beside railroad track – no; Partially uprooted dead tree – no; Septic tank – no;
Licensee - Anyone on the premises with permission or acquiescence, but does not bestow a benefit on the landowner - Hunters with permission who do not pay a fee - Other than the duty of the landowner to notify of hidden dangers, the licensee takes the premises as is.
Social guest - A person on the premises who does not confer an economic benefit, but does confer a social benefit - Landowner must exercise reasonable care to maintain the premises
Invitee - A person on the premises for business purposes or for mutual advantage rather than solely for the entrant's benefit - Invitees include such persons as milk truck driver, cattle buyer, veterinarian or employee - Landowner must make and keep the premises safe and warn of existing dangers
Modern approach to tort liability of land owners and occupiers - The modern approach is a movement away from basing an owner's liability on the status of the entrant. - Ordinary negligence under all of the circumstances - Does this mean you must take steps to limit entrance to your land? - What types of steps should you take to ensure safety to all?
Modern approach to tort liability of land owners and occupiers - Eleven states follow the California approach - Eleven other states retain the common law duty regarding trespassers and all other unlawful entrants, but utilize a standard of reasonable care for all lawful entrants - Move toward reasonable care approach to all – valuing human life over property
Landlord is generally not liable for injuries to third parties that occur on leased premises unless: - Landlord conceals dangerous conditions or defects that cause injury; - Conditions are maintained on the premises that are dangerous to persons outside the premises; - The premises are leased for public admission; Landlord retains control over part of the leased premises that the tenant is entitled to use; Landlord makes an express covenant to repair the leased premises, but fails to do so and injury results; Landlord negligently repairs items located on the premises
Recreational use of land - Model Act (1965) - Limits the liability of persons making their rural land available to the general public for recreational purposes - Includes roads, waters, water courses, private ways and buildings, structures and machinery or equipment when attached to realty - Includes activities such as hunting, fishing, swimming, boating, camping, picnicking, hiking, pleasure driving, nature study, water skiing, water sports and viewing or enjoying historical, archeological, scenic or scientific sites
Recreational use of land - Recreational users given no higher status than trespassers - Owners not shielded from willful or malicious failure to guard or warn against a dangerous condition, use, structure, or activity - The Model Act does not provide liability protection if the owner charges a fee - Some states have modified this point - Requires careful drafting of release forms
90% of all civil cases relate to negligence - The negligence system is a fault-based system - Links in the chain of negligence - Duty (reasonable and prudent person standard) – Breach – Causation – Damages Reasonable foreseeability - The plaintiff's harm must have been a reasonably foreseeable result of the defendant's conduct at the time the conduct occurred. - Reasonable foreseeability is the

essence of proximate cause - Liability is imposed only for harm that is reasonably expected to result from the defendant's actions - A causal connection must be present between defendant's action and plaintiff's harm - Act of nature - Real question is whether an act of nature was the proximate cause of the damage - Reasonable foreseeability is the key -Guest statutes - An owner or operator of a motor vehicle is typically excused from liability for injuries suffered by nonpaying guests riding with the driver unless the driver is intoxicated or reckless - Nonpaying guests assume the risks associated with ordinary negligence - Many states' statutes have been declared unconstitutional - Rendering aid to persons in peril - No legal requirement to render aid - If aid is rendered carelessly, person providing aid can be held liable for any resulting damages - Once aid begins, the duty is to continue until a replacement comes or the aid otherwise becomes unnecessary Good Samaritan laws - In many states, a person rendering assistance is generally only liable for injuries resulting from willful intent or recklessness - Higher standard of care applies to those compensated for rendering aid - Still no affirmative duty to render aid, however
Manufacturers Products Liability - Much change since the 1960s - Recent trend is toward strict liability - Very favorable to plaintiffs - Insurance costs have skyrocketed - Proposed federal legislation (1998) - Replace state product liability laws with uniform federal standards - Punitive damage awards capped at $250,000 in cases involving small businesses - Total defense if plaintiff under influence of alcohol or other drugs and impaired condition was principal cause of harm - 18-year statute of repose - Legislation inapplicable to cases involving tobacco or silicone breast implants Injured party must prove five elements to recover on a product liability claim - Defendant sold the product and was engaged in the business of selling the product; Product was in a defective condition; Defective condition was unreasonably dangerous to ordinary user during "normal use"; Product was expected to and did reach the user without substantial change in condition; and Product proximately caused plaintiff's injury

Nuisance - An invasion of an individual's interest in the use and enjoyment of land rather than an interference with exclusive possession or ownership of the land

Two interrelated concepts: Landowners have the right to use and enjoy property free of unreasonable interference by others - Landowners must use property so as not to injure adjacent owners

Nuisance law is rooted in the common law and has been developed over several centuries as courts settled land use conflicts. Nuisance law is always changing - Legal rules vary between jurisdictions

Nuisance law is important to agriculture because of the noxious odors produced by many farm operations

Two primary issues in every ag. nuisance dispute: Whether the use alleged to be a nuisance is reasonable for the area; Whether the use alleged to be a nuisance substantially interferes with the use and enjoyment of neighboring land

"Nuisance" and "negligence" are not the same thing. Operating a farming or ranching activity properly and having all requisite permits may still constitute a nuisance if a court or

jury determines the activity "unreasonable" and causes a "substantial interference" with another person's use and enjoyment of property. Every case is dependent upon the particular facts of the case and the legal rules used in the particular jurisdiction

Nuisance - factors for consideration: Whether the use complained of is common to the area; Whether the activity is a minor inconvenience or is a regular and continuous activity; The nature of the property; Whether the activity substantially interferes with the plaintiff's land use; Whether the activity is vital to the local economy; Whether the complained-of use pre-dates the plaintiff's use

Remedies - Courts have the power to fashion a remedy to fit the particular circumstances of the situation - Award monetary damages - Issue an injunction - Order the defendant to cease the offending activity - Can be either a temporary or permanent injunction.

Private nuisance - A civil wrong based on a disturbance of rights in land for which a remedy lies in the hands of the individual whose rights have been disturbed

Public nuisance - An interference with the rights of the community at large with the remedy lying in the state's hands

Right-to-farm laws - Priority of location and reasonableness of operation - Farmers and ranchers satisfying legal requirements have a defense to nuisance actions - Basic idea is that it is unfair for a person to move to an agricultural area knowing the conditions which might be present and then ask a court to declare a neighboring farm a nuisance

Types - Nuisance related - Farming protected only if it has been in existence for a specified period of time; Restrictions on local regulations of agricultural operations ; Prevents local and county governments from enacting regulations or ordinances that impose restrictions on normal agricultural practices

Ag districting type statutes (Iowa) - Ag operations located within a designated area immune from nuisance laws if conducted properly - Property rights of those outside ag area must be considered.

Exemptions from zoning activities - Major issue is whether the ag activity is an ag use or a commercial activity - Most state statutes define "agricultural use" broadly (Ex. Illinois statute) - Seven acres used to board 19 show horses - Poultry hatchery on 3 acre tract - 60 acres used to store sewage sludge for later use as fertilizer - Not a mobile home on ag land - Raising of hogs in any quantity

- Cases historically involving nuisances and farming operations – Odor – Smoke – Dust – Flies – Noises - Regardless of size or type of operations – only recently have nuisance cases involved larger CAFO type operations

Employer's liability for employees injuries - Two separate legal systems - Common law system - Negligence-type approach; Workers' compensation system - An employee injured on the job is entitled to a statutorily prescribed amount; Exclusive remedy for loss from injury or death of a covered worker - Applicable to migrant workers

Common Law System - The employer bears certain common law responsibilities; Provide reasonably safe tools and appliances - Provide a reasonably safe place to work - Warn and instruct the employee of dangers which employee could not reasonably be expected to discover - Duty to fix a problem and warn subsequent employees of potential

danger - Provide reasonably competent fellow employees - Make reasonable rules for employee conduct

Common Law System - Duty to hire reasonably competent fellow employees - Failure to exercise reasonable care in the hiring of employees exposes the employer to liability for any injuries a particular employee causes to fellow employees - Failure to fire upon learning that an employee is incompetent also may subject an employer to liability - Duty to make reasonable rules for conduct of employees - The extent of the duty depends upon the employment situation - An employer's common law defenses: No duty was breached, Assumption of risk (Most courts refuse the defense if the employee must choose between submitting to the danger or getting fired; Contributory negligence; Employee's voluntary submission to risk must be unreasonable; Negligence of a co-employee (Employer must exercise due care in selecting employees)

Child Labor - All states have statutes defining what constitutes illegal or impermissible child labor - Generally in age categories - Generally all types of activities involving dangerous activities - Exemptions for your own family - Your neighbors' kids do not meet the definition of your family under the law – regardless of how close you might be!

Emerging Issues - Changes in tort liability - Tort reform - Limitations on $ damages - Still big issues around the country - Piercing the corporate veil

Right-to-farm challenges - What is a "right-to-farm" statute – protection against nuisance suits filed against agricultural operations - Constitutionality of provisions - Continuing legal challenges for right-to-farm statutes

New marketing opportunities – legal issues

Direct marketing - Warranties on products – what does it mean in a contract sense when you say "organic" or "natural"

Liability of farmers market boards & members – food safety issues related to food products sold on the market

Liability of the farmer for those entering his operation to "u-pick" – harm to those who enter to pick or harvest - Historically, insurance policies exclude coverage for "u-pick" operations - Insurance coverage – do you need it? Can you find it? Post-Katrina impact?

Cooperative marketing opportunities
Relative rights, duties & responsibilities of cooperative board members and just plain members of cooperatives
Breach of contract to sell to or market with the cooperative

Environmental Issues - Water
Point and non-point source liability for water pollution – exposure to the farming continues to rise – exposure continues to look at smaller and smaller operations
Clean Water Act – NPDES permit requirements - Liability for failure to obtain necessary permits - Do you need a permit? - Smaller and smaller animal ag operations will need permits in the future
Wetlands – what happens when you disturb a wetland?
Storm water regulation – where is the operation in relation to municipalities – do you need a permit for your activities disturbing land/water?
What steps are municipalities taking to address land use issues and permit requirements in your area? Where is your operation in

relation to water?

Other environmental issues - Endangered Species Act requirements – exposure for taking - permits for taking species– liability for failure to obtain a permit; Emerging Clean Air issues – drift, particulate matter, ammonia; Pesticides – labeling compliance, certification of applicators; Toxic chemicals, hazardous substances, CERCLA liability

These issues may not be of primary concern to you, but the general shift is to require smaller and smaller operations to seek, obtain and report against permits

Larger picture - emerging international frameworks for addressing environmental concerns Drift & Air

Water and Water Rights Issues

Availability of Water will continue to be an issue in many states - concerns regarding availability and use of water emerging throughout the south and southeast; Water Quality continues to be an issue; Permits/regulations controlling use and availability of water; Specially identified areas of a state in which water is critical or water quality is impacted – do you know where you are in relation to those areas?

What you don't know can hurt you - What you don't think about can hurt you - Preparing for the future is key to success and longevity of any operation

Just because we are in sustainable or organic enterprises, doesn't mean we aren't regulated now or won't be regulated in the future - Smaller and smaller animal operations under scrutiny - Food safety pressing onto the farm and into the small markets - Animal identification is coming regardless - Even though we "have a relationship with our customer/consumer" we might still be sued - You don't have a relationship with the medical or personal or property insurance carrier of the consumer - Already circumstances where lawsuits have occurred even though the consumer/customer expressed their support for the producer - Must think of your operation and your activities in the broader world and realize that the broader world may not hold the values you hold - Bottom line – litigious society – until that changes, all farmers and ranchers are exposed to legal liabilities - Plan accordingly…don't stick your head in the sand…

Excellent additional sources: Principles of Agricultural Law, McKeowen & Harl (published by Ag Law Press); www.aglawpress.com; Agricultural Law, Nutshell (published by West Legal Publications).; www.nationalaglawcenter.org - Reading Rooms on various subjects - Reference Desk online; Updated bibliographies; Missouri Ag Law Center & Drake Ag Law Center.

PACA – A Tool for Growers

Basil Coale
USDA-AMS
Manassas, Virginia

Producing a crop of fruit and vegetables is only half the job. The rest involves marketing. Too often, however, growers encounter a myriad of difficulties when selling and marketing their produce. Some of the more common dilemmas include buyers who arbitrarily "clip" invoices—or don't pay at all; loads that get rejected at destinations without justification; and sales agents who do not properly account for sales and expenses. Any of these problems can put a grower's entire business at risk.

The Perishable Agricultural Commodities Act, or PACA for short, protects growers, shippers, distributors, and retailers dealing in fresh and frozen fruits and vegetables by prohibiting unfair and fraudulent trade practices, and by providing a forum that growers and others can use to settle commercial disputes. PACA is administered by the U.S. Department of Agriculture and is funded almost entirely by license and complaint fees that are paid by companies that buy, sell, or broker commercial quantities of fruits and vegetables. This license requirement is what makes the law so effective. USDA can suspend or revoke the license of firms that don't abide by the law, and hold them liable for any damages that result. Naturally, the type of penalty issued depends upon the seriousness and nature of the violation.

Dispute Resolution

If a grower encounters problems getting payment from a buyer, or believes that they have suffered damages resulting from unfair trade practices, they should contact a USDA-PACA Branch office to discuss the matter. PACA Branch representatives provide expert, unbiased assistance—whether this involves interpreting a contract term, analyzing an inspection result, or merely providing advice regarding a firm's rights and responsibilities. Frequently, timely guidance is sufficient to avoid any further action. There are instances, however, when disputes are not so easily settled. In those cases, a claim must be filed with a PACA office.

To file a claim, a grower must simply submit a letter to any PACA Branch office outlining the nature of the complaint and the identity of the firm filed against. Along with the letter, the PACA Branch office will need copies of any supporting evidence such as invoices, broker's memoranda of sale, accountings, or other paperwork. Also, a claim must be filed within 9 months of the date that payment became due, or the date that performance of the contract was required. The cost of filing a claim is $60.

Once the PACA Branch office receives a complaint, they will gather the relevant facts from all parties involved in the dispute and assist in reaching a settlement. The PACA Branch handles more than 2,000 such cases each year and resolves about 75 percent of these claims informally, generally within 8 weeks. However, if informal settlement is not possible, USDA will issue a binding decision and order. Although it costs an additional $300 to obtain a formal ruling, this fee can be recovered from the other party, if the grower prevails.

Sales Agents

Many growers hire sales agents to sell and market their crop. Although arrangements vary, agents typically receive a percentage of the sales price as their commission, and may also be entitled to deduct other expenses. The PACA requires that agents outline the duties and responsibilities of

both parties in writing before the first lot is received. In addition, agents must issue accurate accountings documenting the sales prices obtained and the expenses deducted from each transaction. Agents are generally required to submit these accountings in 10-day intervals throughout the season, and must promptly pay the net proceeds due once payment is collected. If a sales agent has not met its responsibilities, a grower should speak to a PACA Branch specialist. If necessary, a claim can be filed and a PACA Branch representative will audit the agent's records to determine whether any additional proceeds are due.

Mediation Service

Mediation is an effective way to resolve disputes, since it places the resolution of the dispute directly in the hands of the interested parties. It provides an outlet for settling differences outside of the legal system, strengthens business relationships, and provides a forum where both parties can air their differences in a neutral atmosphere. All PACA Branch personnel that handle disputes are trained in mediation, and can mediate a dispute upon request provided both parties are agreeable. Mediation sessions can be held face-to-face or over the telephone. Furthermore, there is no additional cost to mediate a dispute beyond the initial $60 filing fee. To obtain more information about this service, or to arrange for mediation of a dispute, contact any PACA Branch office.

Trust Protection

PACA's dispute resolution and mediation services are important tools that produce businesses can utilize to resolve disputes that sometimes occur between trading partners. But what recourse is available when a customer goes out of business or files bankruptcy? The PACA trust provision requires that dealers maintain a statutory trust on fruits and vegetables received but not yet paid for. In the case of a business failure, the debtor's trust assets are not available for general distribution to other creditors until all valid trust claims have been satisfied. Because of this, suppliers that file for trust protection have a far greater chance of recovering money owed them when a buyer goes out of business.

To preserve trust rights, the PACA requires that a seller, within 30 days from the payment due date, provide to the debtor a written notice stating the intent to preserve trust rights, including in the notice information about the unpaid transaction. Since specific information is needed for the notice to be valid, it would be wise to call a PACA Branch office and speak with a representative before preparing a notice. The requirement for providing written notification to the debtor applies to all who want to preserve trust rights, whether they are a PACA-licensed firm or an unlicensed grower.

If a seller has a PACA license, however, the law allows for the automatic filing for trust protection simply by including the following wording on the invoice:

> "The perishable agricultural commodities listed on this invoice are sold subject to the statutory trust authorized by section 5(c) of the Perishable Agricultural Commodities Act, 1930 (7 U.S.C. 499e(c). The seller of these commodities retains a trust claim over these commodities, all inventories of food or other products derived from these commodities, and any receivables or proceeds from the sale of these commodities until full payment is received."

The PACA law is here to ensure fairness and offers many services to assist. For additional information, call any PACA Branch office or visit our website address at http://www.ams.usda.gov/fv/paca.htm.

Tucson, AZ: 1-888-639-0575
Manassas, VA: 1-888-639-9236
Ft Worth, TX: 1-888-901-6137

Heart of the Farm; Women in Agriculture

Joy Kirkpatrick and **Carol Roth**
University of Wisconsin
Madison, Wisconsin

During the late 1970s and early 1980s, University of Wisconsin-Extension (UWEX) sponsored educational programs specifically for farm women. These programs targeted women who helped manage their farming operation. Unfortunately, these programs were abandoned. Two reasons are thought to have contributed to the end of programs for farm women: (1) a lack of leadership in UWEX for these audience specific (versus topic specific) educational programs, and (2) the move of farm women to seek off-farm employment to supplement incomes and provide insurance benefits for their family. Adding off-farm employment to their workload made juggling their various roles even harder. Participating in the existing Extension educational programs fell off their "to do" lists. *Heart of the Farm – Women in Agriculture* is an attempt to reach this underserved audience of UW-Extension agriculture programming.

Three things happened to make Heart of the Farm in Wisconsin possible. (1) The Program on Agricultural Technology Studies (PATS), UW-Madison, published its research, **The Roles of Women on Wisconsin Dairy Farms at the Turn of the 21st Century.**[1] This research indicates that most farm women are responsible for the financial record keeping on their farms and also share in the decision-making to borrow money and/or expand their operations. At the same time, many women were taking off-farm jobs and the number of farms was decreasing. This demand for their time coupled with the lack of contact with others who understand the complexity of farm life created a feeling of social isolation for many farm women. (2) The second piece of the puzzle fell into place when a core group of UW-Cooperative Extension professionals were interested in developing programming for women involved in agriculture. As a result, two female county-based UWEX agricultural agents and four University of Wisconsin campus-based faculty/staff formed a steering committee to develop this project. (3) The final factor was funding. A series of small grants made it possible to conduct two pilot workshops.[2] Information gathered from pilot evaluations and a follow-up focus group provided information that was useful in developing the program and seeking additional funding to expand the program. In 2003, a grant from the North Central Region's Risk Management Education Center supported four *Heart of the Farm – Women in Agriculture* Conferences that were held throughout Wisconsin. The purpose of *Heart of the Farm* is to address the needs of farm women by providing education on pertinent topics, connecting them with agricultural resources, and creating support networks.

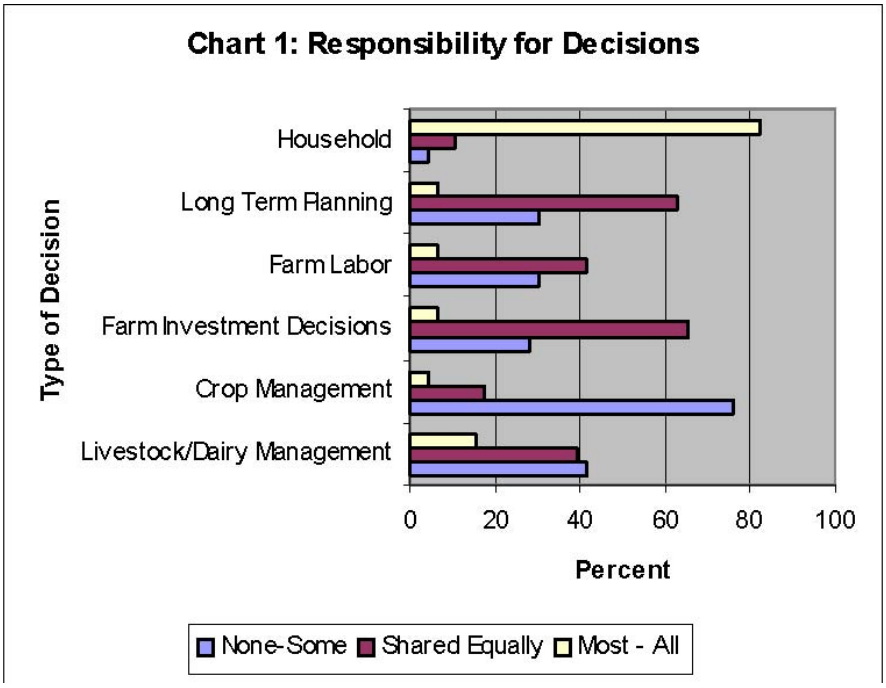
Heart of the Farm Participants

Six *Heart of the Farm* (HOF) conferences were offered at various sites throughout the state during 2002-2003: Jefferson, Ladysmith, Eau Claire (2), and Richland Center (2). Over 150 women attended these conferences. Almost two-thirds (62%) of the participants were between 35-54 years of age, with an equal number of younger (18-34 = 18%) and older (55 or older = 20%) participants. More than 1 in 3 women indicated they worked off-farm. The average number of hours engaged in off-farm work was 30 hours per week. This means that for most of these women (89.4%), off-farm work constituted more than a part-time job. As might be expected in Wisconsin, the majority of women who participated in HOF came from dairy farms (58.7%). The

remaining 40%+ were involved in other enterprises – beef, grain, hogs, other – or a combination of enterprises.

Women are Involved in Major Farm Decisions

As indicated by Chart 1, women are involved in all of the major decisions that are made in their farming operations. The majority of women are responsible for almost all of the decisions related to the household (93%), however, these women are least involved with decisions about crop management. What is most interesting is that these women are most likely to be part of the decision making in areas that relate to long-term planning and farm investments. And to a slightly lesser degree, they influence the decisions that relate to farm labor, and livestock or dairy management. Farm women were also asked how they would describe their involvement in the decisions that were made on the farm. More than one-half (57%) said that they were "very involved." Another one-third (30%) said that they were "involved to somewhat involved". Only 2% said that they were "not involved at all" in farm decision making.



'Women's Work' on the Farm
Similar to their involvement in the farm decision-making, farm women play a crucial role in the farm tasks that they perform. The contribution that women make to their farming operation is often overlooked. 'Women's work' includes farm work, household tasks, and for some, off-farm work as well. When asked how they would describe their involvement in the day-to-day farm tasks, almost two-thirds of the respondents said that they were "very involved" (61%) and another 22% said they were "involved." Less than 5% said that they were "not involved at all."

'Women's work' on the farm is divided into three main categories – bookkeeping/marketing, manual labor, and machinery/field work. While farm women are involved in a variety of tasks they are most likely to be involved in bookkeeping /marketing and work that requires manual labor and less likely to be involved with machinery/field work. The majority of women (85%) "regularly" and "sometimes" do the farm bookkeeping and bill paying. Because of their close connection to and understanding of the farm business finances, women's involvement in the decision-making for their farm operation is critical.

On farms, women do a variety of manual labor tasks that range from running errands to rock picking. Much of the work revolves around feeding and taking care of the livestock. The most common tasks that women regularly or sometimes perform are: (1) running errands; (2) caring for young stock; (3) milking cows / cleaning after milking; (4) feeding livestock; and (5) picking rock.

Women are the least involved in work related to machinery /field work. Many share the responsibility for haying (70%) and harvesting crops (59%).

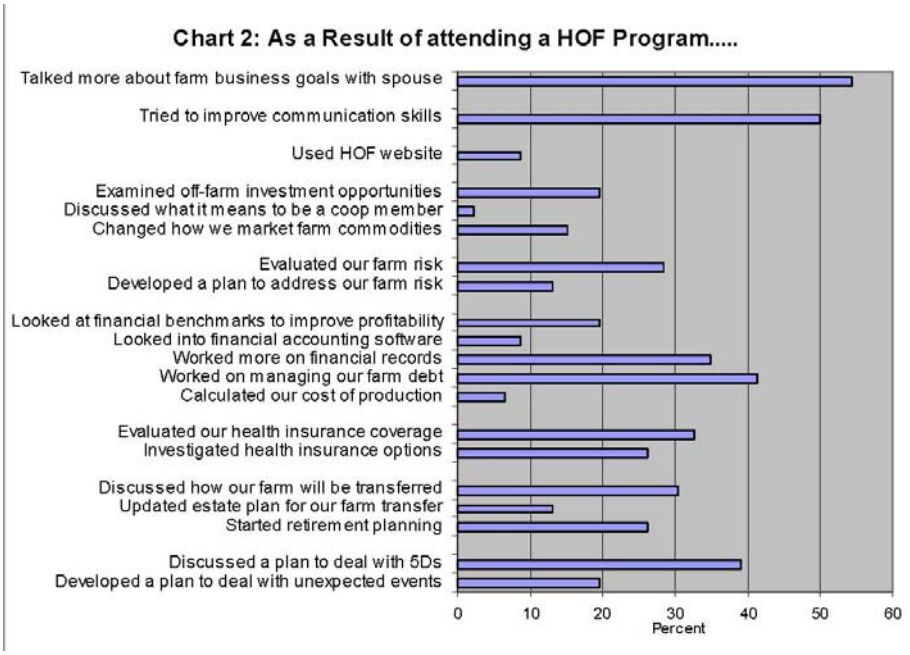
Women's Changing Roles in the Farm Operation
Regardless of the long hours and multiple tasks that women do in their farming operations, the majority (82%) indicated that they are satisfied with their responsibilities. However, 3 out of 5 (60%) said that they see their responsibilities changing. For some, those changes are related to physical changes or health reasons that affect their ability to perform the farm work. For others, it is related to off-farm employment that takes away time that would be available for on-farm work.

For most, however, the changes were related to major transitions in the farm operation. These transitions covered a wide range — "working a son into the business," transferring the farm from one generation to the next, retirement, and expansion of milking herd or other livestock.

Regardless of how their farming operation was changing, women see financial information as a key component in making that transition. Financial information needs include record keeping, taxes, marketing, retirement planning, and farm transfer.

Heart of the Farm Motivates Changes in Managing Farm Risk
As shown in Chart 2, farm women indicated that they used what they had learned at a HOF program to address many of the risks that they face in their farming operation. Not only did the program participants gather information, but in many cases, they applied this new knowledge to manage a risk in their farming operation. For example:

1. Participants not only "*Discussed* a plan to deal with 5Ds" they also "*Developed* a plan to deal with unexpected events" or,
2. They "Discussed how our farm will be transferred," "*Updated* estate plan for our farm transfer," and then *"Started* retirement planning."



But farm women want more…
Input from farm women is essential in guiding the selection of program topics. Through focus groups, program surveys, and follow-up evaluations, farm women have indicated the topics that would be useful in managing risks on their farm. They include: production issues, government and law, financial management, health issues, marketing, long-range planning…to name a few. Women are integral to each of their farm operations. Providing farm women with the tools and skills to perform their tasks will benefit all of agriculture.

UW-Extension responds to farm women's requests
The one-day *Heart of the Farm* workshops continue to expand into other regional locations throughout Wisconsin. Six workshops were offered in 2004 and four were conducted in 2005. Four are planned for the 2005-06 winter programming season. In addition to continuing the one-day *Heart of the Farm* workshops, UW-Extension provided focused educational sessions on the topics for which the women requested more information. Three sessions that focused entirely on health care issues were offered in locations near the workshop sites. These health care sessions gave the women more in-depth information and more time to network and discuss their own struggles and issues.

As noted earlier, many farm women take on the responsibility of recordkeeping for the farm business and because of this role, the women requested more workshops on record keeping software. In response, the UW-Center for Dairy Profitability provided three hands-on workshops in computer labs introducing farm women to two financial recordkeeping programs, QuickBooks™ and AAIMS®.

In 2004, UW-Extension introduced a new educational program called *Annie's Project* to WI farm women. *Annie's Project* is a farm women's risk management program developed by University of Illinois

Extension Educator, Ruth Hambleton. *Annie's Project* allows women to learn about risk management through a small group setting in five sessions (over a six week period). Not only does this allow for extended contact with educators, but it provides the opportunity for networking among the women. One *Annie's Project* participant noted, "Farmers don't play cards on Saturday nights anymore. We need this program to network with our neighbors." As families change the way they spend their free time, many times focusing on entertainment within their own homes or sporting events involving their children, the connection with their neighbors diminish. Providing farm women the opportunity to participate in programs that are pertinent to their farm business *and* network with their peers and neighbors may alleviate some of the isolation that many farm families and especially farm women face.

For more information about *Heart of the Farm*, visit: www.uwex.edu/ces/heartofthefarm

[1] Vogt, Jennifer; and Douglas Jackson-Smith, Marcia Ostrom and Sharon Lezberg. November, 2001. "The Roles of Women on Wisconsin Dairy Farms at the Turn of the 21st Century," PATS Research Report No. 10. Madison, Wisconsin: UW-Madison.

[2] A Women's Challenge Grant from the North Central Region's Risk Management Education Center (NCR RMEC) as well as funding from the Cooperative Foundation and CHS Cooperative Foundation supported the two pilot programs.

Crop Insurance Overview

Laurence M. Crane
National Crop Insurance Services
Overland Park, KS

By definition insurance is the means of protecting against unexpected loss. Everyone has insurance; either you buy insurance from an insurance company, or you insure yourself. When you self-insure there are no premiums to pay, but in the event of a loss you pay the full amount. In other words, when self-insured you have a free policy with a 100 percent deductible.

There is a multitude of crop insurance products on the market and obtaining crop insurance is relatively easy. It involves determining the amount of protection desired and selecting the product and coverage level that will best provide that protection. Qualified and informed agents are available to answer questions and provide help and assistance in completing an application and explaining program requirements.

Determining Insurance Protection

True risk protection must be based on a farm's own production potential. Proving historical yield records is the most realistic method of estimating how much protection is needed, especially if a grower's yield is above average. The insurance yield for much of Federal crop insurance coverage is based on a producer's Actual Production History (APH). APH's are based on the average yield from the insured unit for four to ten consecutive years. For farmers who have less than four years of production records, variable transitional yields (T-Yields) are used to complete the minimum four-year database.

To determine the amount of insurance protection, farmers must select a coverage level and a price election. Producers can insure a percentage of a yield (coverage level) and, for most products, can choose from 50-75% (85% for some crops) in 5% increments, of their APH yield. The price election is the price per unit of measure as issued by the US Department of Agriculture Risk Management Agency (USDA/RMA) prior to each crop year.

This price election is used to establish the insurance guarantee, premium, and to compensate the insured in the event a production loss occurs. Producers have a choice of various percentage level price elections established for each crop year (55% to 100% of USDA/RMA established or projected market price). There are several options on how to divide land to determine APH yields and premiums under crop insurance. Each parcel of land for which claims are calculated is called an "insurance unit." A unit is defined as that acreage of the insured crop in the county which is taken into consideration when determining the guarantee, premium, and the amount of any indemnity (loss payment) for that acreage. Unit structure is a very important aspect of maximizing the risk management protection offered by various insurance policies. Check with an insurance agent to find out how many and what types of insurance units your crops qualify for, and how this will affect your premiums. There are four types of unit structure: basic, optional, enterprise, and whole-farm units.

Insurance Products

Multiple Peril Crop Insurance (MPCI)
MOCI is a broad-based crop insurance program administered by RMA and subsidized by the Federal Crop Insurance Corporation (FCIC). As the name implies, MPCI provides protection against an unavoidable loss in yield due to nearly all natural disasters. For most crops, that includes drought, excess moisture, cold and frost, wind, flood and damage from

insects and diseases. MPCI does not cover losses resulting from not following good farming practices, low commodity prices, theft, and specified perils that are excluded in some policies. There are specific restrictions on some crops based on acceptable farming practices. Most MPCI programs guarantee a yield based on an individual producer's APH. If the production to count is less than the yield guarantee, the insured will be paid a loss. Catastrophic (CAT) CAT insurance is the minimum level of multi-peril crop insurance coverage at 50% of a producer's yield and 55% of the price, and meets requirements for a person to qualify for certain other USDA program benefits. The premium is 100% subsidized, but the farmer pays a $100 per crop per county administrative fee. Farmers with limited resources may be eligible for a waiver of the fee for CAT coverage. Any crop insurance agent can assist producers in determining if they are eligible for a fee waiver.

Crop Revenue Coverage (CRC)
The most widely available revenue protection policy is CRC. This policy guarantees an amount of revenue (based on the individual producer's actual production history (APH) x commodity price) called the final guarantee. The coverage and exclusions of CRC are similar to those for the standard MPCI policy. This final guarantee is based on the greater of the springtime generated price (base price) or the harvest-time generated price (harvest price). While the guarantee may increase, the premium will not. Premium will be calculated using the base price. Since the protection of producer revenue is the primary objective of CRC, it contains provisions addressing both yield and price risks. CRC covers revenue losses due to a low price, low yield, or any combination of the two. A loss is due when the calculated revenue (production to count x harvest price) is less than the final guarantee for the crop acreage.

Income Protection (IP)
IP is a revenue product that, based on the individual producer's APH, protects against a loss of income when prices and/or yields fall. While IP looks a lot like CRC, it does not have the increasing price function of CRC. The guarantee and the premium will be calculated using the spring-time generated price (projected price). An indemnity is due when the revenue to count (production to count x harvest price) is less than the amount of protection.

Revenue Assurance (RA)
The coverage and exclusions of RA are similar to those for the standard MPCI policy. However, MPCI provides coverage for loss of production, whereas RA provides coverage to protect against loss of revenue caused by low prices or low yields or a combination of both. RA has the Fall Harvest Price Option (FHPO) available. This Option uses the greater of the fall harvest price (harvest-time generated price) or the projected harvest price (spring-time generated price) to determine the per-acre revenue guarantee. So, with the Option, RA works like CRC, without the Option, it works like IP. RA protects a producer's crop revenue when the crop revenue falls below the guaranteed revenue.

Group Risk Income Protection (GRIP)
GRIP is based on the experience of the county rather than individual farms, so APH is not required for this program. A GRIP policy includes coverage against potential loss of revenue resulting from a significant reduction in the county yield or commodity price of a specific crop. When the county yield estimates are released, the county revenues (or payment revenues) will be calculated prior to April 16 of the following crop year. GRIP will pay a loss when the county revenue is less than the trigger revenue. Since this plan is based on county revenue and not individual revenue, the insured may have a loss in revenue on their farm and not receive payment under GRIP. Beginning with the 2004 crop year, the GRIP Harvest Revenue Option (HRO) Endorsement is available. This optional endorsement offers "upside" price protection by valuing lost bushels at the harvest price in

addition to the coverage offered under GRIP.

Group Risk Plan (GRP)
Like GRIP, GRP coverage is based on the experience of the county rather than individual farms, so APH is not required for this program. GRP indemnifies the insured in the event the county average per-acre yield or payment yield falls below the insured's trigger yield. RMA will issue the payment yield in the calendar year following the crop year insured. Since this plan is based on county yields and not individual yields, the insured may have a low yield on their farm and not receive payment under GRP.

Adjusted Gross Revenue (AGR)
AGR is a non-traditional, whole farm risk management tool that uses a producer's historic IRS Schedule F tax form or equivalent information as a base to provide a level of guaranteed revenue for the insurance period. It provides the producer with protection against low farm revenue due to natural disaster or market fluctuation. Covered farm revenue is income from agricultural commodities reported on the Schedule F tax form, including incidental amounts of income from animals and animal products (not to exceed 35% of farm revenue) and aquaculture reared in a controlled environment. Incidental livestock income represents the crop production value fed to livestock. AGR-Lite is a streamlined version of AGR available in limited states offering protection to smaller farms.

Private Named Peril (Crop-Hail)
Private stand-alone insurance policies provide protection against specifically named perils and are paid based on a percentage of damage multiplied by the liability or protection purchased less the deductible. Examples of private, non-subsidized crop insurance programs may include crop-hail, wind, or fire insurance, which offer protection for one specific peril (e.g., hail), and various programs which supplement federally subsidized insurance. The part of a crop damaged by a named peril may be less than the deductible on an MPCI policy. In this instance, crop hail insurance can fill the coverage gap. An MPCI policy protects against losses severe enough to significantly drop the whole farm's yield average. Crop-hail insurance, on the other hand, gives supplemental, acre by acre protection that more accurately reflects the actual cash value of damage from hail.

These products are not federal or state government products and the premiums are not subsidized. However, private products are regulated by the insurance departments in each state and companies must comply with all state insurance laws.

Important Deadlines
Sales Closing: To participate, a person must apply for insurance on or before the applicable sales closing date. This is the last date to apply for crop insurance coverage for any FCIC policy, or make changes in coverage from the previous year. Growers need to decide by this date the type of policy and the level of protection they want. Sales closing dates vary by crop and by state. *Final Planting Date:* Last day to plant unless insured for late planting. *Acreage Reporting Date:* After the crop is planted, producers must report (by type and or varietal group, if applicable) the number of acres insurable and uninsurable for which the insured grower has a share. *Premium Billing Date:* Although premiums are payable on the day after the sales closing date, the policy holder will not be billed until the premium billing date. Generally this date falls near harvest. *End of Insurance Period:* Following this date, the farmer no longer has any production or revenue guarantee on the crop. This date is the earliest date the crop is harvested, abandoned, or totally destroyed, the day the final adjustment on losses is made, or a specific calendar date set in each crop policy. *Date to File Notice of Damage:* This is the last date to give notice of probable loss in order to receive an indemnity payment. Notice is required within 72 hours of the discovery of the damage, but not later than 15 days after the end of the insurance period. *Policy Termination*

Date: If premiums or administrative fees are not paid by this date, the insurance coverage for the following year will be terminated. *Cancellation Date:* Last date to give written notice to the insurance company if the grower does not wish to carry crop insurance the next year. Otherwise, in most cases the policy will renew automatically for another year. *Production Reporting Date:* To keep your APH up to date, you must certify each year the acreage planted and the total production from the previous year.

Process of Getting Insurance

Insurance Cycle. Application needs to be made prior to a specified date early enough that neither party to the insurance contract has knowledge of the crop's production prospects for the year. The application for insurance includes the crop for which the insurance is sought, the county in which it is to be grown, the coverage level and price election at which the crop is to be insured. Historical records will be needed to verify production potential and to establish an APH (actual production history). The next step is to plant the crop prior to the final planting date. After the crop is planted, insured producers must file an acreage report with their insurance provider to certify the number of acres planted, the farming practice (for example, irrigated, non-irrigated, etc.) where appropriate, and any other information required to insure that crop in that area. After RMA accepts the acreage reports, it calculates the amount of subsidy and credits the appropriate amounts to insured farmers and their insurance providers. Premiums and any fees that insured farmers are required to pay are generally billed after the acreage report has been filed and processed. The amount of the premium that is owed depends on several factors, including the number of acres planted, APH yield, level of protection selected and the farming practice. It is the insured's responsibility to follow good farming practices and care for the crop through the growing season and harvest. If a loss occurs they are responsible to inform their agent and continue to care for the crop and obtain consent before any insured acreage is destroyed. An adjuster will verify the loss and an indemnity will be calculated and paid according to the terms of the policy. If no loss occurs, the farmer harvests the crop and reports the actual production to the agent for updating and recalculation of the APH. Insurance policies are continuous and if an insured wishes to discontinue insurance for the next year, they must do so by a specified date known as the cancellation date. The cancellation date is usually the same date as the sales closing date, though minor differences occur on some crops.

Finding an Agent Crop insurance is sold only by agents in the private sector. Use the Risk Management Agency's website (www.rma.usda.gov) to locate an agent in your area, or ask other growers or professionals (such as lenders) you do business with for their recommendations. Check with the insurance agency where you purchase other types of insurance. Often you can obtain crop insurance through an agent you already use for your homeowner's, automobile, fire, health, or life insurance needs. Many insurance agencies have agents who specialize in crop insurance.