



Arlene Boileau
4-H & Youth

Bob Pawelek
Livestock

Clint Jacks
Staff Chair, Madras

Norma Simpson
Home Economics

Sue Ryan
4-H Assistant

Bodie Shaw
Ag & Natural Resources

(503) 553-3238

Internet Address: <http://www.orst.edu/dept/wsex>

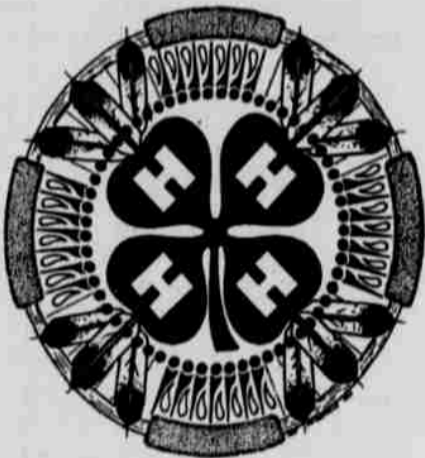
The Oregon State University Extension Service staff is devoted to extending research-based information from OSU to the people of Warm Springs in agriculture, home economics, 4-H youth, forestry, community development, energy and extension sea grant program with OSU, United States Department of Agriculture, Jefferson County and the Confederated Tribes of Warm Springs cooperating. The Extension Service offers its programs and materials equally to all people.



The Clover speaks

by Sue Ryan

Dates have been set for some of our fall 4-H activities-and we will be bringing more detail on the other classes by the next issue. Sign-up dates are different from class to class, so doublecheck on each one. All classes have limits so early sign-up guarantees you a spot. Don't forget that if you signed up for 4-H Culture Camp at Peter's Pasture this summer that you already have filled out a registration form - and this same registration



form is good for the entire school year! So, you just have to come in and sign-up for the individual class. However, if you did not attend camp then you need an official 4-H Registration form filled out completely and signed by your parent/guardian before you can register for fall classes.

Also, a word of advice-please consider what will really work for you and your child when signing them up for classes. Often times parents mean well but cheat themselves and their child by making their schedule too busy and signing up for everything we offer plus more at the school and community center. While we encourage participation we want to make sure that when you sign up you also attend the class you've signed up for. This ensures a fair time for all to take part, especially when we have limits on our classes and often have waiting lists.

Look Who's Cooking-Sign-up begins Sept 29th

This will be our second fall series of cooking-but the class will follow the same theme of a basic introduction to cooking. This was a popular series last year and so we wanted to offer the same course again for those who didn't have a chance to take it the first time.

This course is for 3rd grade and up and will be held for 4 weeks in October. These are the dates and times. (Parents must pick up children by 5:30 p.m.)

There is a limit of 10 for the class

Wednesday, Oct. 1, 3:30-5:00 p.m.
Wednesday, Oct. 8, 3:30-5:00 p.m.
Wednesday, Oct. 15, 3:30-5:00 p.m.
Wednesday, Oct. 22, 3:30-5:00 p.m.

There is no cost for the class, and all cooking supplies are provided by the O.S.U. Extension office. However, as some kids found out last year-cooking can get MESSY! So if you have an old apron or extra large T-shirt your child can wear to cook in it keeps favorite clothes from getting stained.

Sew Easy-Sign-up begins October 6th. This is a new class, but one we had many requests for last year. Sew Easy will cover the beginning steps to sewing and members will work on two simple projects to practice the skills they learn. This series is for 4th grade and up and will be held every other week on Saturdays. These are the dates and times. (Parents must pick up children by 3:30

g-H...more than YOU
ever imagined.

STOCKMAN'S ROUNDUP: Economics of sustainability attainable



by Bob Pawelek
OSU Livestock Agent

Two OSU scientists, Tim DelCurto and Marty Vavra took a look at how beef cattle producers face the dilemma of maintaining economic viability during times of low market values and, more recently, increased public criticism of beef production quality and industry compatibility with the environment.

Following is a discussion by the two researchers and their findings:

Unlike other meat animal industries such as swine and poultry, the beef industry in the western United States is very dynamic with a great deal of diversity. Most of this is related to arid environments and subsequent effects

There is a limit of 12 for the class.

Saturday, Oct. 18, 1:00-3:00 p.m.
Saturday, Nov. 1, 1:00-3:00 p.m.
Saturday, Nov. 15, 1:00-3:00 p.m.
Saturday, Dec. 6, 1:00-3:00 p.m.
Saturday, Dec. 20, 1:00-3:00 p.m.
Tuesday, Dec. 30, 1:00-3:00 p.m.

Most of the materials will be provided by the Extension Office. There may be a small amount of material (1/4 yard or less) that the students will have to provide.

Know Your Indian Government-Sign-up begins September 29th

This citizenship class started last March and we will be offering it each fall and spring. This fall the course schedule will look a bit different, as we have divided topics up into smaller segments. The course will have evening sessions and day sessions and will require the student to get an excused absence from school for the two half-day sessions. These dates are tentative for now, and our advisory committee will approve the final version on October 7th. **Know Your Indian Government** is for students in the 6th - 12th grades.

Wednesday, Nov. 5, 7:00-8:30 p.m.

Wednesday, Nov. 12, 7:00-8:30 p.m.

Wednesday, Nov. 19, 7:00 - 8:30 p.m.

Wednesday, Dec. 3, 12 noon-5 p.m.

Wednesday, Dec. 10, 12 noon-5 p.m.

Wednesday, Dec. 17, 7:00-8:00 p.m.

Traditional Dance Nights-Sign-up begins October 6th

These will be basic activity nights to teach traditional Indian dance. This class is meant for the beginner dancer or someone who wants to practice on what they already know.

Traditional Dance Nights are for 2nd-7th graders.

Saturday, Nov. 15, 6:00-8:00 p.m.

Saturday, Dec. 20, 6:00-8:00 p.m.

While we want everyone to have a fun time at these nights, they are also a serious learning time so that means you must register the same as for other classes. **There will be a limit of 20 students for the Fall Traditional Dance Nights.**

We have some more ideas on the drawing board, but must get commitments from community members to help teach plus flush out the details so take a look at the next edition of Cloverspeaks for what more the 4-H program plans to offer.

Natural Resource notables

Keeping the Farm "All in the Family"

Bob and Jean Nixon have spent a lifetime trying to make the right decisions for their 2500 acre wheat farm near Junction City in the fertile Willamette Valley. But all the right choices and good luck in the world would mean nothing if they weren't able to keep the farm in the family. With plenty of planning and clear communication between the entire Nixon family, they are beating the odds and seem to be successfully passing the farm down to their grown daughter Betty.

"You can have all the desire in the world, but it won't do any good without the planning," says Jean Nixon.

Finances, tax laws, and the increasing complexity of modern day farming all conspire to make it very difficult to keep the family farm within the same family.

"A typical family business going from first generation to second only has a one in three chance of surviving," says Patricia Frishkoff, Director of the Austin Family Business Program at Oregon State University. "Going from second to third generation, about half of the family businesses survive that succession hurdle. I believe the odds aren't even quite that good for farming because it is such a challenging industry in which to survive in the first place."

The Austin Family Business Program offers courses and holds workshops that help Oregon families do the things necessary to keep the business in the family. Many of the "clients" are farmers and ranchers. A series of succession workshops held around the state are underway over the course of the next several weeks.

"The biggest problem is that the farmers-and other business owners-just don't take action," says Frishkoff. "Succession involving your kids and your farm or company is a very emotionally and financially charged issue. A lot of people avoid it because they don't want to talk about issues like money and death. So they don't do the kinds of homework necessary in order to have a succession plan in place."

Betty Marguth, the Nixons' daughter who now is involved in running the farm with her husband, was one of the program's successful succession clients.

"We had the desire to operate the farm, my parents had the desire to turn it over to

us," says Marguth. "But all of us were quite naive thinking it would be smooth."

Marguth is still concerned that the succession will turn out the way everyone wants. Estate planning and tax laws are tall hurdles to clear. Even though taking one of OSU's courses has helped, some of the knowledge has come too late.

Farm parents often dream that their son or daughter will take over the family farm. But it gets complicated right off the bat when there is more than one child. Will both children be able to stay on the farm?

Is the farm financially successful enough to support two or more children, their families, and the parents? Perhaps most importantly, are the children capable of managing a farm in the 21st Century?

"It's not only going to take a lot of agricultural skills, but also a lot of basic business and marketing skills," says Frishkoff. "I think the future generations will have to be far smarter than their moms and dads, their grandmas and grandpas. There is always the risk of having a young person who likes to get their fingers in the dirt but really doesn't have the overall business skill to take over the farm."

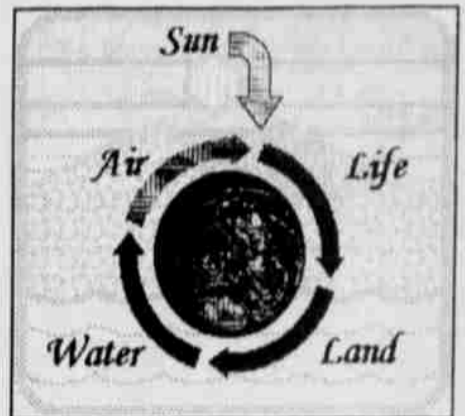
All this is assuming the children even want to stay in the agriculture business.

The solution to all the frustration and complication of succession is good communication and planning. That is what the workshops teach.

"There are two things a farm family needs to do," says Frishkoff. "First, they have to make the time from their day-to-day business to sit down around the kitchen table and have some real heart-to-heart discussions about what family members want and what they have to do in the future. Second, they need to commit the time and the dollars to do the formal planning that will help them keep the farm as a farm, and keep it in their family if that's what they want. The tax laws associated with inheritance are stacked against them and, in order to take advantage of the few opportunities they have, they need to be very proactive in their planning."

The succession "success" stories nearly always involve a family that has done the communicating, the planning, and have had a little luck thrown its way.

"Families need to talk about what is going to happen when dad or mom dies," says Frishkoff. "That's not an easy dinner table



conversation.

The workshops bring together a group of business owners and begin asking those questions. We help families learn not only that it's okay to talk about these things but how to do it."

Work books distributed at the workshops provide a series of "need-to-be-asked" questions so that when the family goes home, it knows exactly what needs to be discussed. There is no single answer to each question. The family also comes away understanding the consequences of not answering those questions.

The succession workshops, sponsored with the help of U.S. Bank, are being held in Medford, Tangent, Portland, Pendleton, Bend, Salem, Eugene, and Newberg over the course of the next three months. While they are open to all family business owners, it is expected that many participants will be farmers and ranchers.

The average age of farm operator in Oregon is 54 years old and getting older, a problem agriculture leaders are trying to solve.

"It is critically important for the younger generation to get very active and involved, become more than a kind of hired help on a family farm," says Frishkoff.

Hopefully, efforts such as the succession workshops will help.

For more information, contact Patricia Frishkoff at (541) 737-6017.

Botulism case calls attention to home food preservation

by Tom Gentle

The first thing you notice during the telephone conversation is that Susan speaks slowly and deliberately. Maybe she simply wants to choose just the right words. Or, you wonder, maybe she still has to struggle to pronounce them clearly.

Even though it is now August, perhaps Susan (not her real name) has not completely recovered from the botulism poisoning she contracted from eating home-canned beets in February 1997.

Susan, who is professionally employed, lives in southern Oregon. She and her mother ate the beets for lunch. Even though the beets had a strange taste, Susan assumed it was caused by an ongoing sinus infection. She remembers not feeling well the next day, but she went to work anyway.

By the end of the day, her vision began to blur. She couldn't touch the tip of her mouth with her tongue, and she had difficulty breathing and keeping her balance. Her mother reported similar symptoms.

Botulism is caused by the Clostridium botulinum bacterial. Inactive spores of this bacteria are found in soil and water throughout the world. The soil in the western United States from the Rocky Mountains to the Pacific Ocean contains a particularly high count of Type A spores, the strain that produces the toxin most dangerous to humans.

In spore form, these bacteria are relatively

harmless. The problem occurs when the spores germinate into growing cells. As the cells grow, they become overpopulated and begin to die, producing a deadly toxin that causes botulism.

Several conditions must be present for the spores to germinate and grow, according to Carolyn Raab, Oregon State University Extension foods and nutrition specialist.

The spores can grow in foods with a lower acid level when oxygen, or air, is not present in the area immediately next to them. "It's possible to have conditions develop in situations that, to the naked eye, do not appear dangerous," Raab said.

Because oxygen-free conditions develop when food is canned, botulism has most commonly been associated with canned foods. Home canning recipes for low acid foods such as vegetables, call for use of a pressure canner to attain temperatures high enough to kill any botulinum spores that may be present.

The home-canned beets that poisoned Susan and her mother had been canned in a boiling water canner rather than a pressure canner. "I learned about botulism as a kid and I knew that certain vegetables had to be processed at higher temperatures than you get with a hot water bath. But I thought that applied only to green beans and tomatoes," Susan said.

While green beans do have to be pressure-canned, tomatoes are more acidic and may be safely processed in a boiling water canner following laboratory-tested instructions.

Although she didn't think it was pertinent, Susan raised the possibility of botulism with her doctor and told him about the beets. In the meantime, the symptoms worsened. Her mother was hospitalized immediately. Three days after eating the beets, Susan went to the hospital. She was experiencing blurred vision, slurred speech, had difficulty walking and no gag reflex.

A paralytic illness, botulism can be mistakenly diagnosed as Guillain-Barre syndrome, stroke, myasthenia gravis and tick paralysis, among others. Treatment includes administration of an antitoxin. Six days after eating the tainted beets, Susan was flown to the Oregon Health Science Center in Portland where she was given antitoxin.

By then she was on a ventilator to assist her in breathing. Her paralysis spread, allowing movement only in her hands and lower legs. She could communicate only by writing messages. Her mother, completely paralyzed and unable to go to Portland, received the antitoxin in southern Oregon.

Susan did not recover quickly. After being removed from a respirator, she experienced another respiratory failure and had a tracheotomy. In mid-March she was moved to the hospital near her home.

After treatment in a transitional center where she learned to use a walker, Susan returned home in early April. Her mother remained in the local hospital and died later that month. It wasn't until July, five months

after the onset of botulism, that Susan had almost fully recovered.

The beets had been a gift from a friend's garden, Susan explained. She had canned them in a boiling water canner, following the directions in a commercial canning book that was 25 years old. It was also the way she and her family had always canned beets. This time however, they ate them raw rather than boiling them first. Boiling would have destroyed the toxin that caused botulism.

Susan's case is far from unique, according to Raab. The US Department of Agriculture made major changes in home-canning recommendations in 1988; anything published before that date should be considered outdated, she pointed out.

"A lot of pre-1988 canning books are still on kitchen and library shelves where they will continue to pose a threat to health," Raab said.

People who are unsure whether home-canned vegetables are safe to eat should boil them for 10 minutes plus one minute for every 1,000 feet above sea level.

For up-to-date instructions on canning foods safely, contact your local county Extension office. An OSU Extension Service Food Preservation Hotline will be operating from 9 a.m. to 4 p.m., Monday through Friday, until September 30 to answer questions. The hotline number is 1-800-345-7319.

As for Susan, one way in which she has begun putting her life back together has been to share her ordeal with others. She hopes her example keeps others from a similar fate.

on forage quality, quantity, and associated relationships to beef cattle nutritional requirements. As a result, the western beef cattle industry is very extensive with optimal production being a function of the resources each ranching unit has available and matching the type of cow and/or production expectations to the available resources. Successful beef producers are not necessarily the ones that wean the heaviest calves, display 95 percent conception, or provide the most optimal winter nutrition. Instead, the successful producers are the ones who display economic viability despite the economic and public pressures that can and will continue to plague the industry.

In a real sense, there is not a right way to manage cattle in the western United States. What works for one producer may not be appropriate for the neighboring ranch. Economic viability often relates to three general factors:

- 1) value of beef,
- 2) input costs per cow, and
- 3) the production per cow.

Unfortunately, beef cow/calf producers are usually considered "price takers" in that they have very little influence on setting market value for commercial beef cattle. In addition, the beef cow/calf industry is one that typically over-produces, which often leads to price scenarios that are less than desirable.

Therefore, the cow/calf producer, by default, must focus on finding an optimal balance between beef cattle production and

economic inputs to attain the associated level of production. In this kind of management scenario, it is not uncommon for a beef cattle manager with modest production expectations, but low input cost per cow, to have similar or better economic prospects than a producer with high beef cattle production expectations. Obviously, the producer with high levels of beef cattle performance had input costs per cow that was greater than the production advantages.

What follows is a general discussion of potential management strategies that may offer economic advantages to western range livestock producers. Many scenarios or strategies may not be appropriate for your environment or production goals. Instead, most of the following information should be considered potential management alternatives that may offer economic advantages by decreasing input costs per cow.

When to calve?

The western beef cattle industry is dominated by spring-calving cattle. If your goal is to match the cow's nutritional requirements to the range forage quality, a producer might coincide calving with the onset of green forage. A typical beef calf does not become a functioning ruminant until almost 4 months of age. This is usually associated with a cow that has passed its peak lactation period (day 70 to 90) and, as a result, calf performance will depend, to a greater degree, on the forage quality available to the calf.

Thus, a calf born March 1, will be effec-

tively utilizing forage available in June. In contrast, a calf born May 1, will not be effectively utilizing forage until August. Because of the vast difference in calf nutrition from day 90 to weaning, the earlier-born calf will have weaning-weight advantages that outweigh the 60 day difference in age. Obviously, if higher weaning weight is a measure of economic importance (you market calves in the fall), then this is your best approach.

Are weaning weights important?

Spring calving cow/calf production with high weaning weights have limited opportunities as stocker cattle on grass markets. Another change in the beef industry is the trend to retain ownership. This has led producers to reevaluate weaning weight goals because of the opportunity to capture weight gains on yearlings in the feedlot.

Fall calving

Some benefits exist with this strategy. By calving during the fall (September to October), a calf is produced that is big enough to efficiently use the early high-quality forage available in the spring; with the cow still producing some milk, to make rapid gains during this period. This program allows calves to stay on the cows longer and continue to make economical gains. In contrast, spring-born calves are often not able to effectively utilize spring and early summer forages.

Likewise, fall calving may provide benefits relative to the environment that calves are exposed to at birth. Typical spring calv-

ing conditions include poor calving weather, long breeding seasons, and problems such as infectious diarrhea and respiratory diseases, which are compounded by calving on wet, muddy ground. Wind is also prevalent in early spring, and wind-chill can adversely affect calf morbidity and mortality.

A potential strategy may be to wean fall calves before turnout. Regardless, dry cows and cows with older calves spread out over the range better improving distribution, and reducing overgrazing associated with poor distribution.

Other considerations

Early weaning as a management tool helps dry cows do better on range forage, improving body condition. This translates into a cow that will be easier to feed during the winter months and have a higher chance of breeding back in a 365 day calving interval.

The producer may also wish to defer grazing of irrigated pasture or native range to the fall or winter months. "Stockpiling" forage by pasture will act as supplementation to hay.

There are several other potential tools or management strategies that may help reduce costs. Obviously, if you are using low-quality roughages, your strategy must emphasize minimizing supplemental costs while maintaining acceptable beef cattle performance.

Keep in mind that western beef cattle producers and resources are dynamic and incorporation of some of these strategies has to fit your production philosophy, production goals, and holistic ranch management plan.