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Calendar Of Events

**May**
- 24-26 ATV Training
- 31 Memorial Day — Office Closed

**June**
- 2 4-H Livestock Judging
- 7-9 4-H Rocket Workshop
- 8 Quality Assurance Training
- 10 Beekeepers Workshop
- 11 4-H Tagging & Tattooing
- 11-3 Babysitting Basics
- 12 Beekeepers Workshop
- 14 Saunders County Extension Board
- 16 4-H Clover Kid Daycamp
- 17 Canning Workshop
- 17 Yeast Bread Workshop
- 21-23 Science/Math Teachers Inservice
- 22 VIP Day
- 22-23 Tractor and Farm Safety Training
- 23 Animal Science Fun Day
- 23 Ag Teacher VIP Day
- 24 Dress for Success
- 24-25 Science/Math Teachers Inservice

**Football and Research**

This is Nebraska — so let’s talk football for a moment. Yes, this article is about administration at UNL’s Agricultural Research and Development Center (ARDC), but we will get to that shortly. And sorry, but we don’t have an inside track on who the starting quarterback for the Huskers will be this year.

So why mention football in an article about ARDC administration? The parallels are there if you look for them. First, let’s look at the “playing field.” With a land base of 9,663 acres making up the ARDC’s “field,” keeping everything operating in harmony is a team effort. (A side note—an acre is roughly the size of a football field—so picture 9,663 football fields of research.)

A football game includes only two teams. But at the ARDC, our teams include more than 15 departments, colleges and divisions within the University of Nebraska system. Since its inception in the early sixties, the ARDC has served to support University of Nebraska research, teaching and extension programs.

The ARDC is a major research and education facility of the Agricultural Research Division of the University of Nebraska’s Institute of Agriculture and Natural Resources (IANR). The size and diversity of the center offers many research and educational opportunities.

Our “team” members are faculty, staff, and students from the various departments that utilize the ARDC. Field-based research is conducted by 90 faculty and 150 graduate students from IANR departments. The team also includes the ARDC administrative staff, Extension educators and staff whose role is to put the information “into play.”

In a sense, the ARDC administration also takes on a “coaching” role—coordinating where the various “teams” conduct research in efficient crop water use saves water and energy.

**Efficient Crop Water Use Saves Water and Energy**

Nebraska has 8.5 million irrigated acres and 100,000 irrigation wells. The Nebraska Agricultural Water Management Demonstration Network (NAWMDN) is designed by UNL Extension to transfer high quality research-based information from the University to farmers’ fields. As producers adopt the latest irrigation water management technologies, they use less water and reduce energy use without reducing crop yield. Participants report saving 2 inches of water/acre for both corn and soybeans. Two inches represents a water savings of about 7 million gallons of water for a typical 130 acre-center pivot. The energy savings would be approximately $2,600/pivot.

Two tools were selected to help producers and crop consultants improve irrigation management decisions: ET gage® or atmometers which mimic evapotranspiration (ET) rates (or crop water use) and Watermark soil matrix sensors which measure soil matrix potential. This information along with crop stage of growth help producers determine when to irrigate. Participants post weekly ET gage® readings online at http://water.unl.edu for use by other producers and crop consultants.

The project began in 2005 with UNL Specialists Suat Irmak and Extension Educators from York, Filmore and Hamilton counties in partnership with the Upper Big Blue NRD and 18 producers. Natural Resource Districts have partnered in this project, offering cost-share to producers to purchase equipment. In 2009, over 400 producers, crop consultants and agricultural professionals participated, with 225 regularly posting data on the website. The project has spread to 37 counties.

UNL Extension Educators Keith Cleven, David Vanier, Arnon Noyen and Michael Rethwisch have partnered with the Lower Platte North NRD to add 45 new producers to the network this year. An additional 80 new producers from the Lower Big Blue, Little Blue, Upper Big Blue, and Central Platte NRDCs are also joining the network.

In southeast Nebraska over 10,000 producers, crop consultants, and agricultural industry professionals have learned about NAWMDN at over 250 Extension-led field days and workshops.

Susan Williams, Southeast Research and Extension Center Director

Learn more about the ET gage® during sessions at the UNL Extension Crop Management Diagnostic Clinics on July 20 and August 19 at the ARDC.
Add Value to Your Calf Crop

Recently, UNL Extension partnered with the Nebraska Department of Agriculture (NDA) on a webinar, “Opportunities to Add Value to Your Calf Crop”. The following verification programs for cow-calf producers were discussed: Source and Age verification; Non-Hormone Treated Cattle (NHTC); Natural; and Never Ever.

Requirements and potential costs for each program that a producer might encounter were explained. Among those discussed was the US Verified™ Nebraska Verified program verifies calves that were born or born and fed in Nebraska. This is an umbrella program for... —Continued on Page 3

Animal Science Fun Day

Area youth—get ready to get dirty at this workshop! See a cow’s stomach contents up close. Try your hand at ultrasounding and more.

Youth can learn about animal science opportunities and career paths from 9 a.m.-3:30 p.m. on June 23 at the first ever Animal Science Fun Day at the ARDC, sponsored by UNL Extension.

Those attending will learn about: livestock nutrition through feed identification, the categories of feeds, and the nutrition research that occurs at the ARDC; beef cattle reproduction by seeing actual reproduction, the categories of feeds, and the nutrition research that occurs at the ARDC; beef cattle reproduction by seeing actual; beef cattle reproduction by seeing actual; feed identification, the categories of feeds, and the nutrition research that occurs at the ARDC; beef cattle reproduction by seeing actual and more.

In the afternoon, participants will team up for the quiz bowl and skill-a-thon events. This will be a test of animal science knowledge and will include parts of what was learned earlier in the day. There will also be time to learn about careers from one of the Animal Science staff.

Cost per person is $10 which includes lunch and materials.
Pre-register by June 15 at (402)624-8030 or (800)529-8030.

Business Center members stationed in Lincoln include Judy Hostetler (left) who works with grant administration and Karen Randall (right) who works with payroll and human resources.

Behind the Scenes and on the Business Side

Spring time at the ARDC is a flurry of activity. Tractors are in the fields. New calves are in the pastures. The landscape is green and growing. And Extension program planning is moving ahead full speed.

Programs are held at the ARDC are a good example of how learning isn’t confined to campus classrooms and laboratories. A significant amount of planning and preparation by the program facilitators, educators, and staff leads up to the event. Planning starts months in advance and ARDC administrative and Extension staff work closely together on the preparations.

A budget is determined. Registration fees and financial contributions are receipted and invoices are processed for payment. Expenditures and revenues are monitored and financial reports generated. Calendars are checked to avoid scheduling conflicts with other events. Programs are placed on public calendars. Media is notified. Mailing lists are determined. Promotional materials are developed and distributed via traditional modes—such as brochures, and through more present day methods, such as e-mails and web updates.

At the same time, resource and demonstration materials are in the works. This may include preparing field plots, Powerpoint® presentations, educational posters and supporting materials, such as reference notebooks.

Plans are made for food and refreshments and other logistics, such as tents, chairs and transportation, when called for.

If the event isn’t at the Christenson Building—additional coordination of logistics is essential, ranging from travel arrangements to packing up all necessary materials.

And it’s show time! Final details are tended to—tents, chairs, and rooms are set up; computers and AV equipment are up and running; posters and easels are transported; cold water is made available for participants on hot days: and any other tasks that are required.

The event is over, but the work for the administrative and Extension staff continues. Materials are inventoried. Educational post- ers are cataloged for storage and indexed on the web. Participant feedback is compiled into reports and distributed to stakeholders. Visit our website at ardc.unl.edu to learn what educational opportunities are on the horizon.

Currently, there are eight business centers within the UNL Institute of Agriculture and Natural Resources (IANR). Each business center includes a manager and staff members who handle human resources/payroll, accounting, grant administration and other specialized services. The development of business centers was a response to several factors, including budgetary issues facing the University, limited financial and human resources, and the University of Nebraska wide Administrative Systems Project implementation of the SAP management software. SAP allows the University to operate one business system for financial management, budgeting, human resource and payroll functions.

By leveraging expertise to develop best business practices, review internal controls, and solve problems jointly, the business center concept improves business processes in a cost effective manner. The framework of a business center also provides the mechanism for improving communications by sharing innovative ideas, improving use of technology, and managing change.

For the past seven years, the business staff at the ARDC has provided professional, high-quality administrative support services to the faculty, staff and administration within the ASSIST Business Center. Effective July 1, 2010, the business staff at the ARDC will join the Greater Nebraska Business Center (GNBC) team. The reorganization opportunity unites the business teams and will strengthen the support to faculty and staff served by the Nebraska Research and Extension Centers.

The ASSIST Business Center, under new leadership and with current Lincoln-based support staff, will continue to serve IANR departments. However, ASSIST and the GNBC will have a reciprocal relationship. For example, some of the financial and payroll responsibilities will be shared and backup personnel resources will be provided when needed. —Mark Schroeder, ARDC director; Ruby Urban, ARDC assistant director; and Deloris Pittman, ARDC marketing and promotions manager.

Mark Schroeder and Ruby Urban take on dual roles in their jobs... Schroeder serves as ARDC director and general farm manager. Urban is the assistant director and the Greater Nebraska Business Center manager.
The ARDC is proud to be a part of the Saunders County community. The August N. Christenson Building serves as a host site not only for University and Extension programs that attract area residents, but is also utilized by many Saunders County organizations and groups throughout the year. Nearly 100 meetings in 2009 were attended by Saunders County residents or hosted by area organizations. This ranges from a variety of 4-H programs to agricultural programs. And it also includes use of the facilities by area entities, such as commodity group meetings and testing by public schools.

Many employees working at the ARDC are Saunders County residents - living in and contributing to the county's economic viability. Likewise, the ARDC makes many business transactions locally. Several million dollars worth of economic activity can be attributed to these actions.

Each year the Nebraska Department of Agriculture, USDA National Agricultural Statistics Service (NASS) Nebraska Field Office, Nebraska Bankers Association, and the Nebraska AgRelation Council produce a Nebraska agriculture fact card. The latest version states that Nebraska ranks first in commercial red meat production (7,717,560 lbs.) and in irrigated land (8,556,595 acres).1

These are only two examples of the impressive ag statistics noted on the card, but they relay the vital role agriculture plays in Nebraska. Research conducted at the ARDC also plays an important role in maintaining and improving the sustainability of agriculture in Nebraska. Our research is based on Nebraska agriculture and seeks to better it.

So if you don’t work directly with agriculture, you may wonder how agriculture affects you. The ag fact card also includes the statement, “Every dollar in agricultural exports generates $1.40 in economic activities such as transportation, financing, warehousing, and production. Nebraska's $5.9 billion in agricultural exports translates into $8.3 billion in additional economic activity.” Our state’s ties to agriculture are vast, whether you work directly in the field or not.

It is so important that the research and educational programs at the ARDC contribute to the livelihood and enhancement of Nebraska’s ag industry. Annually, 5,000 to 7,500 people attend programs, meetings and events at the ARDC. While most of those visitors have direct ag affiliations, not all of them do.

To learn more about research at the ARDC and how it affects you - visit our website at ardc.unl.edu.

1 Source: USDA NASS Nebraska Field Office. (More detailed list of rankings available from USDA, NASS, Nebraska Field Office - Phone (402) 437-5541)

From Start to Finish

The ARDC and Extension staff work together on many projects. In this issue, we feature the ARDC administrative staff’s role in this process. As part of the ASSIST Business Center, the business staff has duties that reach beyond the borders of the ARDC. (Learn more – see article on page 2.)

The business center staff at the ARDC specialize in financial management. Cheryl Sheary has provided accounting support since 1995 and is responsible for all phases of accounts payable, accounts receivable, and purchasing along with data entry into the SAP financial management software system. Because of the large volume of transactions generated by the business center, she focuses on handling ARDC, IANR Agricultural Hall offices, South Central Ag Lab, and Southeast Research and Extension Center transactions.

Marnie Cihal, an office associate, is responsible for vendor and ledger account file maintenance. She is Sherry’s backup for financial transactions and she provides support for Extension field days and other programs. Cihal also provides business support for the agronomy research unit and has worked at the ARDC since 1998.

Lisa Hastings joined the ASSIST Business Center in 2008 as accounting associate. Some of her primary duties include account review and reconciliation, financial reporting, year-end budget projections, asset management, and administrative support. Hastings received her associate’s degree in business administration from Northeast Community College in Norfolk.

Judy Hostetler is a grants specialist with the business center. She has been with UNL since 1994 and joined the ASSIST team in 2004. Her main office is located on UNL East Campus, but she commutes several times a month to serve grants at the ARDC location.

She has assisted Extension educators in securing over $3 million in grants in the past four years. These grants have helped support educational programs for 600 crop producers annually at the Crop Management Diagnostic Clinics, as well as 4-H youth programs in science, engineering and technology which reach over 50,000 youth in the region.

She coordinates and does the reporting of the grants and contracts and works closely with administrators, faculty and staff to insure proper procedures are followed for both pre- and post-award activities. Hostetler also serves as a facilitator for faculty in preparation and submission of grant applications. She monitors grant expenditures to insure accuracy relative to budgets and allowability relative to funding restrictions.

Karen Randall is a personnel generalist with the ASSIST Business Center and has been with UNL since 1991. Randall is involved in all aspects of personnel processing and human resource relations for the departments served by the business center. She is responsible for monthly and bi-weekly payroll and employee leave reports. Randall also provides administrative support to the personnel coordinator in the IANR Finance and Personnel Office. Her office is in Lincoln.

As marketing and promotions manager, Deloris Pittman works with the ARDC, Extension and Husker Architects on marketing efforts. She develops promotional materials, evaluation reports, displays and other materials. Pittman also coordinates, conducts or assists with tours and events and coordinates building use plans with many different groups throughout the year. She has been with the ARDC since 1996 and works primarily from an office in Lincoln, but is often at the ARDC for tours and other events. Pittman has provided accounting support from UNL.

Lisa Hastings (left) and Cheryl Sheary (right) provide financial support not only for the ARDC, but for other IANR departments served by the ASSIST and Greater Nebraska Business Centers.

University of Nebraska-Lincoln

Add Value to Your Calf Crop - Continued from Page 2

IML Global.

Some verification companies have lists of cattle that are provided to feedyards or order buyers. It is important to communicate with sale barns and let them know calves are verified and for what programs. Producers can also visit feedyards that advertise they are seeking cattle to meet certain programs. And the NDA Cattle Feeders Directory lists value-added options as another approach. There are many different options for participation.

The webinar provides details about adding value and how to go about doing so. View the webinar at: http://beef.unl.edu/learning/calcropaddedvalue.shtml.

Then visit the NDA website to see a listing of Nebraska verification suppliers at: www.agr.ne.gov/division/tpd/webinar.htm.

Masek Receives IANR Award

Jerome Masek was selected as the recipient of the UNL IANR Outstanding Employee Award for Office/Service Staff for March 2010. This high honor recognizes outstanding achievement by office/service staff within the UNL’s Institute of Agriculture and Natural Resources.

A nominator stated, “Jerome is our only heavy equipment operator and we rely extensively on his talents and skills to maintain the infrastructure of the ARDC. It is rare to find an individual who is master of so many diverse operations.” Another nominator commented on the extra time and effort Jerome committed to keeping the ARDC operational during this winter’s severe snow storms. The nomination states, “Jerome has always been an exceptional worker, but throughout the winter, he has stood out. Jerome came to work in massive snowstorms as early as 4 a.m.”

Jerome earned his bachelor’s degree in criminal justice with a minor in sociology from the University of Nebraska at Kearney and has been with the ARDC since April 2004.

Summer Science Festival

Youth can take an indepth look into scientific inquiry by participating in the first annual Summer Science Festival. The one-day workshop is scheduled for July 1 at the ARDC. This UNL Extension event is open to all youth who have completed grades 6, 7 or 8.

Hands-on experiments include: finger print analysis, fiber science, biofuels, hydrogels and wind-powered boats. Participants will also experiment with high tech GPS/GIS equipment and see how science and technology can lead to an interesting career that will continue to be in high demand.

Registration forms are available at saunders.unl.edu under the “4-H and Youth” tab. Or call (402) 624-8300 or (800) 529-8300. Registration deadline is June 15 and the cost is $25 per person which includes a noon meal and all program materials.

Sign me up for UNL Extension’s Science Festival - Register by 6/15/10

NAME

ADDRESS

CITY/STATE/ZIP

PHONE

Please return this form with payment to UNL Extension, 107 1 County Road G, Indianola, NE 68013.
Animal Decomposition Study Begins

You may have noticed a large soil excavation going on west of County Road 30. In April, the Nebraska Department of Environmental Quality (NDQE) installed a Cattle Carcass Decomposition Study. UNL, ARDC, and the Peter Kiewit Institute are partners in the study, led by Shannon Bartelt-Hunt, assistant professor, UNL Department of Civil Engineering. Proper disposal of cattle carcasses is vitally important in the state of Nebraska, as the beef industry is the largest single business in the state, with more than 6.5 million cattle. In light of biosecurity concerns that involve transport of carcasses potentially infected with diseases, on-site burial is increasingly recommended as the preferred management option for animal mortalities. Although disposal of animal carcasses will likely have implications for soil and air quality, little information is available on the environmental impacts of on-site disposal practices. Understanding the environmental impacts of on-farm cattle carcass disposal will aid NDQE in developing guidelines that minimize these environmental impacts.

Three 13-foot deep lined pits were constructed, allowing for decomposition. Cattle from natural death were buried in the upper portion of the pits where various studies will continue for at least two years. The study, led by Shannon Bartelt-Hunt, assistant professor, UNL Department of Civil Engineering.