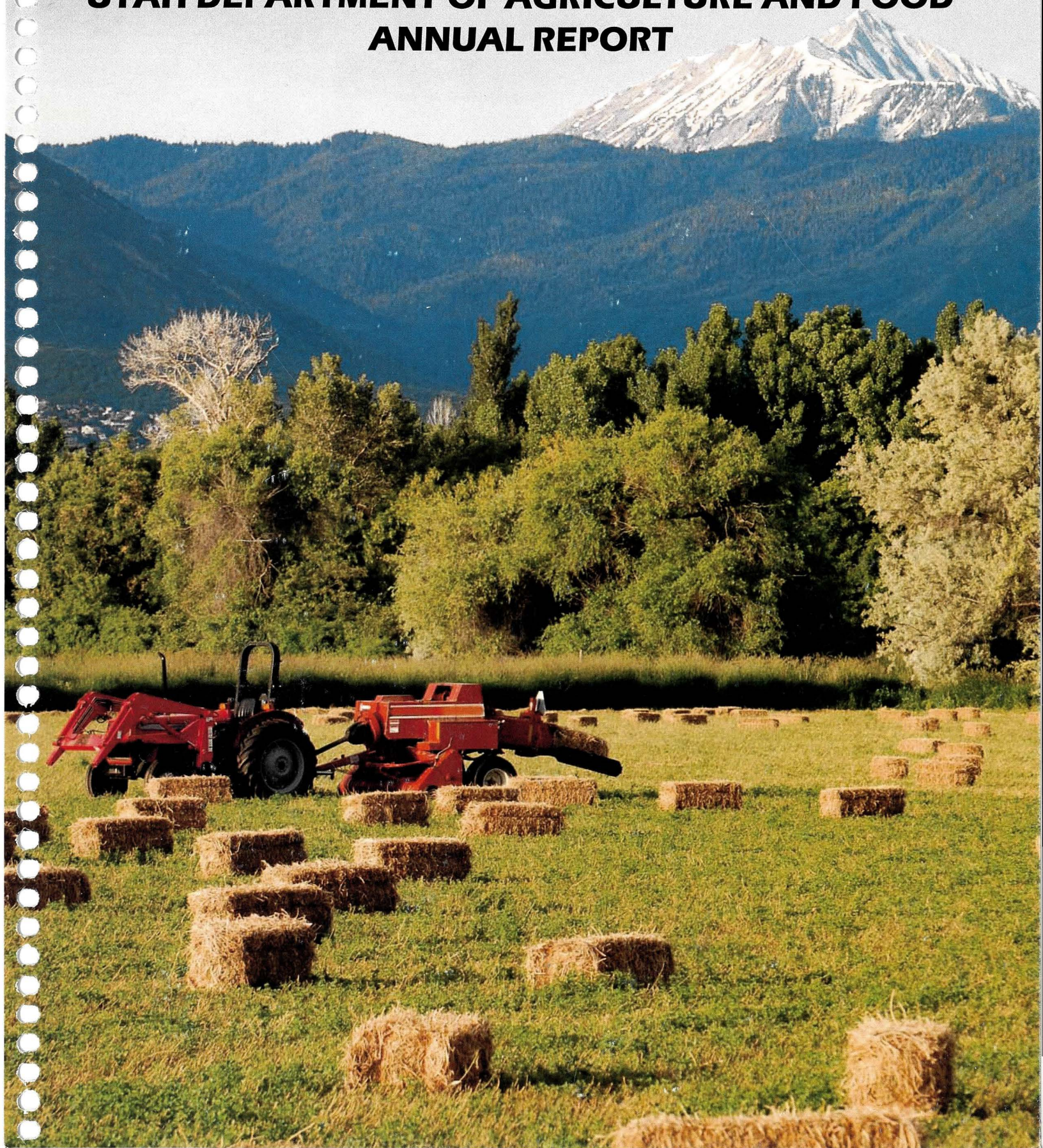


**2011 UTAH AGRICULTURE STATISTICS  
AND  
UTAH DEPARTMENT OF AGRICULTURE AND FOOD  
ANNUAL REPORT**









# STATE OF UTAH

GARY R. HERBERT  
GOVERNOR

OFFICE OF THE GOVERNOR  
SALT LAKE CITY, UTAH  
84114-2220

GREG BELL  
LIEUTENANT GOVERNOR

Dear Friends of Agriculture,

It is my pleasure to present this report on the status of agriculture in Utah.

Among the bright spots this year was Commissioner Leonard Blackham's leadership as President of the National Association of State Departments of Agriculture (NASDA). From that position, Commissioner Blackham worked to reduce the unnecessary regulatory impediments that threaten our farmers' and ranchers' ability to remain in business and produce our food, fabric and forests. Working with NASDA, he also helped advance recommendations to Congress to establish a fair, legal and sensible guest worker program for farm labor.

I am pleased that we formed the Utah Agriculture Sustainability Task Force. That committee is lead by Lieutenant Governor, Greg Bell, with the assistance of Commissioner Blackham, and is working to protect our important farmland while balancing the needs of our growing population.

Another area of progress is the Utah Department of Agriculture and Food's work to improve the overall health of Utah's millions of acres of public and private rangeland. The one-of-a-kind Three Creeks Project in Rich County, when implemented, will improve the landscape health of the region and thus benefit our wildlife, livestock and the environment.

The importance of these projects cannot be overstated, since the benefactors of these efforts are all of us; the 2.76 million food-consuming Utahns who rely on our farmers for healthy, safe and affordable food.

As we move forward, I encourage our citizens and community leaders to recognize agriculture's important role in our lives and take the steps necessary to preserve this vital industry.

Sincerely,

Gary R. Herbert  
Governor

# Introduction

The U.S. Department of Agriculture - National Agricultural Statistics Service - Utah Field Office and the Utah Department of Agriculture and Food are proud to provide the 39th edition of this publication. Copies of the publication are also available on both organizations' Internet sites. Information in this publication is provided to help inform farmers, ranchers, and the public about activities within the Utah Department of Agriculture and Food, and provide a detailed look at Utah's agricultural production. Also included are budgets for helping farmers and ranchers evaluate the potential profitability of various agricultural commodities.

Estimates presented are current for 2010 production, and January 1, 2010 inventories. Data users that need 2010 production information or additional historic data should contact USDA/NASS – Utah Field Office at 801-524-5003 or Toll Free at 1-800-747-8522.

State and U. S. statistics are available on the USDA/NASS Web page at <http://www.nass.usda.gov/>. You can find a variety of estimates by selecting any of the various options on the web page. Use the new and improved “Quick Stats” utility to search for current or historic data by clicking the Data and Statistics tab. The data found can be downloaded or click on the word “spreadsheet” to create an instant spreadsheet of the retrieved data.

Cooperation from farmers, ranchers, and agribusinesses responding to various survey questionnaires is essential for quality estimates. We thank them for their help and willingness to provide individual operation data. We pledge to keep their individual operation data confidential.

Our National Association of State Departments of Agriculture (NASDA) enumerators collect most of the data on our surveys. I enjoy talking to farmers and ranchers and hearing about their experiences with our enumerators.

Prior year estimates are subject to revision and may have been revised in this publication. Data users should use this publication for previous years' data and not go back to earlier publications for those data.

The following agricultural Web page sources may interest you.

Organization	Web Page Address
U. S. Department of Agriculture (Includes links to all USDA Agencies)	<a href="http://www.usda.gov/">http://www.usda.gov/</a>
USDA - National Agricultural Statistics Service (Plus Census of Agriculture)	<a href="http://www.nass.usda.gov">http://www.nass.usda.gov</a>
USDA - Utah Agricultural Statistics	<a href="http://www.nass.usda.gov/ut/">http://www.nass.usda.gov/ut/</a>
USDA - Utah Farm Service Agency, FSA	<a href="http://www.fsa.usda.gov/ut/">http://www.fsa.usda.gov/ut/</a>
USDA - Market News	<a href="http://www.ams.usda.gov/">http://www.ams.usda.gov/</a>
USDA - Utah Natural Resources Conservation Service, NRCS	<a href="http://www.ut.nrcs.usda.gov">http://www.ut.nrcs.usda.gov</a>
USDA - Economic Research Service	<a href="http://www.ers.usda.gov">http://www.ers.usda.gov</a>
Food and Agricultural Policy Research Institute <a href="http://www.fapri.missouri.edu/">http://www.fapri.missouri.edu/</a>	<a href="http://www.fapri.missouri.edu/">www.fapri.missouri.edu/</a>
Fedstats (Statistics from Federal Agencies) <a href="http://www.fedstats.gov/">http://www.fedstats.gov/</a>	<a href="http://www.fedstats.gov/">www.fedstats.gov/</a>
The Federal Register	<a href="http://www.archives.gov/federal-register/">http://www.archives.gov/federal-register/</a>
CME Group	<a href="http://www.cme.com/">http://www.cme.com/</a>
Utah Department of Agriculture and Food	<a href="http://ag.utah.gov/">http://ag.utah.gov/</a>
Utah Department of Agriculture and Food - Market Reports	<a href="http://ag.utah.gov./markets.html">http://ag.utah.gov./markets.html</a>
National Association of State Departments of Agriculture (NASDA)	<a href="http://www.nasda.org">http://www.nasda.org</a>
Salt Lake City National Weather Service <a href="http://nimbo.wrh.noaa.gov/saltlake/">http://nimbo.wrh.noaa.gov/saltlake/</a>	<a href="http://nimbo.wrh.noaa.gov/saltlake/">wrh.noaa.gov/saltlake/</a>
Western Regional Climate Center	<a href="http://www.wrcc.dri.edu/">http://www.wrcc.dri.edu/</a>
Utah Climate Center	<a href="http://climate.usurf.usu.edu/">http://climate.usurf.usu.edu/</a>
USU Extension Service	<a href="http://extension.usu.edu/">http://extension.usu.edu/</a>
Utah Agriculture in the Classroom <a href="http://extension.usu.edu/aitc/">http://extension.usu.edu/aitc/</a>	<a href="http://extension.usu.edu/aitc/">extension.usu.edu/aitc/</a>
National Farmers Union	<a href="http://www.nfu.org/">http://www.nfu.org/</a>
Utah Farm Bureau	<a href="http://utfb.fb.org/">http://utfb.fb.org/</a>
National Cattlemen's Beef Association <a href="http://www.beef.org/">http://www.beef.org/</a>	<a href="http://www.beef.org/">www.beef.org/</a>
American Sheep Industry Association, Inc	<a href="http://www.sheepusa.org">http://www.sheepusa.org</a>
National Dairy Council	<a href="http://www.nationaldairycouncil.org">http://www.nationaldairycouncil.org</a>
The Home Page of Agriculture	<a href="http://www.agweb.com">http://www.agweb.com</a>
Farm Credit Horizons	<a href="http://www.fchorizons.com">http://www.fchorizons.com</a>

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John Hilton, Director  
Utah Agricultural Statistics

**UTAH AGRICULTURAL STATISTICS  
AND  
UTAH DEPARTMENT OF AGRICULTURE AND FOOD  
2011 ANNUAL REPORT**

*Prepared by*

***Utah Agricultural Statistics***

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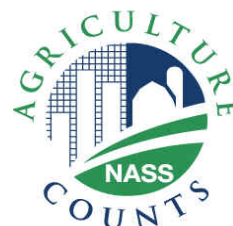
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National Agricultural Statistics Service***

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UTAH DEPARTMENT OF AGRICULTURE AND FOOD  
ANNUAL REPORT



# Utah Department of Agriculture and Food

## Administration

Leonard M. Blackham	Commissioner
Kyle R. Stephens	Deputy Commissioner
Kathleen Clarke	Deputy Commissioner
Larry Lewis	Public Information Officer
Kathleen Mathews	Administrative Assistant

## Division Directors

Stephen Ogilvie, Director	Administrative Services
Jed Christenson, Director	Marketing/Development
Kathleen Clarke, Director	Conservation & Resource Management
Dr. Bruce King, Director & State Veterinarian	Animal Industry
Dr. David H. Clark, Director	Laboratory Services/Chemist
Robert Hougaard, Director	Plant Industry
Richard W. Clark, Director	Regulatory Services
Bill Hopkin, Director	Grazing Improvement
Dr. Chris Crnich, Director	Homeland Security

## Agricultural Advisory Board

Chairman .....	Mark Gibbons Utah Dairymen's Assn.
Vice Chairman .....	Leland Hogan Utah Farm Bureau
Kent Bushman.....	Utah Farmers Union
John Young.....	Utah Wool Growers Association
Dave Eliason .....	Utah Cattlemens Association
Dolores Wheeler .....	Food Processing Industry
vacant .....	Food Supplement Manufacturers
Stuart Sprouse .....	Utah Horse Industry
Wendell Stembridge .....	Utah Assn. of Conservation Districts
Rick Lovell .....	Utah Livestock Marketing Association
Marilyn K. Albertson .....	Consumers' Representative
Dr. Roger Rees .....	Utah Veterinary Medical Association
Haven Hendricks .....	Utah Pork Producers Association
Cliff Lillywhite .....	Egg & Poultry Representative

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For information and numbers not listed below.....538-7100  
Internet: <http://ag.utah.gov> - email: [larrylewis@utah.gov](mailto:larrylewis@utah.gov)

Commissioner's Office	
Commissioner.....	538-7101
Administrative Assistant .....	538-7103
Deputy Commissioner Stephens .....	538-7102
Deputy Commissioner Clarke .....	538-7107
Public Information Officer .....	538-7104
Administrative Services	
Director.....	538-7110
Budget and Accounting .....	538-7032
GIS .....	538-9904
Payroll .....	538-7121
Marketing and Development	
Director.....	538-7108
Deputy Director .....	538-7141
Marketing Specialist.....	538-4913
Livestock & Market News .....	435-230-0402
Conservation and Resource Management	
Director.....	538-7107
Assistant Director .....	538-7175
Ag Resource Development Loans.....	538-7030
Environmental Quality Information Specialist .....	538-7098
Conservation Commission .....	538-7171
Grazing Improvement Program (GIP).....	538-4927
Animal Industry	
Director.....	538-7162
State Veterinarian .....	538-7166
Animal Health .....	538-7164
Animal Identification (Brands).....	538-7137
Aquaculture .....	538-7029
Elk Farming .....	538-7164
Meat Inspection .....	538-7117
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Feed & Fertilizer Laboratory.....	538-7133
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Seed & Feed Inspection.....	538-7187
Grain Grading Lab (Ogden UT).....	392-2292
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Meat Compliance .....	538-7144
Metrology (measurement) Laboratory .....	538-7153
Motor Fuels Testing Laboratory.....	538-7154
Weights & Measures .....	538-7158

Commissioner of Agriculture  
and Food  
Leonard M. Blackham



Greetings.

Agriculture in Utah enjoyed a generally positive year in 2011 as prices paid to cattle and sheep ranchers reached all-time highs. The same was true for our crop farmers and hay producers. Finally, a year that reversed the recent trend of low farm prices that threatened the stability of our family-owned farms. The poultry, dairy and hog industries saw prices that at least helped them remain in business.

While we were blessed with an abundance of snow and rain this past winter, some of our producers suffered from flooding as the warming spring temperatures sent our rivers and creeks over their banks.

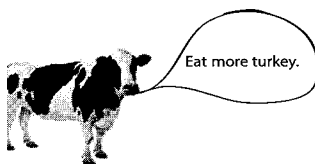
Personally, I enjoyed my time as president of the National Association of State Departments of Agriculture (NASDA) as our organization regularly met to find solutions to a myriad of challenges that face agriculture on a national level. One important issue that we addressed was the need for a fair, legal and sensible system that addresses the labor needs on the farm. In September, the NASDA body met in Salt Lake City to unanimously adopt the Utah Compact as a foundation for a national guest worker program for agriculture. Our future food security needs are too important for agriculture to not lead the way in finding a solution to this very difficult issue.

I thank you for your interest in Utah agriculture, and invite you to review our annual report to learn more about these and other important issues.

Sincerely,

A handwritten signature in cursive script that reads "Leonard M. Blackham".

Leonard M. Blackham  
Utah Commissioner of Agriculture and Food



# Mission Statement

**The mission** of the Utah Department of Agriculture and Food is to “Promote the healthy growth of Utah agriculture, conserve our natural resources and protect our food supply.”

It is also believed that a safe food supply is the basis for health and prosperity. The Department's **Vision Statement** is: To be the recognized guardian of Utah's food supply and sustainable agriculture.

## **The Department values:**

- Integrity and respect
- Service and hard work
- Stewardship and accountability
- Growth and achievement
- People and partnerships
- Heritage and culture

Food safety, public health and consumer protection is a critical and essential function of state government. In order to accomplish this mission, with increased population and industry growth, we are identifying ways and means to fund the regulatory functions of the Department. In addition, we continue to educate the public about the importance of agriculture and the value of maintaining a viable agriculture industry.

We will promote the responsible stewardship of our state's land, water and other resources through the best management practices available. We will promote the economic well-being of Utah and her rural citizens by adding value to our agricultural products. We also aggressively seek new markets for our products. And we will inform the citizens and officials of our state of our work and progress.

In carrying out that mission, Department personnel will take specific steps in various areas of the state's agricultural industry, such as the following:

## **Regulation**

Department operations help protect public health and safety as well as agricultural markets by assuring consumers of clean, safe, wholesome, and properly labeled and measured or weighed products. This includes products inspected by UDAF's animal industry, plant industry, weights and measures, and food and dairy inspectors, compliance officers and field representatives. It involves chemical analysis by the state laboratory, which is part of the Department. It also includes other consumer products such as bedding, quilted clothing and upholstered furniture.

This inspection also protects legitimate producers and processors by keeping their markets safe from poor products and careless processing.

## **Conservation**

Through its variety of programs in this area, the Department will work to protect, conserve and enhance Utah's agricultural and natural resources, including water and land, and to administer two low-interest revolving loan funds aimed at developing resources and financing new enterprises.

## **Marketing and Development**

UDAF marketing section strengthens Utah's agriculture and allied industries financially by expanding present markets and developing new ones for Utah's agricultural products, locally, in the United States, and overseas as well. It also helps develop new products and production methods and promotes instate processing of Utah agricultural products for a stronger state economy.

This annual report is available on the Internet at:  
[www.ag.utah.gov](http://www.ag.utah.gov)

Visit our website on your mobile device by scanning this Quick Response code.





# Commissioner's Office

The Department continues to prioritize its programs based on the changing needs of its customers. The pesticide safety program, for example, rewrote the Pesticide Rule in response to increased infractions discovered following the investigation of the deaths of two Layton children in 2010.

In the area of farmland protection, the Department is a major participant in the Agriculture Sustainability Task Force which is looking for ways to protect Utah farm and ranchland. An August 2011 survey of Wasatch Front residents confirmed the public's support for protecting farmland. Results of that survey show:

- 97% of respondents view farming and ranching as important to the future of the State of Utah.
- 80% believe converting farmland into subdivisions will eventually lead to greater dependence on foreign food.
- 77% feel livestock grazing on public land is acceptable.
- 76% of respondents support using a small portion of the existing tax on food to protect Utah farmland.
- 52% believe the Utah Legislature should divert taxpayer dollars into the LeRay McAllister fund to protect local farmland.

The Department's AgriAdvocates campaign is another program designed to educate Utah consumers about the value of Utah farms and ranches.

The second annual "Farming at the Market" event was held at the downtown farmers market in Salt Lake City in August to promote more public awareness of Utah agriculture. Visit: [www.agriadvocates.org](http://www.agriadvocates.org).

The Utah's Own program has long understood and promoted the importance of locally grown foods.

Utah's Own is working with the growing number of urban farmers as a means to educate the larger Wasatch Front population about the connection between their food and the farm.

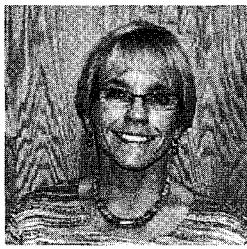


A major event this year was Commissioner Blackham's leadership of the National Association of State Departments of Agriculture (NASDA). Its annual meeting was held in Utah Sept. 14 - 19. As president of NASDA, the Commissioner worked to reduce the unnecessary regulatory impediments that threaten farmers and ranchers ability to remain in business. In Salt Lake City, the NASDA board unanimously adopted the Utah Compact, which is a foundation of principles that address immigration and farm labor issues.

The Utah Grazing Improvement Program (UGIP) is focused on improving grazing management by increasing water availability and building fences to enhance control of livestock. By summer 2012, we estimate that the program will have benefited 2.1 million acres. UGIP participated in the rehabilitation of rangeland devastated by the 2007 Milford Flat fire. Today the range grasses are less fire prone and resistant to large dust storms that contribute to Wasatch Front pollution.

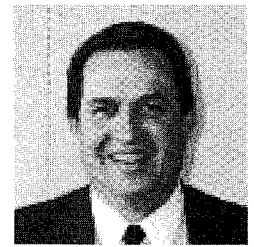
UDAF/UGIP is currently working with partners in three large-scale projects in Rich, Carbon, and Box Elder Counties that total over 1.5 million acres. We believe that investing human and financial resources to create financial, social, and ecological wealth from the public and private rangelands of Utah will elevate the lives of every Utahn.

Information about these and other programs is available at: [www.ag.utah.gov/](http://www.ag.utah.gov/)



Kathleen Clarke  
Deputy Commissioner

# Deputy Commissioners



Kyle R. Stephens  
Deputy Commissioner

Kathleen Clarke is responsible for overseeing the conservation programs at the Department and is the key contact for interagency partnerships and programs that focus on enhancing the health and productivity of Utah's public and private lands.

Kathleen works to expand watershed and range restoration programs, and to develop improved landscape level management practices and partnerships. She will also work with the Executive Team at UDAF to enhance public awareness and appreciation of the role agriculture plays in our "quality of life" in Utah, both for the production of food and fiber but also in the stewardship of Utah's priceless lands and natural resources.



Kyle Stephens is responsible for and coordinates all of the day to day Department activities and works with each division on their program budgets and goals. Kyle coordinates the Certified Agriculture Mediation Program and the Utah Horse Racing

Commission. Is the Treasurer for the Agriculture in the Classroom Program, promulgation of all Department Administrative Rules, collection of predator assessment head tax, is the Department's Hearing Officer and serves on the Utah Dairy Commission and Utah Dairyman's Association as an ex-officio member. Kyle also oversees and coordinates the Department's Balanced Scorecard that is an outcome-based measure of our performance.

## Public Information Office

The office of Public Information is an important link between the public, industry, employees, and other state agencies. The office publishes various brochures, articles, newsletters, web pages, videos as well as create displays and computer presentations. The office also writes news releases and responds to news media enquires about agriculture and the UDAF. The office has added video-tape capabilities to produce video news releases and video clips that can be viewed at <http://ag.utah.gov/media/index.html>

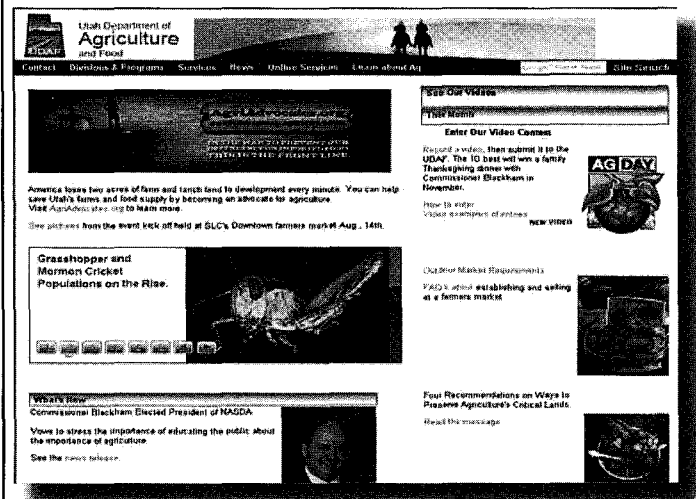
During the past year, the office created public awareness campaigns for many of the department's activities such as: Food safety inspection recalls, Grazing Improvement Program, Healthy Landscapes, Japanese beetle eradication program, Mormon cricket and grasshopper control.

The Public Information Office also interacts with local schools, offering students lessons on the connection between the farm and our food. A complete list of UDAF news releases is available at: [www.ag.utah.gov/news/index.html](http://www.ag.utah.gov/news/index.html)

## Agriculture Mediation Program

The Department continues to provide services to the agriculture community through its USDA Certified Mediation Program. The program assists farmers and ranchers who face adverse actions in connection with USDA programs. Utah is one of 34 certified programs and has administered this program since 1988.

Utah farmers and ranches who rely on the Certified State Agriculture Mediation Program to help them through difficult economic times have had that valuable service extended after the passage of the Agriculture Mediation Bill. The program helps farmers and ranchers seek confidential advice and counsel to address loan problems and disputes before they grow to be too much for the producer to handle. The legislation will continue to authorize funding of the Certified State Agriculture Mediation Program for five years. Mediation provides a neutral, confidential forum to discuss complex issues and build strong working relationships with producers, lenders and government agencies.



[www.ag.utah.gov](http://www.ag.utah.gov)

Thousands of Internet users visit the Department's website each month looking for crops reports, livestock entry permits, news about agriculture and to use our online services.

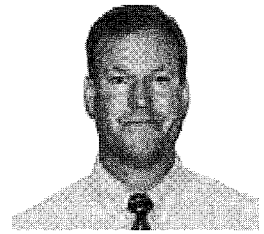
## Agriculture in the Classroom

The mission of AITC is to increase agricultural literacy in Utah by developing a program that improves student awareness about agriculture and instills in students an appreciation for our food and fiber system. This program is necessary because agriculture affects our quality of life and our environment.

The AITC program receives funds from private donors, state funding sources, and grants. These funds are leveraged to meet the programs mission through teacher training, and classroom materials that effectively and efficiently meet the need to increase agricultural literacy.

# Animal & Wildlife Damage Prevention

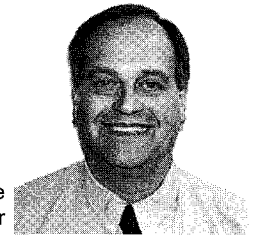
Mike Linnell  
Federal Program Director



The Utah Wildlife Services (WS) program is a cooperative effort between the Utah Department of Agriculture and Food and the U.S. Department of Agriculture. Protecting Utah's agriculture includes protecting livestock, with the majority of the program's effort directed at protecting adult sheep, lambs, and calves from predation. Funding for the program comes from a number of sources, including federal appropriations and state general fund. Livestock producers also contribute through a state tax nicknamed the "head tax" because it is assessed per head of livestock. Individual producers, livestock associations, and counties also make voluntary contributions to the program to pay for contract helicopter flying. Coyotes remain the most problematic predator species in Utah, both in population size and in the amount of livestock they kill. Calves are vulnerable to coyote predation for a short period just after birth, and the majority of the calf protection is concentrated in the spring calving season. In the absence of predator management, calf losses could exceed 5% for producers, however, with predation management in place, losses are kept to less than 1%. Sheep and lambs remain vulnerable to predation throughout the year and the WS program works with sheep and goat producers to provide protection on spring lambing range, summer range on the mountains, and on winter range in the deserts. In the absence of protective efforts, it is estimated that lamb losses could be as high as 30%, but the WS program in Utah keeps predation losses to less than 5% on a statewide basis. Cougars and bears are also a significant predator of sheep, especially in the summer when sheep are grazed in the mountains. Of the predation on lambs reported to WS, about 40% are by these two predators. Predation management for cougar and bear is implemented on a corrective basis only, and does not begin until kills are discovered and confirmed. In order to limit losses caused by cougars or bears, the WS program must be prepared to respond quickly when killing occurs. A significant amount of predation management is necessary to improve wildlife populations, and the WS program works with the Utah Division of Wildlife Resources (UDWR) to provide protection where wildlife populations are below objectives. In 2011 the WS personnel worked in 25 deer units, 10 sage grouse areas, 4 bighorn sheep areas, 5 pronghorn areas, and 7 waterfowl/shorebird nesting areas, with the specific objective of protecting these valuable wildlife resources. WS also provided protection for endangered black-footed ferrets and Utah prairie dogs in transplant areas. To assure that the WS program has no negative environmental consequences, Environmental Assessments (EA's) have been completed to assess the impacts of the program. While the program is very successful at protecting livestock and selected wildlife resources, there are no negative impacts to overall predator populations, wetlands and watersheds, or other parts of the environment. Annual monitoring of our program impacts is conducted to assure

that the analyses in the EA's are still complete and remain valid. Personnel from the WS program have participated in wolf training as the State prepares for dispersing wolves from recovering populations in adjacent states. A significant amount of time and effort is necessary to assure that programs are in place to deal with wolves as they arrive. Per direction from the Utah Legislature, a wolf management plan has been put in place and the Agriculture and Wildlife Damage Prevention Board has adopted the role prescribed by the plan for the WS program. State WS personnel will be primary responders when livestock are killed by wolves, as well as assist in the capture, radio collaring, and monitoring of non-depredating wolves. WS personnel are widely recognized as the experts in dealing with predator-related problems, and our skills are needed to assure professional management of wolves as federally protected wildlife and through the transfer of authority to a state managed species. The WS program plays a critical role in the early detection and management of wildlife-borne diseases. WS is conducting surveillance for early detection of highly pathogenic Avian Influenza. The WS program has assisted the UDWR in the removal and testing of mule deer where the potential transmission of Chronic Wasting Disease is a concern. WS has collected samples for plague, tularemia, West Nile Virus, and raccoon roundworm monitoring around the State, and responds to mortality events in wild birds to assist in detection of diseases. WS has a full-time wildlife disease biologist position to coordinate rapid response and sampling efforts within WS and other agencies. Because our personnel are located throughout the state and are experts in back-country work, our help is often solicited in recovery of disease samples and even in human search and rescue missions. The WS program also deals with other wildlife related damage throughout the State, such as wildlife hazards to aircraft and urban wildlife problems. In Salt Lake County, WS operates an urban wildlife damage program which helps businesses, home owners, and public institutions with wildlife problems. Raccoons and skunks cause significant problems and WS provides technical assistance to alleviate these problems, as well as assisting in the removal of individual animals causing damage. Urban waterfowl, such as mallard ducks and Canada geese cause damage to landscaping and are a human health and safety concern. WS also conducts disease monitoring in the urban program and responds to human safety cases involving cougars or bears statewide when requested by the UDWR. The public, including farmers and ranchers, place a high intrinsic value on wildlife. In order to maintain healthy populations of wildlife and concurrently sustain productive agriculture, a professional wildlife damage management program must be in place to mitigate the damage while protecting wildlife populations. In Utah the cooperative Wildlife Services program fills that need.

# Administrative Services



Stephen Ogilvie  
Director

The Division of Administrative Services provides support to all divisions within the department to insure state policies and procedures are implemented to meet audits conducted throughout the year by state finance and the state auditor's offices. We have added new federal grants each year and to date we are tracking more than 30 federal grants. We are responsible for processing more than 450 state grants and contracts annually. Purchasing cards are being used by the majority of the field staff, and few requests for petty cash reimbursements are being requested by employees.

## Risk Management

The Department's Risk Management Committee meets quarterly to review liability issues. The State Division of Risk Management annually inspects offices leased by the Utah Department of Agriculture and Food and provides recommendations that will assure conformance with applicable safety standards and fire code. The Accident Review Committee is required to notify drivers who have had preventable accidents to take driver's safety training and/or certification to continue driving state vehicles.

## Geographical Information System

The Geographical Information System (GIS) section provides mapping support for Insect Programs, Groundwater, West Nile Virus, and Homeland Security data collection along with many other programs. We are working with Department of Technology Services (DTS) in updating our web page.

## Other Services

The division provides building security & surveillance, mail distribution, audit services, asset management, surplus and many other services.

## Department of Technology Services Accomplishments for 2011

### Horse Travel Permits

When traveling anywhere in Utah with a horse (including riding them) you are required to have proof of ownership or written permission from the owner. A popular way to do this is to obtain a horse travel permit from the Department of Agriculture and Food. These permits can be temporary or the owner can obtain a permit that is good for the life of the horse.

In previous years, lifetime horse travel permits required a state brand inspector to see proof of ownership, fill out an application, draw the horse's markings on the application, then mail the application to the main Agriculture and Food office. The Brand Recorder (a UDAF employee) would then hand draw the markings on a special card stock form, type the information on that

card stock form, laminate it, and mail the 4x5 inch permit to the owner. It didn't fit in a wallet and turn around time was not quick. When a request to verify a permit was received the Brand Recorder found herself crawling into a series of cabinets looking for the original application. DTS has created the Horse Travel Permit application. This application allows storing and issuing of lifetime horse travel permits electronically. The brand inspector can take a photograph of the horse jot down the information and email it to the main office. The Brand Recorder now loads (or scans) the horse image into a database, enters the owner and horse information and prints a wallet card (credit card size) with the photo on one side and the owner / horse information on the other. The Brand Recorder can easily transfer a permit from one owner to another if the horse is traded (or a sale) takes place. The owner is able to go online to lookup the permit or order a duplicate. Law enforcement can go online to verify horse permits.

## FSMS (Food Sanitation Management System)

2011 enhancements: DET enhanced the Client/Server application to comply with new federal rules and eliminate inefficient synchronization between 3 databases.

## RUP (Restricted Use Pesticide)

This new application allows electronic upload and analysis of pesticide sales records to help spot violations and protect the public from untrained sprayers using dangerous pesticides inappropriately.

## Windows 7 Testing and Application Upgrades

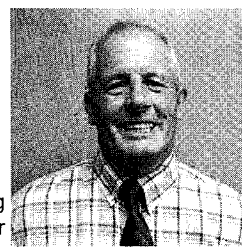
All DAF applications were testing under Windows 7 (64 bit) and upgraded to work with Windows 7 (64 bit).

## Other Accomplishments:

- Customized and implemented use of DTS Project Development forms.
- SQL 2005 to SQL 2008 Upgrade SQL back-end databases.



# Animal Industry



Dr. Bruce King  
State Veterinarian & Director

The Animal Industry Division of the Utah Department of Agriculture and Food has six main programs:

- 1) Animal Health – focused on prevention and control of animal diseases, with special attention to diseases that can be transmitted to humans.
- 2) Meat and Poultry Inspection — to assure wholesome products for consumers.
- 3) Livestock Inspection (brand registration and inspection) — to offer protection to the livestock industry through law enforcement.
- 4) Fish Health — protecting the fish health in the state and dealing with problems of fish food production and processing.
- 5) Elk Farming and Elk Hunting Parks – Regulating this new domestic livestock industry with an emphasis on protecting our wild elk population
- 6) Veterinary Diagnostic Laboratories - for disease diagnosis and surveillance.

Major accomplishments in these areas during the past year are as follows:

## Animal Health

During the past year, disease free status was maintained for the following diseases:

- Brucellosis
- Tuberculosis
- Pseudorabies
- Salmonella pullorum
- Mycoplasma gallisepticum

Disease monitoring for heartworm, equine encephalitis (Eastern, Western, and West Nile), equine infectious anemia, rabies, brucellosis, tuberculosis, pseudorabies, Salmonella sp., Mycoplasma sp., BSE (Bovine Spongiform Encephalopathy), CWD (Chronic Wasting Disease), trichomoniasis, etc. has continued during the past year.

An outbreak of equine herpes virus type 1 (EHV-1) was associated with an equine event in Ogden. An unknown number Utah horses were exposed at this event but a total of 51 were documented to have attended the event. Of these horses, 10 horses became ill and one was euthanized after going down with the disease. Those horses that attended the event in Ogden further exposed over 160 horses when they returned from the event. Of the secondary exposed horses, six became ill and one was euthanized. A total of eight premises were eventually quarantined as the result of having at least one confirmed or suspect case housed on the premises. Other states, mostly in the western U.S., also had cases of equine

herpes virus type 1 as a result of horses attending this event.

Over 15,000 bulls were tested in the trichomoniasis testing program from October 1, 2010 to June 30, 2011. Testing identified 33 infected bulls. The infected bull numbers for this disease are up from 26 the previous year but still low compared to when the program started in 1999.

Monitoring for avian influenza is continuing in Utah. Serological samples for avian influenza are taken and tested from each egg laying flock of chickens in the state quarterly. A minimum of 60 serological samples are taken at the turkey processing plant per month and monitored for avian influenza. The results of these tests are reported to the state veterinarian.

The division also administers the National Poultry Improvement Plan (NPIP) in the State. This is a voluntary testing program wherein a flock may be certified disease free in several important disease categories. Participants in the program enjoy significant benefits when shipping birds, eggs, and products in commerce.

The division is responsible for licensing hatcheries, qualified feedlot operators, and swine garbage feeders in the State. There are 22 hatcheries, one qualified feedlot operator and no swine garbage feeders licensed in the State.

Division veterinarians continue to monitor livestock imports into the state by reviewing incoming Certificates of Veterinary Inspection (CVI) and issuing livestock entry permits to animals that meet Utah entry requirements. Violations of Utah import regulations were investigated and citations issued. CVI from other states were monitored, filed, and forwarded to our animal health counterparts in the states of destination.

Animal health has the responsibility of providing veterinary supervision and service to the livestock auction markets in Utah in the continued oversight of the Division's disease control and monitoring plan. This program is administered by the Division of Animal Industry, using private veterinarians on contract with the state. More than 300 weekly livestock sales were serviced under this program. Division veterinarians also served at several junior livestock shows around the state to verify the health of the livestock prior to being admitted to the show.

## Meat Inspection

The Meat Inspection Program added one official establishment and one custom exempt establishment to the program during the past year. Constant change within the Meat Inspection Program on the national level necessitates training of inspectors and plant owners on a continual basis that is real and ongoing.

The Utah program is considered equal to the federal meat inspection program. We currently have three state slaughter plants, 10 state slaughter and processing plants, eight state

processing only plants, with 1 Talmadge Aiken (T/A) slaughter plant, 5 T/A slaughter and processing plants and 9 T/A processing only plants which that gives us a total of 36 official plants. We also have 43 custom exempt plants and 32 Farm Custom Slaughter licensees (mobile slaughter unit) for a total of 111 establishments or mobile slaughter units throughout Utah.

The Utah Meat Inspection Program was scheduled for a federal in-plant audit in the summer of 2011. The federal audit team selects a number of state slaughter and processing facilities to conduct an in plant audit once every four years if there are no major findings from the previous audit. Once a year we supply to the federal state audit branch a comprehensive state assessment that covers nine components. Component 1: Statutory Authority, Component 2: Inspection, Component 3: Product Sampling, Component 4: Staffing and Training, Component 5: Humane Handling, Component 6: Non-Food Safety Consumer Protection, Component 7: Compliance, Component 8: Civil Rights, and Component 9: Financial Accountability. We have to provide documentation that show we are in compliance with all nine components. We have from August 15th to November 15th of each year to provide the information.

We are currently testing for three major pathogens: Salmonella, E coli 0157:H7 and Listeria monocytogenes. We are also testing for biological residue in cattle. Bovine Spongiform Encephalopathy (BSE) continues to be an issue in the regulatory environment. Each establishment that slaughters or handles carcass beef are required to have a written plan on how they would handle specified risk materials from these carcasses. This is just one of many federal rules and regulation that the small and very small establishment owner must comply with to remain in business. The Utah Meat and Poultry Inspection Program personnel have tried to help these small and very small business owners as much as it can to make sure it understands what is required to remain in compliance. For many years the regulations to inspect custom exempt plants was vague and not enforceable. We now have a federal regulation that governs Custom Exempt facilities. The new regulation will bring consistency to the custom exempt program.

We presently have 21 dedicated meat inspectors in the program including one who are Enforcement Investigation Analysis Officers (EIAO). They perform Food Safety assessments in all state inspected facilities. Each assessment takes from 4 to 6 weeks. We also have two trainers that perform training activities throughout the state and one custom exempt specialist that perform sanitation inspections in all the custom plants throughout the state. Utilizing three frontline supervisors we have been able to achieve a top rating for 2010 for our meat inspection program.

#### Livestock Inspection

The Livestock (Brand) Inspection Bureau's job is to protect the livestock industry from accidental straying or intentional theft of livestock. The program consists of 14 full time special function officers and 50 part time inspectors. In addition to inspecting all cattle and horses at the state's six weekly auctions, field inspections are done on all livestock prior to changing ownership, leaving the state and going to slaughter.

During 2010, a total of 660,399 individual cattle, horses

and elk were inspected. This represents a total of 25,348 inspection certificates issued. Livestock worth an estimated \$809,505 was returned to their proper owners. This was a slight increase in animals inspected from the previous year.

Brand renewal was held in 2010. Each brand owner renewing their brand received a plastic wallet sized "proof of ownership" card. The ownership card is intended for use during travel and when selling animals at auctions. Utah has a total of 13,972 registered cattle/horse brands, cattle earmarks and sheep brands and earmarks. A brand book and CD are available for purchase that have the latest information. It is also found on the department web site. In addition to this, the Brand Bureau is actively involved in tying the existing brand program to the new Federal Animal Disease Traceability Program, where each livestock owner will be required to identify his livestock before moving interstate. They may also choose to record a premises number that ties his address to a computer number for ease of use. This number was added to the brand card for easy reference as the system develops. There are approximately 11,500 Utah premises recorded. Utah ranks among the top ten states in the nation in percentage of premises recorded.

During the year brand inspectors collected \$537,476 in Beef Promotion Money. The Brand Bureau started collecting the cattlemen's part of predator control money in 1996. During 2010, livestock inspectors collected almost \$81,000 in predator control money. This money, like the beef promotion money, which has been collected by the brand inspectors for many years, will simply be forwarded to the Wildlife Services Program for its use. Sheepmen will continue to have their allotment collected by the wool houses and forwarded to the department. In an effort to assist and give training to the state's port of entry personnel, a livestock inspector was assigned to work monthly in each port of entry. These inspectors are authorized and equipped to pursue those livestock transporters who ignore the signs requiring all livestock hauling vehicles to stop. This is an effort to help prevent diseased animals from entering the state and stolen animals from leaving the state.

A heightened awareness in the meat industry has also resulted in the upgrading of the Farm Custom Slaughter Program to insure the meat derived from home grown, non inspected livestock is prepared under the best conditions possible. The killing of "downer" non ambulatory animals has been eliminated from this program due to the BSE positive cow found in Washington State December 23, 2003.

In September 2005 a range rider/investigator was hired to travel from county to county in an effort to prevent intentional and accidental taking of another's animals as they forage and are removed from open range situations. He has been actively involved in 24 cases of theft and loss of livestock during the 2010 year.

#### Elk Farming

The Department presently has 36 farms and 9 hunting parks licensed with a total of 3167 domestic elk on inventory. CWD tests were performed on all domestic elk that died or were harvested in 2010. No positive samples were found. No elk were reported as escapes in 2010 but were either captured or har-

vested prior to them making it to the wild. The majority of the animals are sold to hunting parks as trophy animals or sent to packing plants for processing of a "leaner" meat product.

### Fish Health

The fish health program controls the spread of disease among the commercial aquaculture facilities and prevents the entry of fish pathogens into Utah. This is accomplished through regulation, prevention, inspection, licensing, approving in-state facilities and out-of-state aquaculture facilities for live sales and entry permits.

Also, program members work closely with other state agencies in disease prevention and control to include the Utah Fish Health Policy Board, pathogen committees, aquatic invasive species task force and mercury working groups.

Licensed facilities include 14 commercial aquaculture facilities, 105 fee fishing facilities, five brokers, four mosquito abatement districts, and six fish processors. The fee-fishing facilities were licensed for 15 species of aquatic animals including channel catfish, diploid and sterile rainbow trout, bluegill, largemouth bass, diploid and sterile brook trout, diploid and sterile brown trout, cutthroat trout, fathead minnow, smallmouth bass, triploid grass carp, black crappie, Gambusia, tiger trout, tiger muskie, wipers and muskie.

During the period, there were 10 approved requests forwarded by UDAF to UDWR for new species. During the period, 70 entry permits were issued for 18 different species of aquatic animals for a total of approximately 1,072,230 fish and 3,078,230 eggs of live aquatic animals imported into Utah. Total fish and eggs imported into Utah approximated 4,150,460. A total of 48 imported populations were diploid fish species and a total of 23 imported populations were sterile fish species.

Inspection, water quality and health surveillance services included 32 on-site inspections or disease surveillance visits. Included in that total were 14 aquaculture facility inspections for approval to sell all species of live fish, including trout. Eighteen water quality tests were conducted at 11 different sites. A total of seven inspections testing trout sterility were also conducted at two aquaculture facilities. A total of 1,200 aquatic animals were sacrificed for laboratory testing. Tests were conducted for 11 pathogens at 2 certified labs. These pathogens include IHN virus, IPN virus, VHS virus, Aeromonas salmonicida bacterium, Yersinia ruckeri bacterium, Renibacterium salmoninarum bacterium, Myxobolus cerebralis parasite, LMB virus, SVC virus, OM virus, and EHN virus.

A total of 360 ovarian fluid samples were procured from trout.

Disease-free status was maintained for the following pathogens: IHNV, IPNV, VHSV, Aeromonas salmonicida, Yersinia ruckeri, Renibacterium salmoninarum, largemouth bass virus, Ceratomyxa shasta, SVCV, OMV, CCV, and EHNV. Disease surveillance has continued for whirling disease, proliferative kidney disease, and other non prohibited pathogens.

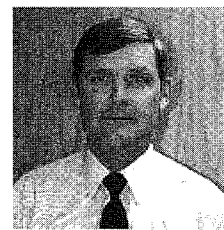
During the period, 35 fish health approvals were provided for 14 in-state facilities and 21 out-of-state facilities, approving the live importation for 26 species of aquatic animals. These include sterile and diploid rainbow trout, largemouth bass, bluegill, channel catfish, fathead minnow, Gambusia, sterile and diploid brown trout, tiger trout, black crappie, hybrid and diploid bluegills, smallmouth bass, hybrid striped bass, triploid grass carp, cutthroat trout, diploid and sterile brook trout, virgin river chub, tiger muskie, muskie, kokanee, razorback sucker, lake trout, channel catfish, woundfin minnow, bonytail chub, razorback sucker, and Colorado pike minnow. These were provided for Montana, Colorado, Wyoming, Nebraska, Missouri, Arkansas, New Mexico, Idaho, Washington, Oregon, Kansas, and Minnesota. Fish health approvals were granted to 14 in-state facilities for 8 species, including rainbow trout, brown trout, bluegill, largemouth bass, Gambusia, brook trout, tiger trout, and splake. Four in-state Aquaculture inspections for Gambusia were done independent of UDAF by mosquito abatement districts.

### Veterinary Diagnostic Laboratories

The Veterinary Diagnostic Laboratories are supported both by the State of Utah and by Utah State University and provide laboratory service in animal disease diagnosis for Utah and adjacent states. The main facility is the Ross A. Smart Veterinary Diagnostic Laboratory, located on the campus of Utah State University. The facility was completed in December 1994 and is considered "state-of-the-art" for animal disease diagnostic services. The building contains a large necropsy room for handling any species of animal; laboratories for conducting histopathology, serology, bacteriology, virology, toxicology, and biotechnology relating to veterinary diagnosis; and rooms for supporting auxiliary services. There is an electron microscope suite, a large capacity animal incinerator, and temporary holding areas for animals. A branch of the main facility is located in Nephi and provides convenient access for veterinarians and animal owners from the central and southern parts of the state. The facility includes a necropsy room, a laboratory, ELISA testing equipment and can perform similar functions to those done in the main laboratory.

Total number of test run in 2010	Logan	CUB	Total
Bacteriology	893	976	1,869
Immunohistochemistry	5,739	250	5,989
Molecular Diagnostics	3,390	436	3,826
Parasitology	957	45	1,002
Pathology	1,245	434	1,679
Serology	114,197	88,009	114,200
Toxicology	2,893	101	2,994

# Chemistry Laboratory



Dr. David H. Clark  
Director

The Laboratory Services Division operates as a service for various divisions within the Department of Agriculture and Food. The division laboratories provide chemical, physical, and microbiological analyses. All samples analyzed in the laboratories are collected and forwarded by various field inspection personnel from the divisions of: Plant Industry, Regulatory Services, Animal Health, and Conservation and Resource Management. Most of these samples are tested for specific ingredients as stated by the associated label guarantee. Some products are also examined for the presence of undesirable materials, such as filth, insects, rodent contamination, adulterants, inferior products, and pesticide residues.

The Dairy Testing Laboratory is responsible for testing Grade A Raw Milk and finished dairy products. The laboratory also administers an industry laboratory certification program. Our laboratory is certified by FDA to perform the following tests: standard plate and coliform counts; microscopic and electric somatic cell determinations; antibiotic residues; and ensuring proper pasteurization. The laboratory is also certified as the FDA Central Milk Laboratory for the State of Utah. Our supervisor and a microbiologist serve as the State Milk Laboratory Evaluation Officers (LEOs) who have jurisdiction over the certified milk labs within the state. The LEO is responsible for on-site evaluation and training of all certified analysts throughout the state. The laboratory personnel also administer a yearly proficiency testing program for all industry analysts. We also test finished products for label compliance (protein, %SNF, water, and fat), and raw milk for pathogens. The laboratory works closely with the division of Regulatory Services inspectors to ensure safe and wholesome dairy products.

The Meat Laboratory analyzes meat and meat product samples obtained during inspections of plant and processing facilities in Utah. Tests are performed to measure fat, moisture, protein, sulfates, and added non-meat products to ensure label compliance of these products. Antibiotic residues and cross-contamination from other species are also monitored. We also analyze samples from Montana Department of Agriculture when requested. Samples (meat, car-

cass, and surface swabs) from processing facilities are also tested for the presence of Salmonella, E. coli O157:H7, and Listeria on a regular basis.

The Pesticide Formulation Laboratory's function is testing samples for herbicides, insecticides, rodenticides, and/or fungicides to ensure that the listing of active ingredients and their concentrations are in compliance with state labeling laws. The Pesticide Residue Laboratory tests for presence and subsequent levels of herbicide, insecticide, rodenticide, and fungicide residues in plants, fruits, vegetables, soil, water, and milk products. These samples are submitted when inspectors suspect there may be a misuse of the application of the pesticide. Milk samples are tested yearly to for pesticide contamination in accordance with FDA regulations.

Commercial Feed (agricultural and pet) samples are tested for moisture, protein, fat, fiber, minerals, toxins, antibiotics, and vitamins in the Feed Laboratory. Seed moisture determinations are also performed for the state Seed Laboratory. The Fertilizer Laboratory tests solid and liquid fertilizer samples for nitrogen, phosphorus, potassium, and trace elements, and heavy metals. All feed and fertilizer results are compared to label guarantees to ensure compliance with state labeling laws.

Special Consumer Complaint samples are also examined for the presence of undesirable materials such as filth, insects, rodent contamination, and adulterations. The samples are checked to verify validity of complaint, and if found positive, the matter is turned over to departmental compliance officers for follow-up action.

Ground and Surface Waters are monitored for the presence for pesticides, nitrates, heavy metals and other inorganic elements. Microbiological tests are also performed to help evaluate overall water quality. This information helps provide information on the quality of the state aquifers and develop water pesticide vulnerability studies.



Significant Events:

1. Pathogen testing of raw milk continues to grow.
2. Ground water testing has been reduced significantly due to budget cuts.
3. We received our ISO 17025 laboratory certification audit of the dairy laboratory and have been addressing the deficiencies.

The following is a breakdown of the number of samples and analyses performed in the various programs by the Laboratory Services Division for the fiscal years 2009, 2010 and 2011.

FY	2009	2009	2010	2010	2011	2011
	Number of samples	Number of tests	Number of samples	Number of tests	Number of samples	Number of tests
Retail Meat	448	898	323	646	332	664
Grade A Dairy Products	3,167	22,979	3,254	22,347	3,222	21,070
Raw Milk (Pathogens)	23	92	34	434	59	638
Fertilizer	188	598	229	733	211	631
Feed	269	1,067	295	1,133	334	1,231
Pesticide Formulation & Residue	33	69	5	13	10	14
Special Samples	47	91	36	64	34	49
Ground Water	358	17,019	117	5,167	140	5,948
Milk Pesticide Residue	117	1,584	266	3,312	240	3,060
Federal Meat/Pathogens	565	568	451	451	237	238
<b>TOTAL</b>	<b>5,215</b>	<b>44,965</b>	<b>5,010</b>	<b>34,300</b>	<b>4,819</b>	<b>33,543</b>

Since the labs have been working toward ISO certification, there has been an increase in the number of quality control tests associated with these determinations.

# Conservation & Resource Management

Kathleen Clarke  
Director



During 2011 the Conservation Division has collaborated with state and federal agencies that share our interests of sustaining Utah's agricultural lands and protecting Utah's natural resources. The Division believes that creating strong Utah partnerships provides a portfolio of technical and financial resource options to the Utah's agriculture producer while promoting agricultural sustainability. A watershed approach in solving resource issues is being applied by developing conservation projects and providing funding options from multiple state and federal programs. There are few organizations in the state that rival the work that is done in the division.

## Low Cost Loan Programs

Several low interest loan programs are provided for farmers, ranchers and other agribusinesses. The loans have aided the agriculture community by providing funds when conventional loans are unavailable by:

- Providing funds for projects to assist operators in conserving resources and improving efficiency of operations.
- Assisting beginning farmers to purchase farm and ranch properties.
- Aiding financially distressed operators with long term funding.

The portfolios are comprised of approximately 800 loans, and the combined assets of the programs as of June 30, 2011 totaled nearly \$51 million. Loans are funded from revolving funds that grow each year from the earnings of the programs. These programs benefit Utah's economy in numerous ways. Loss history has been minimal.

## Agriculture Resource Development Loan Program (ARDL)

The largest program in the loan section with 55 percent of its assets and more than 600 loans, ARDL is administered by the division for the Utah Conservation Commission. Technical service and marketing of the program are provided by local conservation districts and the Utah Association of Conservation Districts as well as other conservation partners, both federal and state. Examples of eligible projects include animal waste management, water usage management (irrigation systems), rangeland improvement, on farm energy projects, wind erosion control and disaster mitigation and cleanup. Borrowers are charged 3 percent interest and a 4 percent administration fee, which covers marketing and project planning costs, and loans have a maximum term of 12 years. Producers are encouraged to use these loans to help fund projects jointly with federal and state grants. They can also fund stand-alone projects.

## Rural Rehabilitation Loan Programs

These programs, funded by both state and federal monies comprise the rest of the loan programs. They have been funded by both state and federal monies. The various purposes of the loans are to:

- Provide assistance to producers with financial problems with various causes (including emergency loan programs totaling of \$10.5 million initiated during the past two years).

- Assist beginning farmers to obtain farms and ranches. This includes providing financing to facilitate the transfer of ownership of family farms and ranches from one generation to another. These are essentially loans of last resort requiring that applicants be declined by conventional commercial lenders. They are often granted in cooperation with other lenders such as the USDA Farm Service Agency. Terms range up to a maximum of ten years with amortization of greater terms. Interest rates charged are four percent or less. These long term real estate loans have helped numerous Utah agricultural operations to remain in business. Maximum loan size is limited to \$250,000.

Since 1996 the loans section has managed a program to meet a 1998 federal deadline for remediation of underground petroleum storage tanks. This program has been operated to assist the Division of Environmental Response and Remediation. Loans are made to property owners who have underground storage tanks that require removal, replacement or other necessary procedures. The program has recently been expanded and the maximum loan size has been increased from \$45,000 to \$150,000. Loans are limited to a maximum of ten years at three percent interest. The division is also working with the State Revolving Fund (SRF) under the Division of Water Quality to underwrite and book loans to finance projects for eliminating or reducing non-point source water pollution on privately owned lands. That program was recently expanded to include grants as well as loans. The loans are now included in the ARDL program with some modifications.

## Conservation Commission

The mission of the Conservation District Section is to enable Utah's private land managers to protect and enhance their soil, water and related natural resources. This is done in cooperation with the state's Conservation Commission and Utah's 38 Conservation Districts (CD). Conservation Districts are authorized by state law. Together, they work with many other state and federal natural resource-oriented agencies and special interest organizations to bring about many short and long-term public benefits.

Districts are the local leaders that influence conservation on local, state, and federal lands. Their efforts towards conservation improvements can be directed at a large scale watershed approach or assisting an individual landowner. It is through the grass-roots nature of conservation districts that brings positive change and sustainability of Utah's farm and range lands. The Conservation District Section also provides staff support for

the Utah Conservation Commission (UCC), which is chaired by the commissioner of the department. It is a state policy-making board comprised of 16 elected officials. Their purpose is to coordinate, develop and support soil and water conservation initiatives and programs.

Currently the Section is assisting Conservation Districts in completing their county resource assessment. The assessment is designed to provide Districts with a set of measureable goals and direction for improving natural resource conditions. The UCC and many conservation districts have continued to aid the Department in further implementing the Grazing Improvement Program, Invasive Species Mitigation Act (War-on-Cheatgrass) and continue to support the Utah Partners for Conservation and Development.

#### Environmental Quality

The Environmental Protection Agency (EPA) initiated a Clean Air Strategy in 2007 for monitoring air emissions from animal feeding operations. The Division received funding for research and has been working with an egg laying facility in Northern Utah on monitoring air quality. The project is nearing completion with a final report under review. The intent is to capture the findings and recommendations into working tools that can be used by landowners with confined animal operations.

The Concentrated Animal Feeding Operation (CAFO) program continues to aid animal feeding operations in reaching water quality compliance.

Utah's EPA Nonpoint source (NPS) implementation grant (Section 319 of the Clean Water Act) was cut significantly this year impacting the amount of projects and technical services. Types of conservation practices include stream stabilization, range and riparian rehabilitation, irrigation water management and animal waste management.

For FY 2011, on-the-ground projects received \$522,155 of Section 319 funds spent for NPS (non-point source) water pollution control. The grant funds were leveraged with \$348,103 of project match providing a total of \$870,258 that went towards on-the-ground conservation projects.

The Utah Department of Agriculture and Food administers the agricultural information and education (I&E) portions of the state's agricultural water quality program funded by Section 319 of the Clean Water Act.

The Utah Watershed review, a quarterly electronic newsletter, is the most prominent outreach medium used within the program. This publication is emailed to local, state and federal agency water quality professionals, as well as landowners and others who have been involved in water quality efforts over the years.

The Conservation Division of UDAF continues to play an important role in the Utah Water Quality Conference (formerly Utah Nonpoint Source Conference) planning and implementation. The 2011 conference was held in Logan, Utah and attended by more than 125 water quality professionals, the largest attendance in nearly a decade. There are currently no plans for when and where to hold the next conference. That decision will be made in late 2011.

Our statewide I&E program continues to focus on assisting local watershed committees in specific outreach efforts. UDAF's I&E coordinator provides support and guidance to several wa-

tershed groups, including the East Canyon Creek watershed committee, the Price River watershed committee, and the San Pitch watershed committee. Each of these watersheds and other local watershed groups throughout the state consult with the state about their outreach plans and specific activities, but they lead the effort and the State serves a support role. Some of the local projects include a dog waste reduction campaign in the East Canyon watershed, a septic tank maintenance effort in the San Pitch watershed in Sanpete County, and a prescription medication recycling effort in the Cache Valley in the Cutler watershed.

#### State Ground Water Program

The Department's agricultural groundwater well testing program was scaled back in 2011 due to budgetary restraints. The electronic annual report about the program is available on the Department's web site: <http://ag.utah.gov/conservation/groundwater.html>.

Groundwater-sampling collected 100 samples, most of which were in the Pahvant and Curlew Valleys. Samples were tested for a variety of parameters including electrical conductivity, temperature, pH, hardness, sodium and bacteria. Thirty percent of sampled wells and springs were contaminated with coliform bacteria. Samples of ground water also showed High Salinity or Total Dissolved Solids (TDS).

#### Colorado River Basin Salinity Control Program

The division currently receives approximately \$2 million from the Colorado River Basin States Salinity Control Forum to reduce salt that enters the Colorado River, which has increased significantly from the initial \$350,000 received in 1997.

Historically, these funds have been allocated solely to improve irrigation practices. However, in 2011 the Forum is allowing improvements on rangelands. The division has acquired \$500,000 for the purpose of testing the feasibility of using rangeland management methods for salinity control. This project has the potential to provide ranchers with another funding source for increasing production and protect natural resources. The Conservation Division is currently developing new technology for quantifying salt savings on rangelands.

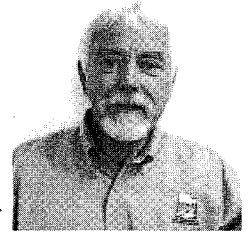
The irrigation projects installed through the salinity program are an economic benefit to the agriculture in eastern Utah. The new irrigation systems increase watering efficiency, decrease water use, and improve crop production and uniformity.

#### Monitoring Program

At the end of fiscal year 2010, the division purchased a Remotely Piloted Vehicle (RPV) drone that has the capability to take high resolution photography. During the 2011 field season the drone has been able to take thousands of photographs of specific study areas. The drone is equipped with a Geographical Position System (GPS) which stores locations of the picture taken. Allowing specialists to do extensive field work during the summer months and then later analyze the data at the office. The data captures plant species measurements, ground cover, and changes in rangeland condition. The drone has proven to be a successful tool, improving quality of field work and increasing efficiencies.

# Grazing Improvement

Bill Hopkin  
Director



The Utah Grazing Improvement Program (UGIP) is a broad-based program focused on rangeland resource health. Its mission is to “improve the productivity and sustainability of our rangelands and watersheds for the benefit of all.”

## Goals:

- Strengthen Utah’s Livestock Industry
- Improve Rural Economies
- Enhance the Environment

The program staff includes: Bill Hopkin (Director), Jan Reinhart (State Project and Monitoring Coordinator), and Thérèse Aschkenase (Program Secretary). Additionally, a staff of Range Specialists located in five regions throughout the state offer the livestock industry sound information and assistance regarding grazing issues.

The program provides grassroots opportunities for producers to provide program direction through five Regional Grazing Advisory Boards and a State Grazing Advisory Board.

The five UGIP regions and coordinators are as follows:

Northwest - Troy Forrest (435-257-5403 ext. 17);

Northeast – Jim Brown and (435-722-7023) and Terrell Thayne (435-722-4621 ext. 138);

Central - Tom Tippetts (435-283-4441 ext. 210);

Southwest - Randy Marshall (435-438-5092 ext. 106);

Southeast - Taylor Payne (435-757-6115).

A main focus of the program is to invest in and help facilitate improved resource management. Grants are provided for projects that will enhance grazing management and rangeland resource health. These projects are planned and implemented at the regional level, where the producer boards are involved in project prioritization. From 2006 to August 2011, over \$6.7 million in UGIP funds have been obligated to 330 projects. Including matching funds from producers, NRCS (Natural Resource Conservation Service), BLM (Bureau of Land Management), USFS (U.S. Forest Service), SITLA (State Institutional and Trust Lands Administration), DWR (Division of Wildlife Resources), and other sources, over \$18 million have been invested in the program. Most of the projects are focused on improving graz-

ing management by increasing water availability and building fences to enhance control of livestock. By summer 2012, we estimate that the program will have benefited 2.1 million acres. Projects that are funded by UGIP are monitored in several ways. Grantees may gather their own data by taking photos of the affected area before and after project completion, and keeping grazing records. UDAF biologists visit projects to gather more in-depth data, including vegetation species composition and cover. Some projects are also monitored using low-level aerial photography.

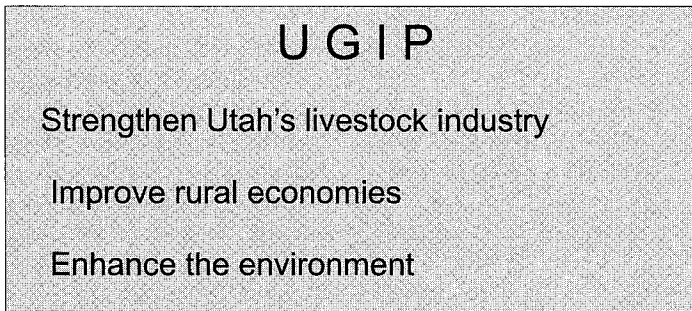
Since the devastating wildfires of 2007, UGIP has been active in promoting and helping implement the Invasive Species Mitigation Act, where \$2.5 million in state funding have been put on the ground to lessen the risk of catastrophic wildfires using vegetative fire breaks.

UDAF/UGIP is currently working with partners in three large-scale projects in Rich, Carbon, and Box Elder Counties that total over 1.5 million acres. We believe that investing human and financial resources to create financial, social, and

ecological wealth from the public and private rangelands of Utah will elevate the lives of every Utahn.

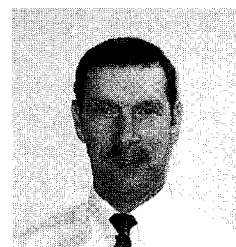


*Many UGIP projects work to benefit both livestock and wildlife habitat such as sage grouse breeding grounds.*



# Homeland Security

Dr. Chris Crnich  
Director



In recognition of the increasing potential threat of agricultural terrorism, the potential of natural emergency scenarios, and unintentional economic/production challenges Commissioner Leonard Blackham has established a Division of Agriculture Homeland Security within the Utah Department of Agriculture and Food (UDAF). The mission of this division is to organize, plan, mitigate, train, educate, and maintain awareness to the potential threats to Utah agricultural department personnel, state emergency providers, agricultural producers, and public consumers of agricultural products. The challenges of a threatening and changing world face all agricultural producers in the state and ultimately may affect every citizen in the state. Utah's agricultural economic base and our special Utah quality of life potentially would be significantly impacted if there were a deliberate or naturally occurring animal or plant disease/event that would be intentionally or inadvertently be introduced into our state. The same holds true for other agricultural pests and diseases. The security of our food and fiber production resources is crucial to all the citizens of this great state and nation.

As part of the continuing efforts to be prepared as a state agency, a coordinated effort to uniformly train all the key leadership of the Utah Department of Agriculture and Food has been accomplished. All key positions have been introduced to the national emergency planning and operations concepts as outlined by the Federal Emergency Management Agency (FEMA) by successfully completing a series of four National Incident Management System (NIMS) training modules found on-line. Each of these key leadership positions have also completed further classroom training classes to introduce/challenge each of them to a hands-on disaster training event. An outline of continued emergency training is mandated by FEMA to keep potential responders at a high level of readiness and training and our personnel continue to exemplify a high rate of compliance to this mandate. A specific Continuity of Operations Plan (COOP) has been developed for UDAF in conjunction with the Department of Public Service, Division of Homeland Security. This plan has been developed to assist in the response to events that may disrupt normal activities within the Department of Agriculture and Food, whether they are minor or catastrophic. The COOP is organized to deliver maximum resources to the event or incident while minimizing the impact of the event to normal activities within the agency. The COOP provides a roadmap of predetermined actions to reduce decision-making during recovery operations, resume critical services quickly, and enable resumption of normal service at the earliest possible time

in the most cost effective manner. This plan will help to establish, organize, and document risk assessments, responsibilities, policies and procedures, and agreements and understandings for the Utah Department of Agriculture and Food with other agencies and entities that will be responding to an emergency, directly involve with an incident, or involved in the collateral actions coordinated with an agricultural emergency event. In light of the nature of any emergency, a communication plan, equipment, and operational contingency has been developed to assist our leadership and staff to stay in contact and ready for any potential communication outage that may occur during emergencies.

Training our staff to meet the challenges of emergency operations and events is of primary concern for our mission protection. With the development, delivery, and continual update of a new Strategic Plan over the past several years, it becomes even more important to maintain a high state of preparedness, both personal and professionally. To fully meet this responsibility, our individual division directors have engaged in their own preparedness inventory and have exercised within their own divisions to hone their specific readiness goals. The Utah Department of Agriculture and Food animal emergency equipment has been used in multiple training events to facilitate the equipment function as well as familiarizing the staff with its operations. Community training events have been very important for this past year as well. Two separate educational/table top exercise events have been offered to our agriculture customers. These events were well attended and provided excellent opportunities for interactions and connections to be created between all agencies in government as well as private industry and citizens that will work together during any emergency event or incident. It is recognized that emergencies start at the local level and end at the local level. All assistance to the local entities should be aimed at supporting the local emergency response to that event. The ongoing training and exercise of training equipment and current emergency preparation training will be at the foremost interest for the coming year to target specific audiences and meet their preparedness specific needs.

A national program to assist community awareness and preparation for agricultural emergencies has been developed through the national Extension Services. In Utah it is administered by our state extension veterinarian and extension service staff with the support of certified staff in the Utah Department of Agriculture and Food. The program is named Strengthening Community Agro-security Planning (S-CAP) and is designed to



help regional emergency planning agencies prepare agricultural annexes to their current local emergency plans. Since each of the state's homeland security regions is unique in the agricultural production and commodity developments, local emergency planners, community leaders, private sector producers, animal control officers, health department officials, and emergency first responders is the select target audience for these workshops. After a two day awareness and interactive session, each region will be left with a template for their individual agricultural annex. They will then have the opportunity to develop what their regional area requires for an all-hazard response plan. The S-CAP certified training team has offered to review the annexes and then facilitate a regional table top exercise designed for that region. Evaluation of the agricultural annex will be part of that exercise as an after action report is developed. Any gaps found in the response planning annex will be given time to remediate. Following within a year after the annex review and update, a full-scale agricultural event will be planned with the local regional emergency response team to coordinate with their local training officer to interface with an exercise they traditionally develop and implement. On-going updates and exercises are encouraged to maintain local response readiness. Our S-CAP training team has worked with five of the eight state regional areas established by the Utah State Division of Emergency Management to develop an annex to their emergency plan. The second of our table top exercises will be delivered this coming summer.

As the newest division to the Department of Agriculture and Food, an experienced past Division Director, Dr Chris Crnich has been leading the foundation formation of the division format. The basic plans and training have been accomplished and exercised. Commissioner Blackham has committed resources and time to train all staff employees as well as provide timely and important training information and exercises for our customer base. Dr Crnich will lead the Division of Agriculture Homeland Security into the next year with an aggressive schedule of training events to expose UDAF employees to ways they can be prepared individually and as families. When our employees are fully trained and prepared, they will be in a better position to serve our public customers. This preparation will allow these valued agricultural personnel assets to be available during crisis times when public service workers will be at a premium. The Commissioner's goals are to prepare our UDAF agricultural specialists to be aware and ready to respond with personnel, experience, and equipment to any emergency/disaster that may affect the agricultural community and ultimately the economic and social basis of our Utah culture, lifestyle, livelihood, and heritage. There are plans to continue to present awareness training to the general agriculture community and also to target those special agricultural groups that produce food and fiber products through-out Utah. The Department also supports the Governor's goal of reduction of energy use 20% by the year 2015 utilizing the Energy Team training programs and special programs developed within the De-

partment. Employees have worked to bring this goal to fruition and are well on track to attain this goal in our current building. Though our current administrative building is one of the older buildings in the state system, we have taken steps to meet the Governor's request for energy savings. Currently, we have cut energy use in our building by 12 % from the historical energy records for the past six years. Employees also have taken the challenge to apply these conservation efforts in their personal lives and save money, energy resources, and reduce their individual carbon footprint. These special training sessions are proposed to add to past and current training agendas and continue to present the most up-to-date information and risk analysis for the preparedness of our staff and customer base well into the future.

# Marketing & Development

Jed Christenson  
Director



The Division of Marketing and Development is proud to play a vital role in helping the Department fulfill its mission to “Promote the healthy growth of Utah agriculture, conserve our natural resources and protect our food supply.” The Division Staff is committed to help create economic success for agriculture and rural Utah and attain our mission goals. The staff includes Director Jed Christenson, Deputy Director Seth Winterton, Marketing Specialist Tamra Watson, and Market News Reporter Michael Smoot.

The objectives of the Division of Marketing and Development are to raise consumer awareness of Utah agriculture and food products, and enhance local, domestic and international marketing opportunities. Division goals include: increased profitability for agriculture and related businesses, and fostering a vibrant and healthy rural economy.

## Local Marketing

The goal of local marketing is to increase awareness and demand for Utah food and agricultural products. The “Utah’s Own” Program is the major focus to help accomplish this goal. Utah’s Own is designed to create a consumer culture to think of and purchase products made and grown in the state. The economic benefit is obvious as the dollars spent by Utah consumers stay in Utah. Not only does it increase profits for local producers and businesses, but it has a multiplying affect of anywhere from two to six times in stimulating the overall economy.

The Marketing Division has received funding from the State Legislature in past years to promote Utah’s Own for which we are very appreciative. Using the appropriations judiciously and appropriately to educate consumers while benefiting the largest number of businesses and producers is our number one priority. Unfortunately, with tight budgets, no new money was allocated during the 2009, 2010 or 2011 legislative sessions requiring that many activities and promotions be curtailed. To leverage funding we have partnered with many entities including Associated Food Stores, Smith’s, Nicholas and Company, and media groups chosen because they are far reaching, meet the criteria for our targeted demographic, and/or have caught the vision of Utah’s Own.

Promotional activities are designed to not only reach and educate consumers about the benefits of buying local, but to allow Utah’s Own companies to participate on a voluntary basis. Their products are showcased in ads and sampled at live remotes in grocery stores. This exposure puts a name and face on local products and increases sales for those companies. The additional sales means the local company buys more goods and services from other local companies, who in turn then also buy more

goods and services. They hire new employees and expand their facilities and contract other services as they grow their business. The multiplying effect of dollars being spent and re-spent cause the economy to grow exponentially.

Tremendous momentum and growth has been created in the first few years of promoting Utah’s Own. To sustain this growth, the Marketing Division will ask the Legislature for additional ongoing or one-time funding to continue building our local economy through the Utah’s Own Program.

In the meantime, Utah’s Own will continue to develop new partnerships and explore new campaigns. An interactive Utah’s Own website and will provide ongoing contacts and links for communication and networking with Utah’s Own companies. Consumers will also benefit from the website by accessing educational information, introduction of new local products, and directions to Farmers Markets and other direct market opportunities. Consumers will also be invite to interact through Utah’s Own blog and Facebook accounts.

Another goal of the Division is to encourage policy for the institutional purchase of Utah products—that state government agencies, institutions and school lunch programs are mandated to purchase Utah food products whenever possible.

Another focus is to help agricultural producers explore new crops, value added and niche marketing possibilities to their existing operations. This will be accomplished by helping plan and coordinate annual Diversified Agriculture Conferences around the state in conjunction with Utah State University Extension.

Adding value to agricultural commodities or products can help local producers and rural communities build economic sustainability through processing, packaging, marketing and distributing the products themselves. Creating value added jobs can improve the diversity of a rural economy, increase local income, and capture higher profits.

The Division is working with farmers markets to help foster more direct marketing opportunities from producers to consumers. Utah is the second most urbanized state in the country with close access to over two million consumers along the Wasatch Front that have shown a strong desire to purchase wholesome fresh locally grown produce and value added products. There is also a market for certified organic and natural products in Utah. The Department’s nationally recognized Organic Certification program is complimentary to this growing consumer interest. Meeting this growing market provides new opportunities for local producers.

The Division is also active in helping promote the Department's AgriAdvocates Program, an initiative created to enhance communication with the general public about the importance of agriculture in their daily lives. Using the topics of self-sufficiency, the economy and wildlife, we are helping to establish the message of preserving Utah's farms and ranches and developing a constituency of citizens that will support the Department on issues that affect the success of agricultural operations.

Wherever possible, the Division will partner with local commodity groups, farm organizations, associations and other agencies to promote Utah's Own, AgriAdvocates, other local marketing efforts and value added projects.

#### Domestic Marketing

The goal of the domestic marketing program is to increase awareness and demand for Utah food and agricultural products in regional and national markets. This can be accomplished implementing most of the programs discussed above and adding the opportunities of national food shows and regional advertising to promote Utah's agriculture and food.

The Department works in partnership with federal agencies and marketing groups to promote Utah's agriculture and food products. The Division has the responsibility of working with these agencies such as USDA's Foreign Agricultural Service and the Western United States Agricultural Trade Association. The Division will take advantage of existing programs and matching funds wherever it is feasible and beneficial to showcase Utah's products at national food shows and events.

The Marketing Division has taken a contingency of Utah companies to the Winter Fancy Foods Show three of the past four years in San Francisco and will consider a "Utah" pavilion in January 2012 if finding permits.

#### International Marketing

The goal of the international marketing program is to increase the export sales of Utah grown and processed products. Utah companies that are interested in investigating international markets for their products can work with the Division to access both the USDA's Foreign Agricultural Service (FAS) and Western United States Agricultural Trade Associations (WUSATA) programs.

FAS promotional programs include the Foreign Market Development Cooperator Program and the Market Access Program. It also sponsors U.S. participation in several major international tradeshows.

WUSATA services and activities include export promotion, customized export assistance, a reimbursement funding program, international trade exhibitions, overseas trade missions, export seminars, in-country research, and point-of-sale promotions in foreign food chains and restaurants.

WUSATA's Generic Program supports industry-wide food and agricultural projects that would be managed by the Division.

These projects can be designed to promote an industry's product in foreign markets that would benefit three or more companies that are not eligible for FAS's Cooperator's Market Access Program Funds. As a participant in the Generic Program in a trade-show, a company can receive valuable services without incurring additional costs. Examples include interpreters, freight, trade appointments, arranged market tours and more. A project leader, occasionally from our Division, helps companies get ready for the show and is available during the show to assist with needs.

WUSATA's Branded Program is a marketing funds program that supports the promotion of brand name food and agricultural products in foreign markets. Made possible by FAS funding, the program provides participants with 50% reimbursement for eligible marketing and promotional activities. The Division provides seminars from time to time to help educate Utah companies about the Branded Program so they can take advantage of available funding for their export activities.

Through the Export Readiness Program, WUSATA and the Division has and will continue to provide face-to-face help for a company asking difficult export questions whether export novice or veteran. Export Readiness sessions provide participating companies with two hours of individualized consultative solutions with an international marketing authority with over 20 years of expertise in market entry strategies, alliance building, brand development and product adaptation.

#### Market News Reporting

Accurate and unbiased commodity price information is critical to agriculture producers and agribusinesses, especially in decision making. To provide this important service and insure the integrity of sales information, the Division monitors livestock auctions in Cedar City, Salina, Ogden and Logan on a weekly basis; and also compiles current hay sales information from alfalfa hay buyers and sellers weekly. The information is disseminated through the Department's website, print media, radio broadcast, call in service and summary mailers.

#### Junior Livestock Shows

The Division administers the legislative mandated and funded program that assists the State's junior livestock shows. Funds are allocated by an agreed upon formula to shows that promote youth involvement and offer a quality educational experience. The Utah Junior Livestock Shows Association has developed rules with which shows and youth participants must comply to qualify for State assistance. The funding must be used for awards to FFA and 4H youth participants and not for other show expenses. During the past year, 14 junior livestock shows were awarded funds based on the number of youth participants involved in each show.

# Plant Industry

Robert Hougaard  
Director



The Division of Plant Industry is responsible for ensuring consumers of disease free and pest free plants, grains, seeds, as well as properly labeled agricultural commodities, and the safe application of pesticides and farm chemicals.

## Entomological Activities

The Utah Department of Agriculture and Food (UDAF), Entomology Program provides leadership to: Nursery, Insect, Phytosanitary, and Apiary Programs, with customers in diverse markets, including: horticulture, pest management, field crops, apiarists, government, academic, agriculture, public, conservation, forestry, natural resources and medical. The full-service approach combines broad-based project management capabilities and extensive value added services like insect and plant disease recognition, public outreach /education, current knowledge of national issues affecting stakeholders that produce effective regulatory programs and protect and conserve Utah's lands and natural resources.

Increased production costs, loss of markets, increased pesticide use, and ecological damage are effects often caused by newly introduced invasive and native insect species. Monitoring projects utilize traps and visual surveys to determine the presence of a wide variety of insect species. Invasive insects are most often associated with the global movement of plant material. In addition to the nursery plant trade, the hardwood or softwood packing material commonly used to transport tile, stone, glass, and machinery parts from Asia is the most active pathway.

During 2011, there were approximately 974 State and Federal Phytosanitary Certificates issued under the direction of the State Entomology Program. These certificates allow Utah agriculture to ship plants and plant products to other states and foreign countries. The State Entomology Program also responded to more than 500 public requests for professional advice and assistance. Such assistance includes insect identification, news releases, control recommendations and participation in various education meetings and workshops.

The State Entomologist administers the Utah Bee Inspection Act (Title 4, Chapter 11), the Insect Infestation Emergency Control Act, the Nursery Act, and various entomological services under authority of Title 4, Chapter 2. Major functions performed during 2011 are summarized below:

## Newly Detected Invasive Insect Species:

**Chinese longhorn beetle: *Trichoferus campestris* (Faldermann)**  
Longhorn beetles are a widespread group of insects that bore into trees. The immature form of the longhorn beetle bores into the cambium layer of trees and shrubs, which contributes to the decline of the plant. There are many established species of longhorn beetles in Utah, including pine sawyers, twig girdlers, and root borers. Most recently, an invasive species, the Chinese longhorn

beetle, was detected in South Salt Lake City in 2010. This exotic beetle species likely arrived via hardwood or softwood packing material commonly used to transport tile, stone, glass, and machinery parts from Asia.

**Spotted wing *Drosophila*: *Drosophila suzukii* (Matsumura)**  
Vinegar flies are most commonly a nuisance to home-owners; they are attracted to rotten and fermenting fruit and are normally not considered a threat to agriculture. Also, *Drosophila* species are commonly used by researchers studying genetics at academic institutions. The spotted wing *Drosophila* was detected in California in 2008 and has quickly spread throughout North America. Spotted wing *Drosophila* are documented pests on soft-skinned fruits including cherry, raspberry, blackberry, blueberry, strawberry, plums, nectarines; and recent evidence indicates that they may feed on wine grapes. This pest was detected at the Utah State University Extension, Kaysville Research Farm, in August - September, 2010.

## Rangeland Insects:

Grasshoppers and Mormon crickets are native insects that can periodically adversely affect crop and rangeland habitats. Annual visual surveys are deployed to monitor populations of these insects. Priority is given to agricultural areas which are experiencing high populations of these insects. Typically, land owners organize and partner with state and federal agencies to conduct suppression projects. In 2011, approximately 25,000 acres were treated cooperatively in the vicinity of Gunnison City, Sanpete County. This project targeted several species of grasshoppers. Post spray surveys indicate that grasshopper populations were reduced to levels that would not impact local economies.

High Mormon cricket populations have been observed in Beaver and Millard Counties. Protection of crop land was the focus of ground treatments. Smaller bands of Mormon crickets have been observed in Juab County. Black grass bug is an early hatching insect that preferentially feeds on introduced range grasses. High populations of this insect can decrease forage and damage rangeland seeding. Populations of this insect were generally low, however small infestations were documented in Beaver, Juab and Millard counties.

## Honey Bee:

Africanized honey bee (AHB) is visually identical to its European relative; however its aggressive nature has earned this honey bee the reputation of being a public hazard. Early detection, supported with information and education, will be a major defense mechanism against this devastating and alarming insect. Considerable education and public awareness activity has occurred since the AHB was discovered in Southern Utah in the summer of 2008. Our survey has expanded to include managed

colonies and natural migration areas. AHB was detected in Washington, Iron and Kane Counties in 2008. In 2010 it was detected in San Juan County, although its prevalence and distribution remained unknown.

The Utah Bee Inspection Act provides for inspection of all apiaries annually in order to detect and prevent the spread of infectious bee diseases. Without a thorough inspection program, highly contagious diseases could spread rapidly, resulting in serious losses to the bee industry in Utah, with corresponding losses to fruit and seed crop producers who are dependent on bees for pollination. During 2011, approximately 1,300 colonies of bees were inspected, with the incidence of disease below 2.7 percent.

#### Quarantined Insects:

Apple maggot and cherry fruit fly are pests of their respective host plants, and are subject to quarantines of other states. The UDAF helps Utah's fruit growers meet export requirements by administering: a survey program, compliance agreements, and sampling. This program has successfully provided Utah's fruit industry access to out of state markets for their commodities. Since the apple maggot and cherry fruit fly were detected in 1985; UDAF assists property owners by advising orchard spray management techniques and recommending the removal of uncared for and abandoned orchards. Tree removal during 2011 exceeded 1,000 trees in abandoned orchards. No Apple Maggots or Cherry Fruit Flies have been found in commercial orchards for several years.

Cereal leaf beetle (CLB) is a pest of barley, oats and wheat. It can reduce crop yields up to 75%, and domestic grain markets require insect free shipments. CLB was discovered in Morgan County in 1984. It has since been found in seventeen of Utah's agricultural counties. UDAF assists growers by offering inspections that enable growers to export small grains. UDAF also assists a cooperative insectary program with Utah State University (USU) that provides beneficial parasitic wasps that prey on CLB. These beneficial parasites have now spread to all northern Utah counties helping to reduce populations significantly. Additional cooperative investigations by USU and the UDAF into the biology and life expectancy of CLB in compressed hay bales may one day allow shipments of hay from infested areas of the state during certain times of the year.

Gypsy moth is a notorious pest of hard wood trees. The major benefits of this program are: cost effectiveness, public nuisance reduction, forest and natural resource protection. Gypsy moth was first found in Salt Lake City in the summer of 1988. Since that time, UDAF has been the lead agency in the administration of a successful eradication program. Eradication efforts have been successful and trapping programs will remain vigorous.

Japanese beetle (JB) is a pest of more than 300 different types of plants. In addition to being a public nuisance its presence would cause loss of markets and increased production costs for Utah's horticultural and fruit growing industries. In 2006, a small population of JB was detected in Orem City. Since then UDAF has successfully implemented an eradication program. As of September 2011, no beetles have been detected in or adjacent to the treatment area. This represents a 100% reduction relative to the number of beetles caught in 2007. The decrease in the population

is due to the treatment activities starting in 2007.

European corn borer (ECB) is a damaging insect of corn, Utah has a quarantine (R68-10) in place for products that could harbor ECB in order to keep this pest from entering the state. A state trapping program is annually conducted in major corn producing areas for this serious pest.

Red Imported Fire Ant (RIFA) is a public nuisance and a federally quarantined insect. The following activities take place annually: early detection survey, quarantine enforcements, port of entry inspection and public education. The Utah RIFA surveys indicate that Washington County is free from RIFA population.

#### Exotic Pest Survey:

The Cooperative Agricultural Program is funded by the United States Department of Agriculture (USDA) Animal Plant Health Inspection Service (APHIS) to provide a holistic framework for planning, preparedness, response and recovery from invasive pests of regulatory significance. In 2011, the UDAF, in cooperation with Utah State University (USU), conducted early detection programs for exotic insect and pathogens that would pose a significant threat to Utah's agricultural economies.

Due to the increase of international traffic and the shipment of containerized cargo into Utah, there is a need to monitor for the presence of exotic insects, such as wood-boring long-horned beetles and bark beetles. UDAF has selected 25 sites throughout the state where such insects may be introduced or first detected. In the three years this program has been in operation, eight new insect records have been established for the state.

Asian defoliators pose a significant threat to the economic viability of Utah's forest product and ornamental industries. Economic potential is high risk because these organisms attack hosts or products with significant commercial value (such as timber, pulp or wood products). The organism directly causes tree mortality or predisposes host to mortality by other organisms. Damage by an organism causes a decrease in value of the host affected; for instance, by lowering its market price, increasing cost of production, maintenance, or mitigation, or reducing value of property where it is located. Organisms may cause loss of markets (domestic or foreign) due to presence and quarantine significant status. In 2011 UDAF has targeted 100 sites with pheromone traps where the possible introduction of these insects would likely occur. No introductions of these insects have been detected in the state of Utah.

The exotic fruit pest survey targets eight different tree fruits and six different berries are grown by at least 370 operations on approximately 7,000 acres in the state of Utah. There is a substantial risk of introduction of several insect pests of regulatory concern, especially along the I-15 corridor where many of these operations are located. The risk is amplified because all of these pests have multiple hosts that are present in Utah. If any of the pests were to become established, it would severely impact the fruit industries, which yield over \$14 million annually. Monitoring for all of these target species is of high importance for the continued success of Utah fruit growers. In 2011, Utah State University monitored 50 orchards exotic fruit pests.

According to the 2006 GAO report on invasive forest pests the emerald ash borer (EAB) can kill all 16 types of ash trees. As



of 2005, the pest had killed an estimated 15 million trees (GAO 2006). Due to increased international traffic and the shipment of containerized cargo into Utah, there is a need to monitor for the presence of exotic insects, including EAB. Exotic forest insects have the potential to kill trees and disrupt native forest ecosystems. The monitoring program will assist in detecting the presence of EAB. In 2011, USDA APHIS PPQ, deployed purple sticky panel traps baited with Manuca oil to 50 sites throughout the State of Utah. Currently no EAB has been detected in the state of Utah.

#### Biological Control:

**Cereal Leaf Beetle Biological Control.** USU, sampled forty-five grain fields in northern for CLB from early May through mid-July. Beginning in mid-June, CLB larvae were collected from fields for dissection in the laboratory to determine parasitism by the larval parasitoid *Tetrastichus julis*. Very cool, wet spring conditions delayed the appearance of CLB eggs and the development of the larval beetle populations. Infestation levels by CLB were low in a large number of fields, moderate (but not of economic significance) in some fields, and high (and economically threatening) in a few fields. Initial dissections indicate that large percentages of CLB larvae were parasitized in most fields sampled in June.

Assessing the success of weed biocontrol in Utah. In collaboration with APHIS and the Forest Service, USU, visited rangeland sites infested with Dalmatian Toadflax in May-July throughout northern Utah. These were sites at which the weevil *Mecinus janthinus* had previously been released. The vegetation (including toadflax) at these sites was censused by Daubenmire quadrats (following standardized monitoring procedures for the weed and associated vegetation). Stem samples were also collected at the sites and have been brought to the laboratory, where they are now being dissected and processed to determine rates of infestation by the weevil.

The Utah Weed Supervisors Association in cooperation with APHIS, provides grant monies to county weed districts. The funding is used to purchase, collect, and disperse biological control agents for control of invasive weeds.

In cooperation with APHIS, the Blacksmith Soil Conservation District hired a vegetation survey contractor to map medusahead infestations. The entire infested area will be systematically surveyed by foot or motor bike, infestations will be delineated on maps so that acreages can be totaled, and medusahead density will be estimated in order to assign priority class for treatment.

#### Nursery Inspection Program:

The Utah Department of Agriculture and Food regulates perennial plants sold within the state. The Nursery Inspection Program ensures consumer protection by maintaining high standards of plants and decreases the spread of plant pathogens and insects.

The Nursery Program facilitated seven Compliance Agreements and reviewed approximately 1,663 interstate plant shipments for quarantine compliance from 20 states and seven foreign countries. These shipments included an estimated 1,472,894 individual plants which resulted in 34 inspections, 5 Hold Orders, and two Notice of Violations. In 2011, 741 commercial nurser-

ies were registered with the Utah Department of Agriculture and Food of which 542 were inspected for compliance to the applicable rules and regulations.

#### Pesticide Enforcement Programs

UDAF administers the Utah Pesticide Control Act, which regulates the registration and use of pesticides in Utah. This Act authorizes pesticide registration requirements and the pesticide applicator certification program. UDAF has primacy for pesticide use enforcement under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA) in Utah. UDAF administers sections of FIFRA under which programs are developed and implemented by cooperative grant agreements with the Environmental Protection Agency (EPA). These programs include the Worker Protection Program, Endangered Species Program, Ground Water/Pesticide Protection Program, Certification Program, and Pesticide Enforcement.

#### Worker Protection Program

This program provides general training, worker and handler pesticide safety training, "train the trainer" program, training verification, outreach and communication efforts, reporting and tracking, and performance review actions. UDAF has adopted the national Worker Protection Standards (WPS) Verification Program and distributes WPS Worker and Handler Verification cards to qualified WPS trainers and performs WPS training as necessary.

#### Endangered Species Pesticide Program

Utah has an Endangered Species Pesticide Plan that allows the state to provide protection for federally listed species from pesticide exposure while tailoring program requirements to local conditions and the needs of pesticide users. Utah's plan focuses on the use of pesticides as they relate to the protection of threatened and endangered species on private agricultural land and lands owned and managed by state agencies. UDAF is the lead state authority responsible for administering the plan as it relates to the use of pesticides. Through an interagency review committee, special use permits or landowner agreements can be established to allow for the continued use of certain restricted pesticides for those locations that contain threatened and endangered species.

#### Ground Water/Pesticide Protection Program

UDAF has a Ground Water/Pesticide State Management Plan to prevent pesticide contamination of the nation's ground water resources. The Utah Ground Water/Pesticide State Management Plan is a state program that has been developed through cooperative efforts of UDAF with various federal, state, and local resource agencies. The plan includes an assessment of risks posed to the state's ground water by a pesticide and a description of specific actions the state will take to protect ground water resources from potentially harmful effects of pesticides.

#### Certification Program

UDAF has a cooperative agreement with EPA to undertake the following as part of the department's Pesticide Certification program: maintaining state certification programs, state coordi-

nation with Utah State University (USU) Extension, state evaluation and participation in training programs, conduct certification activities, maintain records for certified pesticide applicators, and monitor certification program efforts, UDAF works with USU Extension to develop pesticide applicator certification manuals and test questions and administers examinations as part of the licensing requirements of the state.

#### Pesticide Disposal Program

UDAF has sponsored the collection and disposal of Unwanted and unusable Pesticide for seventeen years. The total amount collected and disposed from 1993 through 2010 is 254,171 pounds, or 127.09 tons. The largest amount of unwanted and unusable pesticides were collected and disposal of in 2010, 52,994 pounds or 26.5 tons. Our primary goal is to protect the environment. Pesticides are an important part of production agriculture and should be used and disposed of properly. No collection was conducted for 2011.

#### Pesticide Enforcement Program

UDAF enforcement activities include the following: cancellation and suspension of pesticide products, general compliance monitoring, tracking, sample collection and analysis, enforcement response policy, ground water and endangered species pesticide enforcement activities, and FIFRA Section 19 (f) enforcement actions.

Number of Commercial Pesticide Businesses	1,042
Number of applicators certified Commercial, Non-Commercial and private:	7,004
Number of pesticide dealers licensed:	125
Number of investigations of pesticide uses:	299
Number of Applicators & dealers record audits	171
Number of documentary pesticide samples collected:	12,413
Number of physical pesticide samples collected:	28
Number of violations:	304
Number of pesticide applicator training sessions:	30

#### Pesticide Product Registration

Number of pesticide manufacturers or registrants:	1,092
Number of pesticide products registered	10,751
Number of new products registered as a result of investigation:	91
Number of violations of the Pesticide Act	91
Number of product registration requests by Compliance Specialists:	91

#### Nursery Inspection Program

Number of licenses issued to handlers of Nursery stock	725
Number of Nursery Inspections conducted	906
Number of violations of the Nursery Act	55

#### USDA Private Pesticide Applicator Restricted Use

##### Record Survey Program

Number private applicators records surveyed	75
Percent private applicators using RUP products	100%
Percentage of elements recorded as required	100%

Percentage of private applicators without records 0%

#### Fertilizer Program

Administration of the Utah Commercial Fertilizer Act (Title 4, Chapter 13) regulates the registration, distribution, sale, use, and storage of fertilizer products. UDAF regulates and licenses fertilizer blenders and monitors the applicators that spray or apply fertilizer and take samples for analysis.

Major functions performed in this program in 2011.

Number fertilizer manufacturers/registrants	398
Number of products received and registered	3,814
Number of products registered because of investigations	51
Number of fertilizers sampled, collected, and analyzed	219
Tonnage sales in Utah (7/1/2009-6/30/2010)	124,241
Number of samples that failed to meet guarantee	11
Guarantee analysis corrected	11
Number of inspection visits to establishments	388
Number of violations of the fertilizer Act	40
Number of blenders licensed	46

#### Commercial Feed Program

Administration of the Utah Commercial Feed Act, (Title 4, Chapter 12) involves inspection, registration, and sampling of commercial feed products. Activities performed during this program in 2010 are summarized below:

Number of feed manufacturers or registrants contacted:	706
Number of feed products registered:	10,384
Number of feed samples collected and tested	321
Number of violations:	32
Number of Custom Formula Feed licenses	40

#### Nursery Inspection Program

Number of licenses issued to handlers of Nursery stock	725
Number of Nursery Inspections conducted	1,025
Number of violations of the Nursery Act	86

#### Shipping Point and Cannery Grading Program

Pridyce	No. of Inspections	Lbs. Inspected
Cherries, Sweet	21	1,500,250
Onions	189	2,516,425
TOTALS	210	4,016,675

#### Organics Food Program

The organic food program certified over 112,000 acres of production farm and pasture ground in 2010-2011. This includes such commodities as wheat, safflower, barley, oats, corn, and grass. The newest addition to Utah organics is the dairy industry for the production of organic milk and cheese. With the growth of organic livestock production, there is a need to increase the production of feed grains for cattle. Utah has a strong organic process/handling program. The wheat that is grown in Utah is made into high protein organic flour. There is garden produce sold at farmers markets that is certified organic. There is a need for more organic row crop farmers to fill the slots at local farmers markets with their fresh local products. The demand for organic exceeds the supply and organic products are bringing a premium at the local markets.

Utah was accredited in 2002 as a certifying agent for the United States Department of Agriculture National Organic Program, and continues to provide services to the residents of our great state. The organic program continues to offer educational opportunities for the local producers and processors in order to upgrade and modify system plans to meet the requirements of the regulations. There are also opportunities for consumers to learn about organic foods and the requirements for organic food production.

**Organic participants in Utah**

Program	number participants
Organic crops	39
Organic livestock	4
Organic processing	23
Total organic participants	66

**Seed Inspection and Testing**

Administration of the Utah Seed Act (Title 4, Chapter 16) involves the inspection and testing of seeds offered for sale in Utah. The Seed Control Official issues letters of violation on all lots of seed that are in violation of the seed act. The labelers of seed have 15 days to correct the violation. Inspectors make an inspection of the seed lots to determine if the violation has been properly corrected. Seed lots are withheld from sale until the violation is corrected.

Seed analysis work performed in 2010-2011 is summarized below:

Number of official samples submitted by Inspectors	500
Number of samples in violation	60
Percent violations	12.00
Number of service samples submitted by industry	1,089
Number of seed samples tested:	1,589

**Seed Testing and Seed Law Enforcement**

The seed analysts conduct tests on seed samples submitted by agricultural inspectors, seed companies, and other interested parties. Most common tests include percent germination, purity, and presence of noxious weeds; although a number of other tests are performed upon request. Inspectors monitor the seed trade by collecting representative samples for testing and by checking for proper labeling of all seed offered for sale and for the presence of noxious weeds and other undesirable factors.

**Noxious Weed Control Program**

The State Weed Specialist administers the Utah Noxious Weed Control act (Title 4, Chapter 17) and coordinates and monitors Weed Control Programs throughout the state. The Twelve agricultural field representatives located throughout the state make hundreds of visits and inspections each year. This includes visits and or direct contact with the agencies listed below:

- Retail and wholesale Establishments
- Nursery outlets and sod farms
- Weed Supervisors and other County Officials
- State and federal agencies
- Utility Companies
- Private Landowners

**Hay and Straw Certification  
Cooperative Weed Management Areas (CWMA's)**

**Cooperative Weed Management**

During the past several years, UDAF has been working diligently with local land management agencies and the counties to encourage the development of Cooperative Weed Management Areas (CWMA's). Weed management areas are designed to bring people together to form partnerships which control noxious or invasive weed species. The CWMA's break down some of the traditional barriers that have existed for many years among agencies. The County Weed Departments and the local managers of State and Federal lands, along with private land owners are now able to cooperate and collaborate on similar noxious weed issues. They share resources and help with weed control problems on lands that they do not administer. We now have 25 organized Cooperative Weed Management areas in Utah.

**Control of Noxious Weeds**

1. The Division Weed Specialist coordinates weed control activities among the county weed organizations and the Compliance Specialists.
2. Surveys of serious weed infestations are conducted and control programs are developed through the county weed supervisors, county weed boards, and various landowning agencies.
3. The weed specialist and the inspectors work continually with extension and research personnel in encouraging the use of the most effective methods to control the more serious weeds.
4. Noxious Weed Free Hay Certificates.

**Activities in Hay and Straw Certification**

Certification of hay and straw to be free from noxious weeds has become an important part of allowing these materials to be fed or utilized on public lands throughout Utah and other western states. Weed free certification is now required for all hay and straw used on public land. Plant Industry Compliance Specialists performed the following activities in connection with this program:

- Inspections in 20 counties
- Inspections for 100 producers
- Number of Inspections: 146

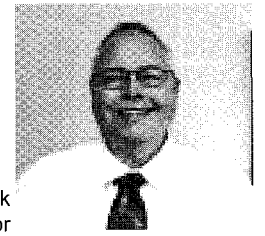
**Grain Inspection**

The Federal Grain Inspection Service provides, under authority of Title 4, Chapter 2, Section 2, and under designated authority, grain inspection services. Following is a summary of work performed during the past fiscal year under dedicated credit provisions, with expenses paid by revenue received for grading services:

Number of samples tendered:	13,911
Number of miscellaneous tests conducted:	9,822
Total number of activities performed:	23,733

NOTE: Volume of work is influenced each year by a number of factors, among which are weather conditions, governmental crop programs, and marketing situations.

# Regulatory Services



Richard W. Clark  
Director

The Division of Regulatory Services has regulatory oversight of products in the areas of food, weights and measures, dairy and bedding, upholstered furniture and quilted clothing. Our staff prides itself in professional and sound services to ensure wholesome, clean and uniform products throughout the state. In this new era of security we are dedicated to providing helpful information and trained professionals to be constantly vigilant in the safety of our food supplies.

2010 marked a new level of partnership between the Division and the U.S. Food and Drug Administration. The two agencies have entered into a multi-year contract that will benefit both. The Division conducted enhanced inspections for FDA, who, in turn, paid a fee for the work done. The agreement is good for the public because it helps to reduce duplication and improves communication between the parties involved.

In 2011, we will be impacted by pending Federal legislation, including the FDA Food Safety Modernization Act and the Menu Labeling for Restaurants and Similar Retail Food Establishments laws.

The Division was successful in 2010 in establishing a working and cooperative dialogue with farmers market operators and vendors statewide. As the local food movement gains momentum, we will see more and larger farmers markets in Utah. As such, they have moved to near the top of our service priority list.

Our Weights & Measures Program did a great job working with industry to assure a smooth transition to a mostly ethanol blended gasoline supply in the state. Much information for consumer access and education was provided on the UDAF website, <http://ag.utah.gov/news/ethanolstatement.html>. Very few complaints were received.

Year 2010 presented raw milk challenges for our Dairy Compliance Program. Several Salmonella and Campylobacter outbreaks required heightened oversight and follow-up. Raw milk is an inherently risky product to consume. Disease outbreaks caused by raw milk are difficult to identify and control.

For the immediate and long range future, the Division has identified several challenges that will demand our attention: These include:

1. *"Challenges to recruit qualified people into our regulatory positions. This affects our ability to develop and maintain an 'institutional memory' and hampers the Division's efforts to meet its mission."*

1. Inability to recruit young people into regulatory positions. Our recent hires, with the exception of one, have all been at least 50 years of age. We are happy to have mature, stable employees. However, our ability to develop and maintain an 'institutional

memory' is endangered, as is the future ability of the Division to meet its mission.

2. Static resources versus growing service demands. In all of the areas that we provide services, we see growth. The regulated community continues to get larger. However, our resources have remained stagnant. Our inspection resources have actually declined as we have had to redirect inspectors to other activities. The continued sluggish economy and attached budget restrictions and cutbacks will make this situation more critical.

3. Food Safety Management System. Changes in the FDA Model Food Code have made parts of our Food Safety Management System to be less useful than they should be. The system will have to be redesigned to incorporate these changes. In 2010 the Division worked to identify the specific changes needed in the system. In 2011 we will be testing and implementing them.

4. FDA Food Safety Modernization Act. We will be closely involved in the evolution of the federal regulations that implement this law.

5. Menu Labeling for Restaurants, Retail Food Establishments Similar To Restaurants, and Vending Machines. This law requires calorie posting on menus and vending machines. The Division will be working closely with the FDA and the industry to make sure the regulations are reasonable and are implemented smoothly.

6. Motor Fuel Dispenser Technician enforcement. For the last two years the Division has invested significant resources toward the training and competency of motor fuel dispenser technicians in Utah. While successful for the most part, we have come to understand that education does not assure competency all of the time. Strong enforcement will be a necessary focus of this program in 2011.

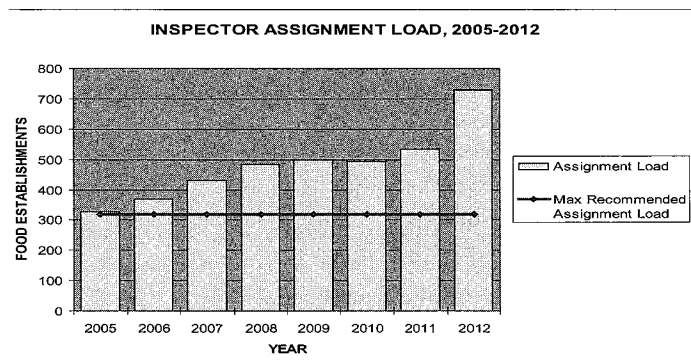
7. Modernization of the Food Compliance Program.

## Food Compliance Food Safety

Protecting the safety and integrity of the food supply is one of the Utah Department of Agriculture and Food's (UDAF) core functions. The UDAF Food Program functions as a regulatory agency and therefore has many tools to protect the consumers and promote agriculture. Our 10 Environmental Health Scientists conducted 3,181 inspections in the year 2010. We have 3,514 registered food facilities in Utah. To maximize the effectiveness of our limited resources, each establishment is given an inspection frequency regarding to risk. The frequency categories are Intensified, High Risk or Low Risk. Many of the packaging facilities which do not process foods have been assigned to be inspected every two years. Other low risk facilities which process non-potentially hazardous foods have been assigned to be inspected once every year. These changes have reduced some

workload to allow a shift to quality inspections and more time for follow-up and enforcement. Workloads have once again shifted towards the Cottage Food Program, FDA Contract Inspections, Food Recall audits and other specialized areas.

In an effort to streamline our enforcement process, the Food Compliance Program developed a Warning Letter which can be issued on site to those facilities which are repeat violators. This letter has made it more convenient for the inspectors in their Regulatory work and we have recently seen and increase in the issuance of Warning Letters.



#### Cottage Food Program

The Cottage Food Program continues to grow rapidly and this growth tends to correlate with the Outdoor Market popularity. We now have 127 Cottage Food facilities and 52 are currently in application and review. Product Review and Label review along with extensive consulting make oversight of this program very challenging. Our program is frequently consulted by other states looking at implementing laws to allow these operations.

#### Outdoor Markets

The Local Food Movement is alive and well in Utah. We believe it has legs and is going to be with us for many years. As one result, the Outdoor Markets (Farmers markets and similar operations) have nearly doubled in number. The size of markets has also grown. To effectively manage this growth, we have made services to outdoor markets a high priority. In 2010 we have made a vigorous effort to improve communications with the market coordinators and vendors and we held meetings to discuss guidelines and food safety issues found at markets during the previous seasons. Based on feed back and increased inspections we have updated our outreach and educational materials.

#### FDA Food Inspection Contract

Our FDA Food Inspection contract increased from 90 facilities in 2009 to 108 facilities in 2010. Last year three inspectors participated in the contract inspections. This year we have six inspectors working on FDA Inspections. Quincy Boyce is coordinating these efforts and we have organized a plan to monitor and track inspections in timely manner.

#### Voluntary National Retail Food Program Standards

UDAF is now going into its 3rd year of enrollment in the FDA Voluntary Retail Food Program Standards. Standard 1 was initiated with the adoption of the 2005 Food Code. Standard 1

has been audited and was verified. The 2009 Food Code has since been published and we hope to bring it on board as soon as possible. We are now working on Standard II which is Standardization. Each inspector was trained according to FDA Standardization Procedures and the majority of the inspectors have completed Standardization. This will allow for consistency in inspections throughout the State of Utah. This last year we completed Standard 7- Industry and Community Relations. A Food Safety Task Force has been formed and we are attending quarterly meetings with Industry, USU extension, State Health and many of the Local Health Departments. We will have Standard 7 audited in 2011.

In the past year we have been focused on improving our relations with state and local health departments. Quincy continues as our UDAF Liaison in regards to UEHA and participates on the Education Board. Memorandums Of Understanding have been updated with some local health departments. The MOU with the Utah Department of Health was amended and has enhanced our communication in regards recalled food products and foodborne illness outbreaks. .

#### Food Recalls

In the past few years we have seen increasing numbers of Class I food product recalls. Class I recalls involve food products that pose a public health threat, and these are a priority for the Division. The recall of Salmonella contaminated eggs from Iowa was one of the larger recalls in 2010. The positive side of that event was that Utah has had an Egg Safety Quality Assurance Plan for 15 years. Utah is also pretty self-sufficient in egg production. We knew that our eggs were safe and that Utah had not received any of the contaminated eggs. There were several recalls involving ground beef which was found to be contaminated with E. coli 0157:H7 and this last year there was an issue with Salmonella contaminated pepper which affected many seasoning companies. There were the increasingly usual recalls with lettuce and sprouts. Each Recall is investigated as to whether or not the products are in the state by contacting the Recall Coordinators for the food firms. Faster means of communication has resulted in our ability to communicate and check recalls in a much more timely and effective manner. There were about 85 recalls in which product was suspected to be in Utah.

#### Consumer Complaints

In 2010 UDAF responded to 114 consumer complaints ranging from fungal objects to insects and other foreign objects. Complaints are prioritized over other services. Generally they involve reports of injury, illness or visible contamination. Complaints about dogs in stores are still a common issue. Chemist Joyce Baggs has been very helpful in analyzing foreign objects to figure out their origin. Many of the complaints are passed on to manufacturer's Quality Assurance Programs to be resolved.

During the calendar year 2010, we issued 13 Hold Orders involving 660 pounds of adulterated food. The food was destroyed. There were also 23 voluntary destructions involving 730 pounds of food.



### Inland Shellfish and COOL

The Program has a Certified Inland Shellfish component. The component is approved by the Food and Drug Administration, making Utah a member of the handful of states allowed to originate interstate shellfish shipments. This has proven to be an economic boom for Utah industry.

The Division is contracted by the U.S. Department of Agriculture to audit food retailers for Country of Origin Labeling (COOL). This labeling is important for the Utah consumer to be knowledgeable of where foods in the marketplace are obtained.

### Meat Compliance

The meat compliance program completed 865 meat reviews across the State. Meat reviews are completed regularly at our assigned food establishments in order to verify inspected sources and proper labeling. These retail meat facilities are also audited regarding any Hotel, Restaurant or Institution accounts which may fall under their HRI exemptions. We also have Planned Compliance reviews assigned to each inspector. Many of these facilities have had prior violations which we follow up on. Restaurants are also reviewed in order to verify safe meat sources.

Total number of Ground Beef Samples for 2010:	648
Total number of Ground Beef Samples violating "fat" standards	84
Total number of citations written for excess fat in Ground Beef Samples in 2010	0

### Certificates of Free Sale

Certificates of free sale are a component of the Food Compliance Program that much of our population is completely unaware. However, it is very important to the Utah economy and the food industry. Without the certificates, Utah businesses would not be able to export their food products internationally. The certificates certify that the foods are produced in sanitary settings and that the production meets current Good Manufacturing Practices. Issued by the Department, the certificates are accepted by governments worldwide. In 2010 the number issued was 2,882. This is almost 300 higher than in 2009.

### Looking Ahead

Our Food Compliance Program is at something of a crossroads. It is based on a food safety paradigm developed in the 1950s. During the intervening decades it has served Utahans well, and we take pride in that. But, today's world is much different than that world 60 years ago. The food system is global. Manufacturing techniques, components and ingredients are different. Transportation systems have changed significantly. Even the food borne diseases have changed. Security of the food supply is preeminent, whereas it was not even a discussed concept even 15 years ago. While there are fewer events of failed food integrity today, the events are much, bigger in scope. An event now can impact people in several states or countries. An event now can shut down entire industries and cost economic losses approaching a billion dollars.

We are in the process of transforming the Program to meet modern needs. Change is difficult for organizations. Employees

are uncomfortable, customers are uncomfortable, and the burden on administrators increases significantly and there is usually a financial cost that comes with it. A major constraint to our evolution is financial. We have been fortunate to have increased the flow of federal revenues into the program the last two years. However, there has been no complimentary increase in local revenues. In fact, they have decreased. Without investment by Utahans, the Food Compliance Program cannot be the effective agency that our citizens expect it to be and even take for granted that it is.

### Other challenges for 2011 include:

1. Continuing improvement in the Outdoor Markets area.
2. Streamlining the Cottage Food Operations application and label review processes.
3. Implementing a modernized Food Safety Management System computerized inspection database.
4. Working with the FDA and industry to implement the FDA Food Safety Modernization Act.

### Dairy Compliance

For the first time in over twenty years the number of dairies going out of business equaled the number of dairies coming into business and hence the net result was no change in the total number of Grade A dairies, remaining at 238. Herd sizes continue to increase and smaller family farms are growing into larger commercial dairies, and the average herd size in Utah is now 354. Utah has also seen an increase in Farmstead cheese dairies, as everyone is looking for ways to maximize their profits. On the processing side, even in the relatively suppressed economic times of 2010, Utah's cheese plants did well, increasing sales, and increasing capacity, as some of the plants put on more pasteurizers, and hired on more employees.

Utah's dairy cow numbers increased from 84,000 to 85,000 in 2010. And that partially accounts for the increased total milk production from 1.7 billion pounds in 2009 to 1.8 billion pounds in 2010. But another important factor involved would be that milk production per cow increased last year from 21,036 pounds per cow per year, to 21,400 pounds per cow per year.

The role of raw milk in the transmission of infectious diseases is well documented. Raw milk was recognized as a source of severe infections over 100 years ago, and pasteurization of milk to prevent these infections is one of the public health triumphs of the 20th century. Human pathogens such as Escherichia coli, Campylobacter jejuni, and Salmonella bacteria can contaminate milk during the milking process because they are shed in the feces of healthy-looking dairy animals, including cows and goats. Infections with these pathogens can cause severe, long-term consequences and diseases. These infections are particularly serious in those who are very young, very old, or who have impaired immune systems. They can even be fatal (Center for Disease Control and Prevention [CDC] – open letter).

In 2009, Utah had one confirmed raw milk born illness outbreak epidemiologically related to or connected to a Permitted Raw Milk Dairy, and another confirmed outbreak linked by association to a Permitted Raw Milk Dairy. In 2010, Utah's five Permitted Raw Milk dairies were suspended a total of seven times, due to vola-

2011 Plant Statistics

Types of Plants		Raw for Retail Dairies	5
Aseptic Plant	1	Wash Bays	15
Butter Plant	1	Robotic Milker's	0
Cheese Cutting and Wrapping	5	Single Service Fabricating Plants	6
Dairy HACCP Plants	1	Soft Serve Ice Cream Machines	Don't Track
Frozen Dessert Plant	1	Yogurt Plants	2
Grade 'A' Fluid Milk Plant	18	Farmstead Cheese Dairies	7
Ice Cream Plants	11	Goat Dairies	4
Manufacturing Grade Cheese	10	Sheep Dairies	1
Manufacturing Grade Drying	1		

Dairy History

Year	Total # Dairy Farms	Total Percent Reduction from Previous Year	Total Milk Production x 1,000,000	Average Cow Numbers x 1,000	Yearly Milk Production per Cow
1990	693				
1995	588	15%			
2000	416	30%			
2001	400	3%			
2002	372	7%			
2003	359	3%			
2004	347	3%			
2005	323	7%	1,661	88	18,875
2006	301	7%	1,747	86	20,314
2007	269	13%	1,732	85	20,376
2008	251	7%	1,776	85	20,894
2009	238	6%	1,767	84	21,036
2011	238	0%	1,819	85	21,400

tile micro-bacteriological test results, keeping the volatile milk off the market and out of the food chain for a combined 23 days, perhaps one reason why there were no milk born illness outbreaks linked to these dairies.

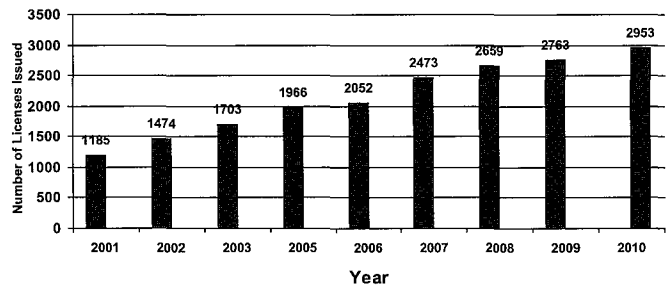
Bedding, Upholstered Furniture & Quilted Clothing

The purpose of the Bedding, Upholstered Furniture, and Quilted Clothing Program is to protect consumers against fraud and product misrepresentation, to assure Utahans hygienically clean products and to provide allergy awareness before purchase of these articles. Utah law requires manufacturers, supply dealers, wholesalers, and repairers of these products and their components to obtain an annual license before offering items for sale within the state.

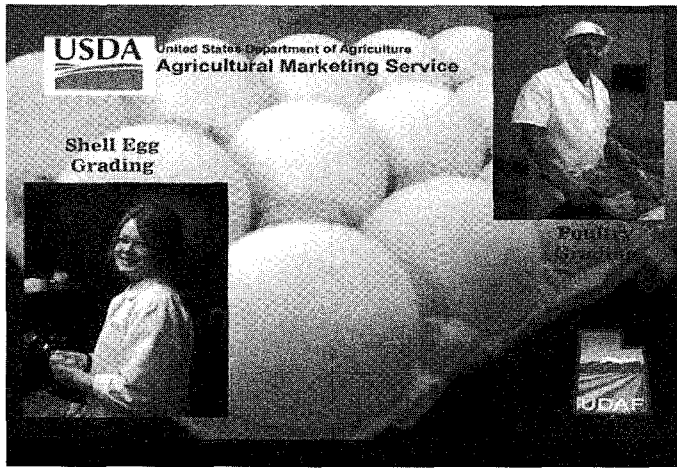
Application forms, and other program information as well as helpful links to other regulatory jurisdictions are available at the following address: <http://ag.utah.gov/divisions/regulatory/bedding/index.html>

In 2010, Utah issued 2,953 licenses which generated approximately \$310,000 in revenue. Annual license fees make the program self-sustaining and allow laboratory-testing of suspect products to determine whether their contents are accurately la-

Number of Licenses Issued 2001-2010



Advances in technology, changes in types of filling materials, and increased offshore manufacturing continue to keep state regulatory officials busy. Regulation and inspection help to maintain a level playing field and help ensure honesty in labeling and advertising.



beled and free from filth and other contaminants. During the period 2001-2010, the number of licenses issued in the program has more than doubled and has been steadily rising. One full time staff member is currently employed, which is still less than the amount approved by the legislature.

## EGG & POULTRY GRADING

The Utah Department of Agriculture & Food administers the Poultry and Egg Grading Program through a State Trust Fund Agreement with the USDA's Agricultural Marketing Service. The Egg and Poultry Grading Program provides employees licensed by USDA/AMS and performs grading and certification services throughout the state of Utah. Poultry and eggs can be traded on a uniform basis coast to coast and overseas, by buyers and sellers who use official USDA standards and grades. Consumers, egg and poultry processors, and large volume buyers who purchase poultry and eggs identified with the USDA grade shield can be assured of the quality of the products they are purchasing.

Program activities include:  
 Shell Egg Grading  
 Egg Products Inspection  
 Shell Egg Surveillance  
 Poultry Grading  
 School Lunch Commodities

### Shell Egg Grading

USDA reported that in 2010 Utah produced 2,580,555 cases of eggs. Many of these 929,000,000 eggs were USDA graded by Utah graders and sold to many local consumers. During 2010, USDA licensed egg graders graded 1,258,272 cases (30 dozen eggs per case). Of these cases: 1591 cases were Jumbo, 152,907 cases were Extra Large, 947,638 cases were Large, 142,595 cases were Medium, and 13,541 cases were Small. This is a sizeable increase over last year's total of 979,383 cases (30 dozen eggs per case) USDA graded eggs in Utah.

### Egg Products Inspection

The term "egg products" refers to eggs that have been removed

from their shells for processing. Basic egg products include whole eggs, whites, yolks and various blends, with or without non-egg ingredients, that are processed and pasteurized. They may be available in liquid, frozen and dried forms.

The Egg Products Inspection Act provides for the mandatory continuous inspection of the processing of liquid, frozen and dried egg products. Egg products are inspected to ensure that they are wholesome, otherwise not adulterated, properly labeled, and packaged to protect the health and welfare of consumers. Egg Products are used extensively in the food industry in the production of bakery items, pasta products, ice cream, eggnog, etc. and by restaurants and institutions in meals.

Nationally during calendar year 2010, shell eggs broken totaled 1,896 million dozen, up 4 percent from the comparable period in 2009.

During the year 2010, 630,396 (30 dozen per case) cases of shell eggs were processed into liquid or frozen egg products in Utah. This is about a 25% increase over last year.

### Shell Egg Surveillance

Most eggs are bought and sold as shell eggs. Shell eggs that are undesirable for human consumption are called restricted eggs. The U.S. Standards for shell eggs limit the number of restricted eggs that are permitted in consumer channels, and there are mandatory procedures for the disposition of restricted eggs. At least 4 times each year, a State Shell Egg Surveillance Inspector visits each registered packing plant to verify that shell eggs packed for consumer use are in compliance, that restricted eggs are being disposed of properly, and that adequate records are being maintained.

During 2010, State Surveillance Inspectors graded and inspected 434 samples associated with the USDA Surveillance Program.

### Poultry Grading

Utah's turkey growers saw many changes in Utah's turkey industry during 2010. Norbest brand turkeys are now exclusively produced by Utah's 55 Turkey growers. Sanpete's Turkey hatchery and breeder farms have been closed. Amid these changes in 2010, company officials at Moroni Feed Co. indicated that 2010 was a good year for Utah's turkey industry.

The USDA licensed Poultry graders of Utah graded 77,256,784 lbs. of turkey and turkey products in the year 2010. This is an increase over the previous year's 55,685,163 lbs.

### School Lunch

The National School Lunch Act in 1946 created the modern school lunch program, though USDA had provided funds and food to schools for many years prior to that. About 7.1 million children were participating in the National School Lunch Program by the end of its first year, 1946-47. In Fiscal Year 2007, more than 30.5 million children got their lunch each day through the National School Lunch Program. Since the modern program began, more than 219 billion lunches have been served.

Utah Egg and Poultry graders inspect these commodities as they arrive in Utah. The process involves breaking the official seals on the semi-trailers, selecting samples of frozen product, and drilling the product in order to obtain the temperature. An organoleptic inspection is done and a USDA certificate is prepared.

The USDA licensed graders of Utah inspected 518,156 lbs. of USDA commodities delivered to various Utah destinations during 2010.

#### Weights & Measures

The Weights and Measures Program involves all weights and measures of every kind and any instrument or device used in weighing or measuring application. The purpose of the program is to ensure that equity prevails in the market place and that commodities bought or sold are accurately weighed or measured and properly identified. A goal of the program is to prevent fraud by routinely conducting unannounced inspections. Weights and Measures also respond to consumer complaints.

Eleven Weights and Measures inspectors are strategically located throughout the state to ensure equity in the marketplace prevails throughout Utah. There were 4,104 businesses registered in Utah with 45,267 weighing and measuring devices for the year 2010. There are hundreds, maybe thousands, more establishments that should be added to the database, but we do not have the resources to regulate them.

Almost every commodity imaginable is traded in some form of measurement, whether by weight, measure, count, length, etc. To ensure fairness from producer to consumer the Utah Weights and Measures Program is involved in almost every consumer transaction. The program assures consumers that the weight or measure of food and nonfood products, services, or commodities purchased in Utah is correct.

Our inspectors routinely examine many types of scales that are used in commercial applications. Other devices the program inspects include diesel and gasoline pumps, vehicle tank meters, rack meters, high volume petroleum meters and propane meters. Fuel Quality is checked to verify that the consumer is getting the quality that is stated on the pump. Our inspectors also verify the price at the checkout register assuring that price scans correctly and the customer is paying the advertised price. Inspectors check the net quantity statement on packaged goods and verify that the item contains the amount that is stated on the label.

The State of Utah's Metrology Laboratory maintains the legal standards of mass, length, and volume. This lab is operated and maintained by one person. Our Metrologist checks the accuracy of our Weights and Measures field standards. The accuracy of equipment that is used by repair service companies is also verified by the programs Metrologist. These calibration services are provided using standards for mass, length, and volume that are traceable to the National Institute of Standards and Technology.

#### Accomplishments

Inspected and tested Weighing and Measuring devices that are used commercially include gasoline pumps, propane meters, high volume gasoline meters, rack meters, vehicle tank meters, scales, etc.. These inspections are unannounced to help both the business and the consumer receive an accurate measurement. These

devices are checked to make sure they are operating correctly, legal for trade, and free from fraud and misuse. Utah helps assure that the market place is fair and equitable for both the business and the consumer.

In Utah, 1,318 gas stations with 28,394 gas pumps are registered with the Weights and Measures Program for the 2010 calendar year. In 2010, 696 gas stations were inspected. Twenty two percent of all gas stations inspected had something fail the inspection. During the year, 13,516 gasoline pumps and 1,816 storage tanks at gas stations were inspected. The inspections were related to unit pricing, security seals intact, advertised price, product labeling, storage tanks labeling, water testing, adequately labeled pumps, octane posting, automatic shut off valve, money calibration, hose conditions, fill caps and covers, readable displays, displays function properly, anti drain valve, computer jump and that the calibration is accurate. Unfortunately we only have the resources to inspect gas pumps every two years on the average, as compared to consumer expectations of annually or even more often,

Weights and Measures Inspectors and the Motor Fuel Specialist, Motor Fuel Quality Lab routinely screened gasoline to verify ethanol presence and octane levels. This included reviewing fuel delivery documentation, labeling of the fuel dispensers, and testing fuel storage tanks for water content.

Our metrology lab continues to maintain recognition from the National Institute of Standards and Technology by meeting all Echelon III parameters. Consumers rely on the services of this facility to certify equipment used for weight, length or volumetric measurement in commercial business.

Our Metrologist participates in Inter-laboratory comparisons. This verifies the labs accuracy and precision by comparing metrology programs throughout the country. The Metrology Lab successfully completed all requirements. The Metrologist makes sure that the Weights and Measures Program field staff standards are accurate. Repair service personnel also rely on the Metrology Lab for testing the accuracy of equipment used to calibrate measuring devices.

A total of 1,494 artifacts from industry and 334 artifacts from our Weights and Measures Program were tested for a certificate of calibration using standards that are traceable to the National Institute of Standards and Technology. This is an increased amount of artifacts from previous years. The increase is attributed to the increased cooperation of the registered servicepersons in Utah.

The Utah Metrology Laboratory is currently recognized under a Certificate Measurement Assurance Program provided by the NIST Office of Weights and Measures. During the year we sent our Metrologist to the Western Regional Assurance Program yearly training meeting. The state Metrologist received and met all criteria for the Certificate of Measurement Traceability through NIST.

193 Wheel Load Weigher scale inspections were conducted. These scales are used for law enforcement of weight limits on Utah highways.

Our Weights and Measures program has remained active in the National Conference on Weights and Measures (NCWM). The NCWM is the nation's consensus body that develops model weights and measures regulations adopted by Utah and the rest of the United States. This conference acts as a source of information and a forum for debate in the development of consensus standards for weighing and measuring devices and commodities sold by weight, measure or count, in promoting the use of uniform laws and regulations, and administrative procedures.

A total of 878 establishments that have small capacity scales (0lb – 1000lbs) were inspected. This included 6,269 small capacity scales.

About 360 price verification inspections of retail check-out scanners were conducted. Our inspection program helps the consumer be confident that the price at which a product is advertised or displayed is the price they will be charged at the check-out counter. These inspections include but are not limited to grocery, hardware, general merchandise, drug, automotive supply, convenience, and warehouse club stores.

Inspectors verify the net quantity of contents of packages kept, offered, or exposed for sale, or sold by weight, measure or count. Routine verification of the net contents of packages is important to facilitate value comparison and fair competition. Consumers have the right to expect packages to bear accurate net content information. Those manufacturers whose products are sold in such packages have the right to expect that their competitors will be required to adhere to the same standards. 7,061 packaged items were inspected for net content.

Our weights and measures LPG inspector provides inspections to all Utah Vendors dispensing LPG, either through dispensers or delivery trucks. 174 propane meters were inspected throughout the state. These inspections included checking appropriate installation and calibration of propane dispensers and meters.

Inspections are conducted on airport fuel trucks, fuel delivery trucks, cement batch plant water meters and other large meters. 290 Vehicle tank meter, 76 rack meter, and 55 water meter inspections were conducted.

Large-scale capacities include 1,000 lbs. and up. These devices may include scales used for weighing livestock, coal, gravel, vehicles, etc., within inspections conducted at auction yards, ranches, ports of entry, mine sites, construction sites, gravel pits and railroad yards, etc. A total of 661 establishments that have large capacity scales were inspected. 1,314 large scales received a routine inspection.

#### Complaints

In addition to routine inspections, Weights and Measures Inspectors investigated approximately 83 consumer complaints in 2010. Complaints were related to Motor Fuel Quality and quantity, scale accuracy, product packaging and labeling requirements, net contents of packaged goods, and getting charged an incorrect

price at the retail cash register scanner.

Fuel analysis was performed on fuel samples that were taken for routine inspections and in response to consumer complaints. Samples are tested for the items listed in the table.

Emphasis was continued to be placed on testing for ethanol in fuel. Customer complaints were received and investigations were made and identified stations that had water and ethanol present in fuel without the proper labeling. Octane testing has been performed identifying stations that have a lower octane than what was posted on the gasoline pump. 273 fuel samples were tested in the Motor Fuel Lab during the 2010 year.

The registered serviceperson has continued to be an important part of the Weights and Measures Program. During the 2010 calendar year, training continued for the service technician for retail motor fuel devices. Additional service technicians including those from out of state have been becoming registered and getting a certificate of registration. These individuals have become aware of the requirements of the program which includes taking a class, passing a basic knowledge exam, registering a security seal, having calibration equipment with a current certificate from a NIST recognized laboratory, and sending in placed in service reports. Registered Servicepersons are required to send a placed in service report when placing a weighing and measuring device into service. During the 2010 calendar year 332 placed in service reports were submitted by servicepersons. This program helps protect the consumer and business owner by improving the security and the accuracy of the gas pump.

Applying uniform weights and measures standards to commercial transactions is important to a strong economy. As population and industry growth continues, so does the need for business and the associated industry. Along with that comes the need to provide weights and measures inspection service to those affected.



# UTAH DEPARTMENT OF AGRICULTURE AND FOOD ORGANIZATIONAL CHART

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**UTAH AGRICULTURE STATISTICS -- 2011**



## Ranking: Top Five States, Utah's Rank, and United States Total, by Agricultural Category

Top Five States					Utah's Rank	United States Total
First	Second	Third	Fourth	Fifth		
<b>GENERAL</b>						
<i>Number of Farms &amp; Ranches, 2010</i>						
TX	MO	IA	OK	KY	36	
247,500	108,000	92,400	86,500	85,700	16,600	2,200,930
<i>Land in Farms &amp; Ranches, 2010 (1,000 Acres)</i>						
TX	MT	KS	NE	SD	26	
130,400	60,800	46,200	45,600	43,700	11,100	919,990
<i>Cash Receipts from All Commodities, 2010 (1,000 Dollars)<sup>1</sup></i>						
CA	IA	TX	NE	MN	37	
37,520,956	23,246,412	19,926,641	17,282,579	15,137,888	1,329,421	314,352,697
<b>FIELD CROPS</b>						
<i>Harvested Acreage Principal Crops, 2010 (1,000 Acres)<sup>2</sup></i>						
IA	IL	KS	ND	MN	36	
24,300	22,525	22,127	21,021	19,490	931	304,668
<i>Corn for Grain Production, 2010 (1,000 Bushels)</i>						
IA	IL	NE	MN	IN	39	
153,250	1,946,800	1,469,100	1,292,100	898,040	3,956	12,446,855
<i>Corn for Silage Production, 2010 (1,000 Tons)</i>						
WI	CA	NY	PA	MN	24	
14,250	11,263	8,645	7,200	7,000	1,058	107,314
<i>Barley Production, 2010 (1,000 Bushels)</i>						
ND	KS	MT	CO	WY	13	
43,550	43,240	38,440	8,379	6,076	2,430	180,268
<i>Oats Production, 2010 (1,000 Bushels)</i>						
MN	WI	TX	OH	SC	29	
11,385	9,860	7,560	6,930	4,720	296	81,855
<i>All Wheat Production, 2010 (1,000 Bushels)</i>						
ND	KS	MT	WV	TX	30	
361,550	360,000	215,360	147,890	127,500	6,379	2,208,391
<i>Other Spring Wheat Production, 2010 (1,000 Bushels)</i>						
ND	MT	MN	SD	ID	9	
277,200	103,740	85,250	59,220	47,970	715	615,975
<i>Winter Wheat Production, 2010 (1,000 Bushels)</i>						
KS	TX	OK	WA	CO	29	
360,000	127,500	120,900	117,990	105,750	5,664	1,485,236
<i>All Hay Production, 2010 (1,000 Tons)</i>						
TX	CA	MO	SD	NB	23	
10,800	8,236	7,512	7,335	6,349	2,512	145,556
<i>Alfalfa Hay Production, 2010 (1,000 Tons)</i>						
CA	SD	ID	MO	MN	14	
6,256	5,160	4,746	4,485	3,960	2,160	67,903

<sup>1</sup> In accordance with USDA, ERS Ranking of States and Commodities by Cash Receipts.

<sup>2</sup> Crop acreage included are corn, sorghum, oats, barley, wheat, rice, rye, soybeans, peanuts, sunflowers, cotton, all hay, dry edible beans, canola, proso millet, potatoes, tobacco, sugarcane, and sugar beets.

**Ranking: Top Five States, Utah's Rank, and United States Total by Agricultural Category**

Top Five States					Utah's Rank	United States Total
First	Second	Third	Fourth	Fifth		
<b>FRUITS &amp; VEGETABLES</b>						
<i>Apple Utilized Production, All Commercial, 2010 (Million Pounds)</i>						
WA	NY	MI	PA	CA	<b>26</b>	9,223
5,550	1,260	590	473	280	12	
<i>Apricot Utilized Production, 2010 (Tons)</i>						
CA	WA	UT			<b>3</b>	65,350
59,200	5,900	250			250	
<i>Peach Utilized Production, 2010 (Tons)</i>						
CA	SC	GA	NJ	PA	<b>20</b>	1,130,590
817,000	102,800	38,500	34,000	20,800	4,240	
<i>Sweet Cherry Utilized Production, 2010 (Tons)</i>						
WA	CA	OR	MI	MT	<b>6</b>	307,130
156,000	94,000	37,000	14,400	2,050	1,080	
<i>Tart Cherry Utilized Production, 2010 (Million Pounds)</i>						
MI	UT	WA	NY	WI	<b>2</b>	183.3
128.7	22.5	15.4	7.8	5.5	22.5	
<b>LIVESTOCK, MINK, &amp; POULTRY</b>						
<i>All Cattle &amp; Calves, January 1, 2011 (1,000 Head)</i>						
TX	KS	NE	CA	OK	<b>34</b>	92,582.4
13,300	6,300	6,200	5,150	5,100	800	
<i>Beef Cows, January 1, 2011 (1,000 Head)</i>						
TX	OK	MO	NE	SD	<b>28</b>	30,864.6
5,025	2,036	1,865	1,772	1,610	333	
<i>Milk Cow Inventory, January 1, 2011 (1,000 Head)</i>						
CA	WI	NY	ID	PA	<b>24</b>	9,149.6
1,750	1,265	610	574	543	87	
<i>All Hogs &amp; Pigs, December 1, 2010 (1,000 Head)</i>						
IA	NC	MN	IL	IN	<b>14</b>	64,925
19,100	9,000	7,700	4,400	3,650	740	
<i>All Sheep, January 1, 2011 (1,000 Head)</i>						
TX	CA	CO	WY	UT	<b>4</b>	5,530
880	610	370	365	280	280	
<i>Honey Production, 2010 (1,000 Lbs)</i>						
ND	CA	SD	FL	MT	<b>25</b>	175,904
46,410	27,470	15,635	13,800	11,618	780	
<i>Mink Pelt Production, 2010 (Pelts)</i>						
WI	UT	OR	ID	MN	<b>2</b>	2,822,200
883,430	677,900	261,300	259,300	119,730	677,900	
<i>Chickens, Layers Inventory, December 1, 2010 (1,000)</i>						
IA	OH	PA	IN	CA	<b>25</b>	342,451
52,994	28,272	25,033	23,389	19,495	3,448	
<i>Trout Sold, 2010 (1,000 Dollars)</i>						
ID	NC	PA	CA	MO	<b>13</b>	78,409
34,895	6,222	5,249	5,124	2,934	601	

**Record Highs and Lows: Acreage, Yield, and Production of Utah Crops**

	Quantity Unit	Record High		Record Low		Year Record Started
		Quantity	Year	Quantity	Year	
Corn for Grain						
Acres Harvested	1,000 Acres	24	1918,1992,1998	2	1963,1966	1882
Yield	Bushels	163.0	2005	14.7	1889	
Production	1,000 Bushels	3,611	2008	85	1934	
Corn for Silage						
Acres Harvested	1,000 Acres	80	1975,1976	2	1920,1921,1922	1919
Yield	Tons	23.0	1997,2008,2009	6.0	1934	
Production	1,000 Tons	1,501	1980	17	1921	
Barley						
Acres Harvested	1,000 Acres	190	1957	8	1898	1882
Yield	Bushels	88.0	1995	22.0	1882	
Production	1,000 Bushels	12,880	1982	242	1882	
Oats						
Acres Harvested	1,000 Acres	82	1910	4	2002,2007,2008	1882
Yield	Bushels	85.0	2002	25.0	1882,1883	
Production	1,000 Bushels	3,338	1914	300	2008	
All Wheat						
Acres Harvested	1,000 Acres	444	1953	65	1880,1881	1879
Yield	Bushels	52.6	1999	15.4	1919	
Production	1,000 Bushels	9,750	1986	1,139	1882	
Other Spring Wheat						
Acres Harvested	1,000 Acres	160	1918	7	2007	1909
Yield	Bushels	65.0	1995	18.7	1919	
Production	1,000 Bushels	4,000	1918	390	2002	
Winter Wheat						
Acres Harvested	1,000 Acres	342	1953	100	2002	1909
Yield	Bushels	52.0	1999	12.7	1919	
Production	1,000 Bushels	8,100	1986	1,862	1924	
All Hay						
Acres Harvested	1,000 Acres	725	2000	402	1909	1909
Yield	Tons	3.93	1999	1.51	1934	
Production	1,000 Tons	2,788	1999	679	1934	
Alfalfa Hay						
Acres Harvested	1,000 Acres	575	2000	359	1934	1919
Yield	Tons	4.40	1993,1998,1999	1.67	1934	
Production	1,000 Tons	2,420	1999	600	1934	
All Other Hay						
Acres Harvested	1,000 Acres	180	1947	92	1934	1924
Yield	Tons	2.30	1998,1999,2005	0.86	1934	
Production	1,000 Tons	380	1998	79	1934	
Apples						
Utilized Production	Million Lbs	63.0	1987	2.7	1889	1889
Apricots						
Utilized Production	Tons	10,000	1957	0	1972,1995,1999	1929
Peaches (Freestone)						
Utilized Production	Tons	22,100	1922	750	1972	1899
Sweet Cherries						
Utilized Production	Tons	7,700	1968	0	1972	1938
Tart Cherries						
Utilized Production	Million Lbs	34.0	2009	1.3	1972	1938



**Record Highs and Lows: Utah Livestock, Poultry, Honey, and Mink**

	Quantity Unit	Record High		Record Low		Year Record Started
		Quantity	Year	Quantity	Year	
<b>Cattle &amp; Calves</b>						
Inventory Jan 1 . . . . .	Thou Hd	950	1983	95	1867	1867
Calf Crop . . . . .	Thou Hd	400	2000,2001	129	1935	1920
Beef Cows Jan 1 <sup>1</sup> . . . . .	Thou Hd	374	1983	107	1939	1920
Milk Cows Jan 1 <sup>1</sup> . . . . .	Thou Hd	126	1945	14	1867	1867
Milk Production . . . . .	Mill. Lbs	1,776	2008	412	1924	1924
Cattle on Feed Jan 1 . . . . .	Thou Hd	81	1966	25	2002,2009,2010	1959
<b>Hogs and Pigs</b>						
Inventory Dec. 1 <sup>2</sup> . . . . .	Thou Hd	790	2007	4	1866,1867,1868	1866
<b>Sheep and Lambs</b>						
Breeding Sheep Inventory Jan 1 . .	Thou Hd	2,882	1901	167	1867	1867
Lamb Crop . . . . .	Thou Hd	1,736	1930	225	2007	1924
Market Sheep & Lambs Inv Jan 1 . .	Thou Hd	295	1937	18	1988	1937
<b>Chickens</b>						
Hens & Pullets of Laying Age Dec 1	Thou Hd	3,763	2006	1,166	1965	1925
Egg Production Total for Year . . .	Mill. Eggs	954	2007	142	1924	1924
<b>Honey</b>						
Production . . . . .	Thou Lbs	4,368	1963	874	2001	1913
<b>Mink</b>						
Pelts Produced . . . . .	Thou Pelts	780	1989	283	1973	1969

<sup>1</sup> Cows and heifers two years old and over prior to 1970; cows that have calved starting in 1970.

<sup>2</sup> January 1 estimates discontinued in 1969. December 1 estimates began in 1969.

# *Farms and Land in Farms*

## **Farm Numbers and Acreage: Utah and United States, 1999-2010 <sup>1</sup>**

Year	Utah			United States		
	Farms	Land in Farms		Farms	Land in Farms	
		Average Size	Total		Average Size	Total
	<i>Number</i>	<i>Acres</i>	<i>1,000 Acres</i>	<i>Number</i>	<i>Acres</i>	<i>1,000 Acres</i>
1999	15,500	748	11,600	2,187,280	434	948,460
2000	15,500	748	11,600	2,166,780	436	945,080
2001	15,500	748	11,600	2,148,630	438	942,070
2002	15,300	758	11,600	2,135,360	440	940,300
2003	15,300	758	11,600	2,126,860	440	936,750
2004	15,300	752	11,500	2,112,970	441	932,260
2005	15,200	750	11,400	2,098,690	442	927,940
2006	15,100	748	11,300	2,088,790	443	925,790
2007	16,700	665	11,100	2,204,950	418	921,460
2008	16,500	673	11,100	2,200,100	418	919,910
2009	16,600	669	11,100	2,200,210	418	919,890
2010	16,600	669	11,100	2,200,930	418	919,990

<sup>1</sup> A farm is any establishment from which \$1,000 or more of agricultural products were sold or would normally be sold during the year.

## **Number of Farms and Land in Farms: Economic Sales Class, Utah, 2008-2010**

Year	Number of Farms				Land in Farms			
	Economic Sales Class				Economic Sales Class			
	\$1000-\$9,999	\$10,000-\$99,999	\$100,000 & Over	Total	\$1,000-\$9,999	\$10,000-\$99,999	\$100,000 & Over	Total
<i>Number</i>	<i>Number</i>	<i>Number</i>	<i>Number</i>	<i>1,000 acres</i>	<i>1,000 acres</i>	<i>1,000 acres</i>	<i>1,000 acres</i>	
2008	10,100	4,700	1,700	16,500	850	2,250	8,000	11,100
2009	10,200	4,700	1,700	16,600	900	2,300	7,900	11,100
2010	10,200	4,750	1,650	16,600	850	2,310	7,940	11,100

# Farm Income

## Cash Receipts: by Commodity, Utah, 2007-2010 <sup>1 2 3</sup>

Commodity	2007		2008		2009		2010 <sup>4</sup>	
	Dollars	% of Total	Dollars	% of Total	Dollars	% of Total	Dollars	% of Total
	<i>1,000</i>	<i>Percent</i>	<i>1,000</i>	<i>Percent</i>	<i>1,000</i>	<i>Percent</i>	<i>1,000</i>	<i>Percent</i>
<b>All Commodities</b>								
All Commodities	1,376,588	100	1,472,786	100	1,094,344	100	1,329,421	100
<b>Livestock &amp; Products</b>								
Livestock & products	945,562	69	1,004,066	68	757,762	69	969,605	73
Meat Animals	444,477	32	486,693	33	409,211	37	488,779	37
Cattle & Calves	283,320	21	301,492	20	236,640	22	283,968	21
Hogs	143,698	10	167,601	11	154,912	14	181,806	14
Sheep & Lambs	17,459	1	17,600	1	17,659	2	23,005	2
Milk, wholesale	324,702	24	319,465	22	214,476	20	293,058	22
Poultry/Eggs	129,632	9	140,389	10	95,153	9	131,710	10
Farm chickens	5	-	6	-	5	-	4	-
Chicken eggs	52,618	4	72,422	5	52,470	5	64,329	5
Turkeys	-	-	60,877	4	40,800	4	65,754	5
Other Poultry	9,026	1	7,084	-	1,878	-	1,623	-
Miscellaneous Livestock	46,751	3	57,519	4	38,922	4	56,058	4
Honey	1,329	-	2,110	-	1,442	-	1,186	-
Wool	2,111	-	2,820	-	1,880	-	2,652	-
Aquaculture	475	-	574	-	566	-	638	-
Trout	436	-	535	-	529	-	601	-
Other Aquaculture	39	-	39	-	37	-	37	-
Other Livestock	42,836	3	52,015	4	35,034	3	51,582	4
Mink pelts	30,148	2	39,387	3	22,868	2	39,939	3
All other livestock	12,688	1	12,628	1	12,166	1	11,643	1
<b>Crops</b>								
Crops	431,026	31	468,720	32	336,582	31	359,816	27
Food Grains	32,598	2	43,557	3	32,970	3	35,031	3
Wheat	32,598	2	43,557	3	32,970	3	35,031	3
Feed Crops	218,876	16	271,711	18	143,353	13	161,888	12
Barley	8,474	1	8,784	1	5,128	-	6,829	1
Corn	7,809	1	13,171	1	10,724	1	11,243	1
Hay	201,654	15	249,244	17	127,058	12	143,368	11
Oats	938	-	513	-	444	-	448	-
Oil Crops	2,320	-	4,428	-	4,490	-	3,779	-
Safflower <sup>5</sup>	-	-	-	-	-	-	3,779	-
Vegetables & Melons	21,253	2	20,162	1	20,171	2	21,302	2
Beans, dry	104	-	137	-	-	-	-	-
Miscellaneous Vegetables	12,863	1	-	-	-	-	-	-
Fruits/Nuts	16,743	1	16,799	1	23,820	2	15,989	1
Apples	4,977	-	4,180	-	4,285	-	3,502	-
Fresh	4,836	-	4,027	-	4,090	-	3,468	-
Processing	140	-	152	-	195	-	34	-
Apricots	212	-	178	-	250	-	108	-
Cherries	6,472	-	6,392	-	11,411	1	7,283	1
Sweet	1,722	-	122	-	2,231	-	1,433	-
Tart	4,750	-	6,270	-	9,180	1	5,850	-
Peaches	2,934	-	3,906	-	5,720	1	2,929	-
Pears, Bartlett	190	-	204	-	-	-	-	-
Other berries	1,078	-	1,076	-	1,096	-	996	-
Miscellaneous Fruits/Nuts	880	-	863	-	1,058	-	1,171	-
All Other Crops	139,236	10	112,063	8	111,778	10	121,827	9
Other Seeds	3,125	-	-	-	-	-	-	-
Other Field Crops	7,541	1	11,705	1	12,105	1	13,250	1
Greenhouse/Nursery	121,565	9	89,880	6	89,610	8	98,660	7
Christmas Trees	33	-	40	-	40	-	40	-
Other Greenhouses	121,532	9	89,840	6	89,570	8	98,620	7

<sup>1</sup> Source: Economic Research Service, USDA.

<sup>2</sup> USDA estimates and publishes individual cash receipt values only for major commodities and major producing States. The U.S. receipts for individual commodities, computed as the sum of the reported States, may understate the value of sales for some commodities, with the balance included in the appropriate category labeled "other or "miscellaneous." The degree of underestimation in some of the minor commodities can be substantial.

<sup>3</sup> Dash (-) denotes zero, unpublished, or less than one tenth of one percent (0.1%).

<sup>4</sup> Preliminary.

<sup>5</sup> Safflower published separately beginning 2010.

# *Crop Summary*

**2010 Crop Summary:** January of 2010 brought below average temperatures and snowfall in some areas of the state. Snowpack throughout January and February remained a concern due to a drier than average start to winter. Very little field work occurred in January or February; however, some farmers in Box Elder County began to spread ash towards the end of February to help minimize the possibility of snow mold in wheat.

March brought a variety of weather to Utah, temperatures varied greatly as did precipitation. Southern Utah received more precipitation than northern Utah. By the end of March water levels in some reservoirs were high enough to ease some concerns regarding irrigation supplies, but skepticism continued.

The spring of 2010 was cool, wet, and stormy which delayed field work. The inopportune weather caused crop progress to be delayed approaching the summer. The wet spring did have a positive aspect; farmers were able to delay irrigation. However, some early emerged winter wheat suffered winter snow mold. The persistent rains caused damage to the first cutting of alfalfa. The wet weather also caused Yellow Stripe Rust in wheat.

Fruit trees reaching full bloom were delayed due to the cold spring. Sweet cherry and apricot blossoms in the northern portion of the state suffered damage due to late spring frosts. It became evident during the summer of 2010 that the frosts caused serious damage to sweet cherry and apricot orchards in Northern Utah. The peach crop was basically unaffected by the frosts, and yields were good.

Around the Fourth of July, summer actually began. Hot and dry weather became the norm across the state which allowed crops to grow and ripen. Weevil, grasshoppers, Mormon crickets and cereal leaf beetles were prevalent throughout the summer. Box Elder County producers reported wheat with a disease called “take all” which causes crop death. Cutworms in San Juan County were a serious problem in the safflower, sunflower, and dry bean crops. Corn in Weber County was affected negatively by corn mites.

Afternoon thunderstorms were prevalent during the end of July and throughout most of August, with the occasional outbreak of monsoonal moisture. Winter wheat and barley harvests were completed in-between summer storms. Winter wheat yield across the state varied greatly. Some counties, and producers within the counties, were affected more negatively by the cold spring than others. In Utah County Sweet Cherry yields were better than expected. Peach yields were very good also.

By the end of August, Duchesne, Summit, Garfield, and Sevier Counties were experiencing low temperatures around freezing. The drop in temperature slowed crop progress; however, it also reduced the need for irrigation. Irrigation water supplies were adequate throughout the growing season. Dry and somewhat warm weather in late September created ideal conditions for field work

Onion yield in Box Elder County was above average. Corn progress was delayed about two to three weeks due to the cool spring. Corn silage yields ended mixed. Some producers were forced to cut their grain corn for silage. By the first week of November, corn for grain across the state was about 50% harvested; however, most of the corn that was harvested had to be dried before it could be stored. High moisture levels in corn remained an issue throughout the remainder of 2010. Farmers ended the year optimistic about their winter wheat crop.

# Field Crops

## Hay: Acreage, Yield, Production, and Value, Utah, 2003-2010

Year	Acres Harvested	Yield per Acre	Production	Marketing Year Average Price <sup>1</sup>	Value of Production
	<i>1,000 Acres</i>	<i>Tons</i>	<i>1,000 Tons</i>	<i>Dollars per Ton</i>	<i>1,000 Dollars</i>
<b>Alfalfa &amp; Alfalfa Mixtures</b>					
2003	545	4.00	2,180	82.00	178,760
2004	560	3.80	2,128	89.00	189,392
2005	540	4.20	2,268	96.00	217,728
2006	560	4.00	2,240	101.00	226,240
2007	550	4.10	2,255	131.00	295,405
2008	550	4.20	2,310	170.00	392,700
2009 <sup>2</sup>	530	4.20	2,226	102.00	227,052
2010	540	4.00	2,160	106.00	226,800
<b>All Other Hay</b>					
2003	155	2.00	310	68.00	21,080
2004	155	2.20	341	80.00	27,280
2005	160	2.30	368	83.00	30,544
2006	150	2.00	300	77.00	23,100
2007	150	2.20	330	113.00	37,290
2008	145	2.20	319	137.00	43,703
2009 <sup>2</sup>	160	2.10	336	94.00	31,584
2010	160	2.20	352	98.00	32,560
<b>All Hay</b>					
2003	700	3.56	2,490	81.50	199,840
2004	715	3.45	2,469	88.50	216,672
2005	700	3.77	2,636	94.50	248,272
2006	710	3.58	2,540	99.50	249,340
2007	700	3.69	2,585	129.00	332,695
2008	695	3.78	2,629	167.00	436,403
2009 <sup>2</sup>	690	3.71	2,562	102.00	258,636
2010	700	3.59	2,512	106.00	259,360

<sup>1</sup> Baled hay.

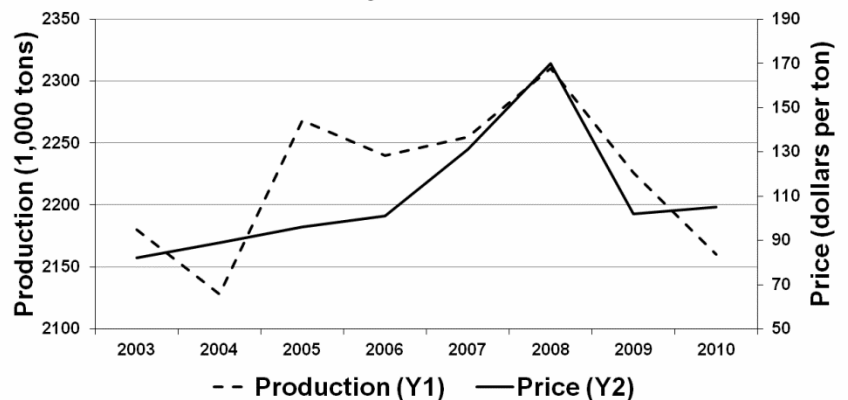
<sup>2</sup> Marketing Year Average Price and Value of Production Revised in 2009.

### Hay: Stocks on Farms, May 1 and December 1, Utah, 2004-2011

Year	May 1	December 1
	<i>1,000 Tons</i>	<i>1,000 Tons</i>
2004	279	1,383
2005	300	1,370
2006	266	1,410
2007	185	1,130
2008	215	1,300
2009	285	1,330
2010	245	1,050
2011	144	( <sup>1</sup> )

<sup>1</sup> Available January 2012

### Utah Alfalfa Hay Production & Price



## Small Grains: Acreage, Yield, Production, and Value, Utah, 2003-2010

Crop & Year	Acres		Yield per acre	Production	Marketing Year Average Price	Value of Production
	Planted <sup>1</sup>	Harvested				
	<i>1,000 Acres</i>	<i>1,000 Acres</i>	<i>Bushels</i>	<i>1,000 Bushels</i>	<i>Dollars per Bushel</i>	<i>1,000 Dollars</i>
<b>Winter Wheat</b>						
2003	160	125	41.0	5,125	3.95	20,244
2004	130	120	43.0	5,160	3.80	19,608
2005	145	135	47.0	6,345	3.81	24,174
2006	130	125	45.0	5,625	4.85	27,281
2007	135	125	42.0	5,250	8.35	43,838
2008	130	120	41.0	4,920	7.40	36,408
2009	140	135	50.0	6,750	5.70	38,475
2010	135	118	48.0	5,664	7.20	36,816
<b>Other Spring Wheat</b>						
2003	17	12	46.0	552	4.55	2,512
2004	13	12	58.0	696	4.05	2,819
2005	18	13	58.0	754	3.75	2,828
2006	14	11	45.0	495	4.25	2,104
2007	11	7	58.0	406	7.35	2,984
2008	20	19	44.0	836	11.30	9,447
2009	14	12	44.0	528	8.69	4,588
2010	16	13	55.0	715	9.27	6,113
<b>All Wheat</b>						
2003	177	137	41.4	5,677	4.00	22,756
2004	143	132	44.4	5,856	3.84	22,427
2005	163	148	48.0	7,099	3.80	27,002
2006	144	136	45.0	6,120	4.85	29,385
2007	146	132	42.8	5,656	8.30	46,822
2008	150	139	41.4	5,756	7.97	45,855
2009	154	147	49.5	7,278	5.92	43,063
2010	151	131	48.7	6,379	7.43	42,929
<b>Barley</b>						
2003	45	35	80.0	2,800	2.30	6,440
2004	50	40	86.0	3,440	2.21	7,602
2005	40	24	80.0	1,920	2.06	3,955
2006	40	30	76.0	2,280	3.02	6,886
2007	38	22	81.0	1,782	3.99	7,110
2008	40	27	85.0	2,295	4.41	10,121
2009	40	30	85.0	2,550	2.56	6,528
2010	39	27	90.0	2,430	3.43	7,533
<b>Oats</b>						
2003	65	6	82.0	492	2.30	1,132
2004	60	8	78.0	624	1.95	1,217
2005	50	7	73.0	511	1.85	945
2006	45	7	77.0	539	2.46	1,326
2007	35	4	80.0	320	2.65	848
2008	40	4	75.0	300	3.20	960
2009	45	5	81.0	405	2.50	1,013
2010	40	4	74.0	296	3.60	770

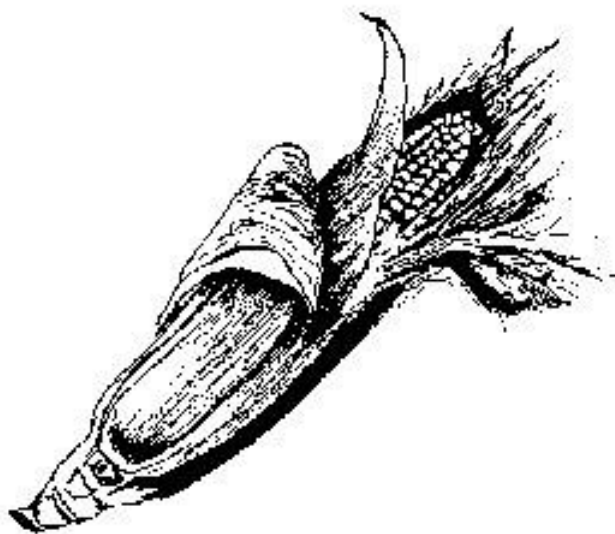
<sup>1</sup> Winter wheat was planted the previous fall and some barley may have been planted the previous fall.



## Corn Planted and Harvested for Silage and Grain: Acreage, Yield, Production, and Value, Utah, 2003-2010

Year	Planted All Purposes	Acres Harvested	Yield Per Acre	Production	Marketing Year Average Price	Value of Production
<b>Silage</b>						
	<i>1,000 Acres</i>	<i>1,000 Acres</i>	<i>Tons</i>	<i>1,000 Tons</i>	<i>Dollars per Ton <sup>1</sup></i>	<i>1,000 Dollars</i>
2003	55	41	21.0	861	31.50	27,122
2004	55	42	22.0	924	30.00	27,720
2005	55	42	22.0	924	29.00	26,796
2006	65	47	22.0	1,034	30.00	31,020
2007	70	47	21.0	987	37.00	36,519
2008	70	47	23.0	1,081	40.00	43,240
2009	65	47	23.0	1,081	32.00	34,592
2010	70	46	23.0	1,058	34.00	35,972
<b>Grain</b>						
	<i>1,000 Acres</i>	<i>1,000 Acres</i>	<i>Bushels</i>	<i>1,000 Bushels</i>	<i>Dollars per Bushel</i>	<i>1,000 Dollars</i>
2003	55	13	155.0	2,015	2.99	2,015
2004	55	12	155.0	1,860	2.56	1,860
2005	55	12	163.0	1,956	2.77	1,956
2006	65	17	157.0	2,669	3.29	2,669
2007	70	22	150.0	3,300	4.18	3,300
2008	70	23	157.0	3,611	4.40	3,611
2009	65	17	155.0	2,635	4.52	2,635
2010	70	23	172.0	3,956	5.75	3,956

<sup>1</sup> Price or value per ton in silo or pit.



## Grain Stocks Stored Off Farm: Wheat, Barley, Oats, and Corn Utah, by Quarters, 2004-2011 <sup>1</sup>

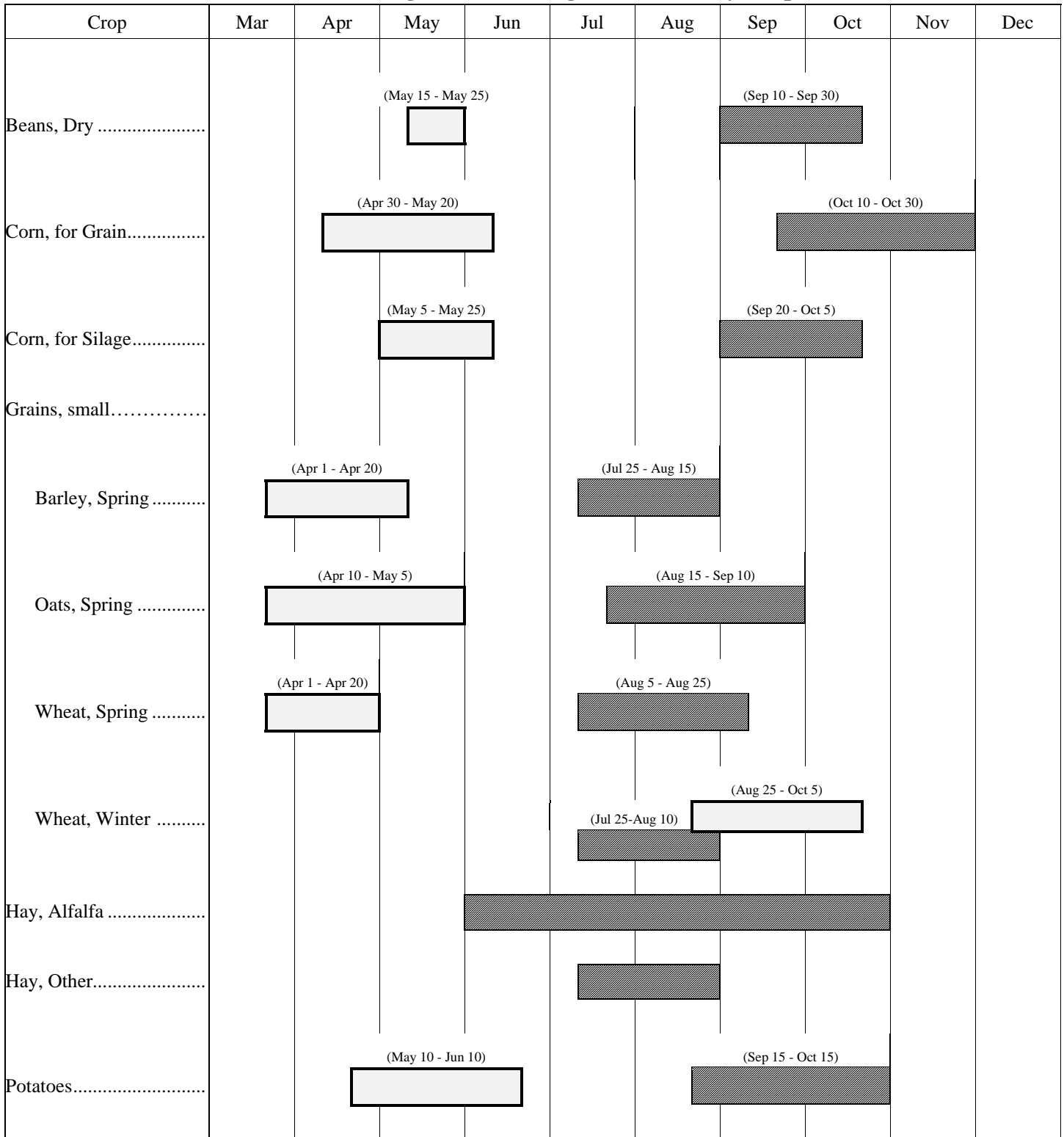
Year	March 1 <i>1,000 Bushels</i>	June 1 <i>1,000 Bushels</i>	September 1 <i>1,000 Bushels</i>	December 1 <i>1,000 Bushels</i>
<b>All Wheat</b>				
2004	5,771	4,636	5,481	4,541
2005	4,768	4,635	5,843	5,896
2006	5,946	5,436	2,961	5,994
2007	5,352	4,694	6,396	6,108
2008	4,147	3,114	4,789	3,975
2009	4,062	3,301	2,745	4,026
2010	4,612	2,972	5,365	5,199
2011	4,779	1,133	4,699	( <sup>2</sup> )
<b>Barley</b>				
2004	473	329	577	554
2005	439	192	604	516
2006	414	195	451	324
2007	187	98	(D)	490
2008	327	111	344	238
2009	240	220	459	688
2010	147	122	415	287
2011	117	84	461	( <sup>2</sup> )
<b>Oats</b>				
2004	96	52	55	85
2005	60	37	45	55
2006	48	42	48	51
2007	34	17	46	42
2008	(D)	(D)	30	33
2009	18	22	52	39
2010	40	20	48	49
2011	43	23	134	( <sup>2</sup> )
<b>Corn</b>				
2004	575	838	609	585
2005	647	598	(D)	1,272
2006	1,076	894	(D)	761
2007	1,228	1,331	(D)	1,212
2008	1,294	1,419	1,068	(D)
2009	1,084	1,040	1,023	1,066
2010	1,208	974	599	883
2011	949	956	830	( <sup>2</sup> )

<sup>1</sup> Includes stocks at mills, elevators, warehouses, terminals, and processors.

<sup>2</sup> Estimates available in the December 2011 Grain Stocks release.

(D) Not published to avoid disclosure of individual operations.

### Usual Planting and Harvesting Dates: Utah, by Crop



Usual Planting Dates     
  Usual Harvesting Dates     
 ( ) Most Active Dates

Source: USDA publication "Usual Planting and Harvesting Dates for U.S. Field Crops", December 1997

# Crop Progress

## Barley Progress

Percent Completed

Planted				Harvested for Grain			
Date	2009	2010	5-year Average	Date	2009	2010	5-year Average
Apr 05	25	30	29	Jul 10	1		5
Apr 10	36	42	40	Jul 15	3		5
Apr 15	40	59	50	Jul 20	6		10
Apr 20	44	73	58	Jul 25	7	5	12
Apr 25	57	82	72	Jul 30	18	10	21
Apr 30	63	88	79	Aug 05	33	22	36
May 05	70	90	85	Aug 10	45	37	50
May 10	79	92	90	Aug 15	60	57	63
May 15	87	94	94	Aug 20	70	68	74
				Aug 25	78	78	82
				Aug 30	86	86	87
				Sep 05	92	92	91

## Oats Progress

Percent Completed

Planted				Harvested - Hay/Silage				Harvested for Grain			
Date	2009	2010	5-year Average	Date	2009	2010	5-year Average	Date	2009	2010	5-year Average
Apr 05	18	21	20	Jun 20			25	Jul 25	2		30
Apr 10	20	23	23	Jun 25			28	Jul 30	8		29
Apr 15	23	34	29	Jun 30			36	Aug 05	16	8	21
Apr 20	29	43	39	Jul 05	42		46	Aug 10	25	18	27
Apr 25	46	47	49	Jul 10	46		53	Aug 15	46	30	40
Apr 30	54	61	60	Jul 15	57		58	Aug 20	54	46	52
May 05	64	71	69	Jul 20	71	59	66	Aug 25	61	56	62
May 10	78	78	79	Jul 25	78	67	73	Aug 30	70	63	71
May 15	81	83	85	Jul 30	84	78	79	Sept 05	78	78	79
May 20	84	88	89	Aug 05	90	88	87	Sept 10	85	84	84
May 25	88	92	92	Aug 10	93	92	90	Sept 15	91	88	89
May 30	93	96	95	Aug 15	94	95	92	Sept 20	95	91	92

## Alfalfa Progress

Percent Completed

First Cutting				Second Cutting				Third Cutting			
Date	2009	2010	5-year Average	Date	2009	2010	5-year Average	Date	2009	2010	5-year Average
May 05				Jun 20			4	Jul 25			4
May 10				Jun 25			8	Jul 30			8
May 15				Jun 30	2		13	Aug 05	5		12
May 20			18	Jul 05	7		21	Aug 10	9	6	14
May 25			12	Jul 10	16		27	Aug 15	21	14	25
May 30			23	Jul 15	29	22	37	Aug 20	28	20	38
Jun 05	26		36	Jul 20	44	36	51	Aug 25	37	29	47
Jun 10	43	25	42	Jul 25	54	49	61	Aug 30	52	40	57
Jun 15	53	40	57	Jul 30	66	58	69	Sep 05	62	53	67
Jun 20	61	58	71	Aug 05	76	69	80	Sep 10	69	62	74
Jun 25	75	77	82	Aug 10	82	79	87	Sep 15	76	69	80
Jun 30	87	88	90	Aug 15	90	90	92	Sep 20	83	73	84

## Winter Wheat Progress

Percent Completed

### Harvested for Grain

Date	2009	2010	5-year Average
Jul 10			4
Jul 15			10
Jul 20			14
Jul 25	28	31	24
Jul 30	44	45	38
Aug 05	58	59	51
Aug 10	67	69	61
Aug 15	74	78	67
Aug 20	83	85	73
Aug 25	87	86	80
Aug 30	90	89	88
Sep 05	96	91	94

### Planted <sup>1</sup>

Date	2009	2010	5-year Average
Aug 30	9		7
Sep 05	12	2	8
Sep 10	14	6	14
Sep 15	16	13	23
Sep 20	30	19	34
Sep 25	48	28	50
Sep 30	61	40	64
Oct 05	77	59	75
Oct 10	83	75	85
Oct 15	88	84	90
Oct 20	94	88	94
Oct 25	97	95	97

<sup>1</sup> Planted for Harvest Next Year

## Spring Wheat Progress

Percent Completed

### Planted

Date	2009	2010	5-year Average
Apr 05	7	25	22
Apr 10	29	33	37
Apr 15	42	46	50
Apr 20	51	61	61
Apr 25	68	77	75
Apr 30	74	83	82
May 05	80	88	88
May 10	89	92	93
May 15	94	97	97

### Harvested for Grain

Date	2009	2010	5-year Average
Jul 20	1		4
Jul 25	4	5	8
Jul 30	11	9	14
Aug 05	21	15	29
Aug 10	30	24	41
Aug 15	50	38	54
Aug 20	59	50	65
Aug 25	63	64	75
Aug 30	67	78	83
Sep 05	82	90	92
Sep 10	87	95	95
Sep 15	91		98

## Corn Progress

Percent Completed

### Planted

Date	2009	2010	5-year Average
Apr 25		12	10
Apr 30	6	14	13
May 05	16	21	23
May 10	30	33	37
May 15	49	45	54
May 20	69	65	71
May 25	86	81	84
May 30	89	92	91
Jun 05	94	95	95
Jun 10	98	98	98

### Harvested for Grain

Date	2009	2010	5-year Average
Oct 05	12		16
Oct 10	20		25
Oct 15	28		33
Oct 20	37	14	41
Oct 25	51	23	51
Oct 30	59	25	55
Nov 05	67	42	67
Nov 10	73	54	75
Nov 15	80	62	80
Nov 20	83	69	85
Nov 25	87	78	89

# Fruits

## Fruit: Acreage, Yield, Production, Use, and Value, Utah, 2003-2010

Fruit & Year	Bearing Acreage	Yield per Acre <sup>1</sup>	Production				Utilization		Price per Pound	Value of Utilized Production
			Total	Unutilized		Utilized	Fresh	Processed		
				Un-Harvested	Harvested not Sold					
	<i>Acres</i>	<i>Pounds</i>	<i>Million Pounds</i>	<i>Million Pounds</i>	<i>Million Pounds</i>	<i>Million Pounds</i>	<i>Million Pounds</i>	<i>Million Pounds</i>	<i>Dollars</i>	<i>1,000 Dollars</i>
<b>Commercial Apples</b>										
2003	2,000	14,000	28.0	0.5	-	27.5	23.0	4.5	0.230	6,317
2004	2,000	16,000	32.0	-	0.6	31.4	29.2	2.2	0.268	8,415
2005	1,600	23,800	38.0	1.9	0.4	35.7	27.4	8.3	0.159	5,671
2006	1,400	7,140	10.0	-	0.1	9.9	8.9	1.0	0.308	3,047
2007	1,400	13,600	19.0	1.0	-	18.0	15.6	2.4	0.329	5,916
2008	1,400	8,570	12.0	0.4	-	11.6	9.9	1.7	0.286	3,315
2009	1,400	12,900	18.0	1.8	0.2	16.0	14.2	1.8	0.296	4,742
2010	1,400	8,570	12.0	0.3	-	11.7	11.3	0.4	0.250	2,928

### Tart Cherries

2003	2,800	9,290	26.0	-	-	26.0	-	26.0	0.228	5,928
2004	2,800	7,860	22.0	-	-	22.0	-	22.0	0.238	5,236
2005	2,800	10,000	28.0	2.0	-	26.0	-	26.0	0.233	6,058
2006	2,800	10,000	28.0	3.0	-	25.0	-	25.0	0.265	6,625
2007	2,800	7,140	20.0	1.0	-	19.0	-	19.0	0.250	4,750
2008	2,900	6,900	20.0	1.0	-	19.0	-	19.0	0.330	6,270
2009	3,300	14,200	47.0	12.1	0.9	34.0	-	34.0	0.270	9,180
2010	3,300	6,970	23.0	0.5	-	22.5	-	22.5	0.260	5,850

<sup>1</sup> Yield is based on total production.

- represents zero (0).

## Fruit: Acreage, Yield, Production, Use, and Value, Utah, 2003-2010

Fruit & Year	Bearing Acreage	Yield per Acre <sup>1</sup>	Production		Utilization		Price per Ton	Value of Utilized Production
			Total	Utilized	Fresh	Processed		
	<i>Acres</i>	<i>Tons</i>	<i>Tons</i>	<i>Tons</i>	<i>Tons</i>	<i>Tons</i>	<i>Dollars</i>	<i>1,000 Dollars</i>
<b>Sweet Cherries</b>								
2003	650	3.38	2,200	2,000	1,000	1,000	900.00	1,800
2004	650	2.46	1,600	1,600	850	750	996.00	1,593
2005	600	3.00	1,800	1,750	980	770	1,380.00	2,422
2006	550	3.27	1,800	1,750	910	840	1,540.00	2,699
2007	550	2.27	1,250	1,250	900	350	1,380.00	1,722
2008	500	0.10	50	50	50	-	2,440.00	122
2009	500	3.08	1,540	1,330	880	450	1,680.00	2,231
2010	500	2.20	1,100	1,080	650	430	1,330.00	1,433

<sup>1</sup> Yield is based on total production.

- represents zero (0).



## Fruit: Acreage, Yield, Production, Use, and Value, Utah, 2003-2010

Fruit & Year	Bearing Acreage	Yield per Acre <sup>1</sup>	Production		Price per Ton	Value of Utilized Production
			Total	Utilized		
	<i>Acres</i>	<i>Tons</i>	<i>Tons</i>	<i>Tons</i>	<i>Dollars</i>	<i>1,000 Dollars</i>
<b>Apricots</b>						
2003	(D)	(D)	180	160	588.00	94
2004	(D)	(D)	330	290	610.00	177
2005	(D)	(D)	250	245	959.00	235
2006	(D)	(D)	280	255	1,000.00	255
2007	(D)	(D)	260	260	815.00	212
2008	(D)	(D)	410	380	468.00	178
2009	(D)	(D)	320	290	862.00	250
2010	(D)	(D)	280	250	432.00	108
<b>Peaches</b>						
2003	1,300	3.46	4,500	4,350	789.00	3,431
2004	1,300	3.85	5,000	4,550	627.00	2,853
2005	1,100	4.27	4,700	4,420	775.00	3,424
2006	1,400	4.00	5,600	5,400	672.00	3,627
2007	1,500	3.00	4,500	4,400	667.00	2,934
2008	1,500	3.33	5,000	4,500	868.00	3,906
2009	1,500	3.87	5,800	5,500	1,040.00	5,720
2010	1,500	2.87	4,300	4,240	691.00	2,929

<sup>1</sup> Yield is based on total production.

(D) Not published to avoid disclosure of individual operations.



# Cattle and Calves

## Cattle: Farms, Inventory, and Value, Utah, January 1, 2004-2011

Year	Farms		All Cattle and Calves on Farms January 1			
	with Cattle	with Milk Cows	On Feed for Market	Total Number	Value	
	Number	Number	1,000 Head	1,000 Head	Per Head Dollars	Total 1,000 Dollars
2004	7,000	600	35	860	790	679,400
2005	7,000	580	35	860	940	808,400
2006	7,000	560	30	800	1,020	816,000
2007	7,600	450	30	830	970	805,100
2008	( <sup>1</sup> )	( <sup>1</sup> )	35	850	990	841,500
2009	( <sup>1</sup> )	( <sup>1</sup> )	25	810	930	753,300
2010	( <sup>1</sup> )	( <sup>1</sup> )	25	810	830	664,000
2011	( <sup>1</sup> )	( <sup>1</sup> )	25	800	990	792,000

<sup>1</sup> Livestock operations published every 5 years beginning 2007, to coincide with U.S. Census of Agriculture.

## Cattle: Inventory by Classes and Weight, Utah, January 1, 2004-2011

Year	All Cattle and Calves	All Cows that have Calved			Heifers 500 Pounds & Over				Steers 500 Lbs & Over	Bulls 500 Lbs & Over	Calves Under 500 Lbs
		Total	Beef Cows	Milk Cows	Total	Beef Cow Replacements	Milk Cow Replacements	Other			
	1,000 Head	1,000 Head	1,000 Head	1,000 Head	1,000 Head	1,000 Head	1,000 Head	1,000 Head	1,000 Head	1,000 Head	1,000 Head
2004	860	440	351	89	175	65	40	70	110	22	113
2005	860	435	347	88	175	65	40	70	110	22	113
2006	800	410	325	85	175	65	40	70	105	20	95
2007	830	430	344	86	175	65	40	70	105	20	105
2008	850	450	365	85	175	65	40	70	105	25	100
2009	810	435	350	85	175	65	40	70	105	20	100
2010	810	420	336	84	175	65	40	70	100	22	103
2011	800	420	333	87	175	65	40	70	93	22	110

## All Cattle & Calves: Number of Operations & Percent of Total Inventory by Size Groups, Utah, 2005-2007 <sup>1</sup>

Year	1-49 Head		50-99 Head		100-499 Head		500-999 Head		1,000 Head & Over	
	Operations	Inventory	Operations	Inventory	Operations	Inventory	Operations	Inventory	Operations	Inventory
	Number	Percent	Number	Percent	Number	Percent	Number	Percent	Number	Percent
2005	4,000	7	1,100	9	1,500	36	280	23	120	25
2006	4,200	7	1,000	9	1,400	35	270	24	130	25
2007	4,800	8	1,000	8	1,400	35	290	22	110	27

<sup>1</sup> Livestock operations published every 5 years beginning 2007, to coincide with U.S. Census of Agriculture.

## Beef Cows: Number of Operations & Percent of Total Inventory by Size Groups, Utah, 2005-2007 <sup>1</sup>

Year	1-49 Head		50-99 Head		100-499 Head		500 Head & Over	
	Operations	Inventory	Operations	Inventory	Operations	Inventory	Operations	Inventory
	Number	Percent	Number	Percent	Number	Percent	Number	Percent
2005	3,400	15.0	780	15.0	920	47.0	23	23.0
2006	3,400	14.0	840	15.0	870	48.0	23	23.0
2007	3,800	14.0	830	15.0	870	47.0	24	24.0

<sup>1</sup> Livestock operations published every 5 years beginning 2007, to coincide with U.S. Census of Agriculture.

## Calf Crop: Utah, 2004 - 2011

Year	Cows That Have Calved January 1	Calf Crop	
		Total	Percent of Cows Calved January 1 <sup>1</sup>
	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>Percent</i>
2004	440	390	89
2005	435	370	85
2006	410	370	90
2007	430	390	91
2008	450	360	80
2009	435	365	84
2010	420	365	87
2011	420	( <sup>2</sup> )	( <sup>2</sup> )

<sup>1</sup> Not strictly a calving rate. Figure represents calf crop expressed as percentage of number of cows that have calved on hand January 1 beginning of year.

<sup>2</sup> Data not available until 2012.

## Cattle and Calves: Balance Sheet, Utah, 2003 - 2010

Year	Inventory Beginning of Year	Calf Crop	Inshipments	Marketings <sup>1</sup>		Farm Slaughter Cattle & Calves <sup>2</sup>	Deaths		Inventory End of Year
				Cattle	Calves		Cattle	Calves	
	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>
2003	880	390	115	387	92	4	15	27	860
2004	860	390	120	369	95	4	16	26	860
2005	860	370	110	400	95	4	15	26	800
2006	800	370	120	363	55	4	13	25	830
2007	830	390	90	368	45	4	16	27	850
2008	850	360	84	392	49	4	14	25	810
2009	810	365	66	350	38	4	14	25	810
2010	810	365	56	350	38	4	13	26	800

<sup>1</sup> Includes custom slaughter for use on farms where produced and State outshipments, but excludes interfarm sales within the State.

<sup>2</sup> Excludes custom slaughter at commercial establishments.

## Cattle and Calves: Production, Marketings and Income, Utah, 2003 - 2010

Year	Production <sup>1</sup>	Marketings <sup>2</sup>	Average Price per 100 Lbs				Value of Production	Cash Receipts <sup>3</sup>	Value of Home Consumption	Gross Income
			Cattle			Calves				
			Cows	Steers & Heifers	All					
	<i>1,000 Pounds</i>	<i>1,000 Pounds</i>	<i>Dollars</i>	<i>Dollars</i>	<i>Dollars</i>	<i>Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>
2003	377,070	484,660	42.00	83.00	81.00	103.00	313,725	400,873	7,582	408,455
2004	366,190	464,830	43.00	93.00	90.00	123.00	342,533	431,201	8,424	439,625
2005	358,890	501,100	48.00	97.00	94.00	134.00	351,595	486,614	8,798	495,412
2006	259,960	348,690	42.10	96.00	92.50	131.00	250,377	331,008	7,696	338,704
2007	244,245	309,200	42.00	93.60	90.00	118.00	222,428	283,320	7,488	290,808
2008	210,880	330,000	43.00	94.00	90.50	105.00	194,134	301,492	7,530	309,022
2009	227,483	292,000	42.00	83.00	80.00	104.00	185,904	243,648	6,656	243,904
2010	226,369	292,000	54.00	99.00	96.00	120.00	221,592	283,968	7,987	291,955

<sup>1</sup> Includes custom slaughter for use on farms where produced and State outshipments, but excludes interfarm sales within the State.

<sup>2</sup> Excludes custom slaughter at commercial establishments.

<sup>3</sup> Receipts from marketings and sale of farm slaughter.

# Dairy

## Dairy: Farms, Milk Production and Milkfat, Utah, 2003-2010

Year	Farms With Milk Cows	Number of Milk Cows on Farms <sup>1</sup>	Production of Milk & Milkfat <sup>2</sup>				
			Milk Per Cow		Total		
			Milk	Milkfat	Percentage Milkfat	Milk	Milkfat
	<i>Number</i>	<i>1,000 Head</i>	<i>Pounds</i>	<i>Pounds</i>	<i>Percent</i>	<i>Million Pounds</i>	<i>Million Pounds</i>
2003	640	91	17,824	640	3.59	1,622	58.2
2004	600	88	18,364	663	3.61	1,616	58.3
2005	580	88	18,875	687	3.64	1,661	60.5
2006	560	86	20,314	739	3.64	1,747	63.6
2007	450	85	20,376	744	3.65	1,732	63.2
2008	( <sup>3</sup> )	85	20,894	761	3.64	1,776	64.6
2009	( <sup>3</sup> )	84	21,036	766	3.64	1,767	64.3
2010	( <sup>3</sup> )	85	21,400	783	3.66	1,819	66.6

<sup>1</sup> Average number on farms during year, excluding heifers not yet freshened.

<sup>2</sup> Milk sold to plants and dealers as whole milk and equivalent amounts of milk for cream. Includes milk produced by dealers' own herds and small amounts sold directly to consumers. Includes milk produced by institutional herds. Excludes milk sucked by calves.

<sup>3</sup> Livestock operations published every 5 years beginning 2007, to coincide with U.S. Census of Agriculture.

## Milk Cows: Number of Operations & Percent of Total Inventory & Production by Size Groups, 2003-2007 <sup>1</sup>

Year	Operations Having								
	1-29 Head			30-49 Head			50-99 Head		
	Operations	Inventory	Production	Operations	Inventory	Production	Operations	Inventory	Production
	<i>Number</i>	<i>Percent</i>	<i>Percent</i>	<i>Number</i>	<i>Percent</i>	<i>Percent</i>	<i>Number</i>	<i>Percent</i>	<i>Percent</i>
2003	255	1.0	0.5	25	1.0	1.0	100	8.0	6.5
2004	240	1.0	0.5	25	1.0	1.0	90	7.5	6.5
2005	240	1.0	0.5	25	1.0	0.5	80	7.0	6.0
2006	240	1.0	0.5	20	1.0	0.5	80	6.0	5.0
2007	190	0.8	0.4	20	0.7	0.4	50	4.5	3.2

<sup>1</sup> Livestock operations published every 5 years beginning 2007, to coincide with U.S. Census of Agriculture.

## Milk Cows: Number of Operations & Percent of Total Inventory & Production by Size Groups, 2003-2007 <sup>1</sup>(continued)

Year	Operations Having								
	100-199 Head			200-499 Head			500+ Head		
	Operations	Inventory	Production	Operations	Inventory	Production	Operations	Inventory	Production
	<i>Number</i>	<i>Percent</i>	<i>Percent</i>	<i>Number</i>	<i>Percent</i>	<i>Percent</i>	<i>Number</i>	<i>Percent</i>	<i>Percent</i>
2003	135	20.0	18.0	80	25.0	25.0	45	45.0	49.0
2004	120	18.5	16.0	80	26.0	26.0	45	46.0	50.0
2005	110	16.0	14.0	80	27.0	27.0	45	48.0	52.0
2006	95	14.0	12.0	80	26.0	25.0	45	52.0	57.0
2007	90	15.0	13.0	60	21.0	21.0	40	58.0	62.0

<sup>1</sup> Livestock operations published every 5 years beginning 2007, to coincide with U.S. Census of Agriculture.

## Dairy: Milk Cows and Milk Production, Utah, 2003-2010 <sup>1 2 3</sup>

Year	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Annual Total <sup>4</sup>
<b>Milk Cows (1,000 Head) <sup>5</sup></b>													
2003			92			90			90			92	91
2004			87			88			89			88	88
2005			89			88			85			88	88
2006			85			86			86			85	86
2007			85			85			85			85	85
2008	85	85	85	85	85	85	85	85	85	85	85	85	85
2009	85	84	83	83	83	83	83	83	83	85	85	85	84
2010	84	85	85	85	85	85	85	85	86	84	84	85	85

<b>Milk per Cow (Pounds) <sup>6 7</sup></b>													
2003			4,337			4,489			4,500			4,500	17,824
2004			4,398			4,701			4,773			4,494	18,364
2005			4,591			4,685			4,852			4,859	18,875
2006			4,871			5,224			5,302			5,035	20,314
2007			4,871			5,118			5,271			5,118	20,376
2008	1,715	1,800	1,780	1,840	1,810	1,740	1,765	1,685	1,765	1,690	1,590	1,720	20,894
2009	1,720	1,805	1,790	1,840	1,835	1,760	1,790	1,740	1,795	1,720	1,570	1,740	21,036
2010	1,780	1,850	1,810	1,860	1,830	1,770	1,790	1,720	1,780	1,795	1,640	1,810	21,400

<b>Milk Production (Million Pounds) <sup>6</sup></b>													
2003			413			405			405			399	1,622
2004			409			420			400			387	1,616
2005			417			427			413			404	1,661
2006			444			456			433			414	1,747
2007			435			448			435			414	1,732
2008	146	153	450	156	154	458	150	143	443	144	135	425	1,776
2009	146	152	447	153	152	451	149	144	442	146	133	427	1,767
2010	150	157	461	158	156	464	152	146	451	151	138	443	1,819

<sup>1</sup> Milk cows and milk production changed from quarterly to monthly reporting in 2008.

<sup>2</sup> Quarterly numbers are for periods Jan 1-Mar 31, Apr 1-Jun 30, Jul 1-Sep 30, and Oct 1-Dec 31.

<sup>3</sup> Total production for quarter for 2003-2007 and total production per month for 2008-2010.

<sup>4</sup> Milk cows is average number during year, milk per cow is total milk produced per cow for year, and milk production is total production for year.

<sup>5</sup> Includes dry cows, excludes heifers not yet freshened.

<sup>6</sup> Excludes milk sucked by calves.

<sup>7</sup> Milk production divided by average number of milk cows for reporting period. Quarterly totals for years 2003-2007 may not add up to annual total due to rounding.

## Milk Disposition: Milk Used and Marketed by Producers, Utah, 2003-2010

Year	Milk Used Where Produced			Milk Marketed by Producers	
	Fed to calves <sup>1</sup>	Used for Milk, Cream, and Butter	Total	Total	Fluid Grade <sup>2</sup>
	<i>Million Pounds</i>	<i>Million Pounds</i>	<i>Million Pounds</i>	<i>Million Pounds</i>	<i>Percent</i>
2003	12	2	14	1,608	98
2004	12	2	14	1,602	99
2005	12	2	14	1,647	99
2006	13	2	15	1,732	99
2007	12	2	14	1,718	100
2008	10	1	11	1,765	100
2009	8	1	9	1,758	100
2010	9	1	10	1,809	100

<sup>1</sup> Excludes milk sucked by calves.

<sup>2</sup> Percentage of milk sold that is eligible for fluid use (grade A for fluid use). Includes fluid-grade milk used in manufacturing dairy products.

## Milk & Cream: Marketings, Used on Farm, Income, and Value, Utah, 2003-2010

Year	Combined Marketings of Milk & Cream			Cash Receipts from Marketings	Used for Milk, Cream & Butter by Producers		Gross Producer Income <sup>1</sup>	Value of Milk Produced <sup>2</sup>
	Milk Utilized	Average Returns			Milk Utilized	Value		
		Per 100 Pounds Milk	Per Pound Milkfat	1,000 Dollars			1,000 Dollars	
	<i>Million Pounds</i>	<i>Dollars</i>	<i>Dollars</i>	<i>1,000 Dollars</i>	<i>Million Pounds</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>
2003	1,608	12.10	3.37	194,568	2	242	194,810	196,262
2004	1,602	15.70	4.35	251,514	2	314	251,828	253,712
2005	1,647	14.80	4.07	243,756	2	296	244,052	245,828
2006	1,732	12.70	3.49	219,964	2	254	220,218	221,869
2007	1,718	18.90	5.18	324,702	2	378	325,080	327,348
2008	1,765	18.10	4.97	319,465	1	181	319,646	321,456
2009	1,758	12.20	3.35	214,476	1	122	214,598	215,574
2010	1,809	16.20	4.43	293,058	1	162	293,220	294,678

<sup>1</sup> Cash receipts from marketings of milk and cream, plus value of milk used for home consumption.

<sup>2</sup> Includes value of milk fed to calves.

## Manufactured Dairy Products, Utah, 2003-2010

Year	Regular - Hard Ice Cream Production <sup>1</sup>	Low Fat - Total Ice Cream Production <sup>2</sup>	Hard Sherbet Production
	<i>1,000 Gallons</i>	<i>1,000 Gallons</i>	<i>1,000 Gallons</i>
2003	17,949	4,872	1,019
2004	23,314	5,697	1,306
2005	26,395	5,918	1,659
2006	26,038	6,272	1,058
2007	26,702	6,843	966
2008	26,831	7,375	1,030
2009	23,067	9,836	946
2010	(D)	(D)	(D)

<sup>1</sup> Contains minimum milkfat content of 10 percent and not less than 4.5 pounds per gallon.

<sup>2</sup> Includes hard, soft-serve, and freezer-made milkshakes. Contains less than 10 percent milk fat required for ice cream.

(D) Not published to avoid disclosing information for individual operations.

## Manufactured Dairy Products, Utah, 2003-2010 continued

Year	Yogurt, Plain & Flavored Production	Low Fat Cottage Cheese Production <sup>1</sup>	Sour Cream Production
	<i>1,000 Pounds</i>	<i>1,000 Pounds</i>	<i>1,000 Pounds</i>
2003	122,209	3,331	
2004	165,503	4,390	
2005	171,509	3,619	8,621
2006	163,713	3,886	11,580
2007	140,948	4,482	12,320
2008	208,897	5,356	13,862
2009	244,252	5,828	12,994
2010	(D)	5,252	12,170

<sup>1</sup> Fat content less than 4.0 percent.

(D) Not published to avoid disclosing information for individual operations.



# Sheep and Wool

## Sheep and Lambs: Farms, Inventory, and Value, Utah, January 1, 2004-2011

Year	Operations with Sheep	All Sheep and Lambs on Farms January 1				
		Number <sup>1</sup>	Value		Total Breeding	Total Market
			Per Head	Total		
	<i>Number</i>	<i>1,000 Head</i>	<i>Dollars</i>	<i>1,000 Dollars</i>	<i>1,000</i>	<i>1,000</i>
2004	1,400	260	128.00	33,280	230	30
2005	1,400	270	138.00	37,260	245	25
2006	1,400	280	157.00	43,960	255	25
2007	1,600	295	147.00	43,365	265	30
2008	( <sup>2</sup> )	280	145.00	40,600	250	30
2009	( <sup>2</sup> )	290	150.00	43,500	260	30
2010	( <sup>2</sup> )	290	154.00	44,660	260	30
2011	( <sup>2</sup> )	280	196.00	54,880	255	25

<sup>1</sup> All sheep include new crop lambs. New crop lambs are lambs born after September 30 the previous year on hand January 1.

<sup>2</sup> Livestock operations published every 5 years beginning 2007, to coincide with U.S. Census of Agriculture.

## Breeding Sheep and Lambs and Lamb Crop: Inventory by Class Utah, January 1, 2004-2011

Year	Breeding Sheep and Lambs				Lamb Crop <sup>1</sup>	
	Total	Sheep 1 yr old and older		Replacement Lambs	Number	As Percent of Ewes One Year and Older <sup>2</sup>
		Ewes	Rams			
	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>Percent</i>
2004	230	195	7	28	240	123.0
2005	245	200	8	37	235	118.0
2006	255	205	11	39	230	112.0
2007	265	215	10	40	225	105.0
2008	250	210	8	32	230	110.0
2009	260	220	9	31	230	105.0
2010	260	215	9	36	225	105.0
2011	255	211	9	35	( <sup>3</sup> )	( <sup>3</sup> )

<sup>1</sup> Lamb crop defined as lambs marked, docked, or branded.

<sup>2</sup> Not strictly a lambing rate. Percent represents lamb crop expressed as a percent of ewes one year old and older on hand at beginning of year.

<sup>3</sup> Data not available until 2012.

## Market Sheep and Lambs: Inventory by Weight Group, Utah, January 1, 2004-2011

Year	Market Lambs					Market Sheep	Total Market Sheep and Lambs
	Under 65 Lbs	65-84 Lbs	85-105 Lbs	Over 105 Lbs	Total		
	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>
2004	2.00	2.00	6.00	15.00	25.00	5.00	30.00
2005	2.00	2.00	10.00	9.00	23.00	2.00	25.00
2006	2.00	2.00	7.00	11.00	22.00	3.00	25.00
2007	2.00	2.00	9.00	13.00	26.00	4.00	30.00
2008	2.00	2.00	9.00	13.00	26.00	4.00	30.00
2009	2.00	2.00	10.00	13.00	27.00	3.00	30.00
2010	2.00	2.00	10.00	11.00	25.00	5.00	30.00
2011	2.00	2.00	6.00	11.00	21.00	4.00	25.00

## Sheep and Lambs: Balance Sheet, Utah, 2003-2010

Year	Inventory Beginning of Year <sup>1</sup>	Lamb Crop	Inshipments	Marketings <sup>2</sup>		Farm Slaughter <sup>3</sup>	Deaths		Inventory End of Year <sup>1</sup>
				Sheep	Lambs		Sheep	Lambs	
	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>
2003	310	235	6	63	193	5	11	19	260
2004	260	240	15	23	188	5	11	18	270
2005	270	235	14	25	183	5	11	15	280
2006	280	230	14	23	171	4	13	18	295
2007	295	225	13	39	181	4	11	18	280
2008	280	230	15	15	188	4	12	16	290
2009	290	230	15	26	186	4	14	16	290
2010	290	225	15	34	183	6	12	15	280

<sup>1</sup> Beginning and end of year inventories includes new crop lambs.

<sup>2</sup> Includes custom slaughter for use on farms where produced, and State outshipments, but excludes interfarm sales within the State.

<sup>3</sup> Excludes custom slaughter for farmers at commercial establishments.

## Sheep & Lambs: Production, Marketings & Income, Utah, 2003-2010

Year	Production <sup>1</sup>	Marketings <sup>2</sup>	Price per 100 Pounds		Value of Production	Cash Receipts <sup>3</sup>	Value of Home Consumption	Gross Income
			Sheep	Lambs				
	<i>1,000 Pounds</i>	<i>1,000 Pounds</i>	<i>Dollars</i>	<i>Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>
2003	19,930	26,640	29.90	92.00	16,411	18,640	698	19,338
2004	20,235	20,190	33.80	101.00	18,694	18,074	768	18,842
2005	20,690	20,040	44.00	117.00	21,258	20,709	895	21,604
2006	19,500	18,510	33.20	98.50	16,761	16,077	671	16,748
2007	19,415	21,810	27.90	98.50	16,129	17,459	658	18,117
2008	19,500	18,840	25.00	102.00	17,603	17,600	672	18,272
2009	19,240	20,235	30.20	99.90	17,395	17,653	672	18,325
2010	19,430	21,330	47.80	126.00	21,674	23,005	1,022	24,027

<sup>1</sup> Adjustments made for changes in inventory and for inshipments.

<sup>2</sup> Excludes custom slaughter for use on farms where produced and interfarm sales within the State.

<sup>3</sup> Receipt from marketings and sale of farm slaughter.

## Wool: Production and Value, Utah, 2003-2010

Year	Sheep & Lambs Shorn <sup>1</sup>	Weight per Fleece	Shorn Wool Production	Average Price per Pound	Value <sup>2</sup>
	<i>1,000 Head</i>	<i>Pounds</i>	<i>1,000 Pounds</i>	<i>Dollars</i>	<i>1,000 Dollars</i>
2003	240	9.3	2,230	0.80	1,784
2004	245	9.2	2,250	0.83	1,868
2005	235	9.3	2,180	0.71	1,548
2006	260	9.0	2,350	0.71	1,669
2007	255	9.2	2,345	0.90	2,111
2008	255	9.2	2,350	1.20	2,820
2009	260	9.0	2,350	0.80	1,880
2010	260	8.5	2,210	1.20	2,652

<sup>1</sup> Includes shearing at commercial feeding yards.

<sup>2</sup> Production multiplied by annual average price.

### Losses of Sheep and Lambs Combined, by Cause: Utah, 2005-2010 <sup>1 2</sup>

Cause of Loss	2005	2006	2007	2008	2009	2010
Number of Head						
Bear	2,000	1,000	3,900	2,700	4,000	1,900
Bobcat	500	-	600	-	-	-
Coyote	13,400	17,400	16,400	18,600	16,700	12,800
Dog	900	1,200	1,300	1,600	1,000	800
Fox	900	800	600	500	500	500
Mountain Lion	3,300	4,000	3,300	3,600	2,500	900
Wolves	-	-	-	-	-	-
Eagle	1,200	1,100	1,000	900	1,200	1,500
Other/Unknown	600	700	2,200	900	1,500	4,900
<b>Total Predators</b>	<b>22,800</b>	<b>27,600</b>	<b>29,300</b>	<b>28,800</b>	<b>27,400</b>	<b>23,300</b>
Diseases	2,400	1,900	2,100	1,500	3,500	1,200
Enterotoxaemia	1,100	1,000	700	1,400	-	900
Weather Conditions	5,300	3,400	3,300	5,700	3,600	6,300
Lambing Complications	4,500	3,000	1,800	1,100	2,900	3,800
Old Age	2,000	2,200	2,400	1,300	1,800	1,500
On Back	-	-	-	-	-	-
Poison	1,000	2,100	1,100	600	1,500	1,200
Theft	-	-	900	-	500	-
Other/Unknown	4,900	4,800	2,900	2,600	6,000	8,100
<b>Total Non-Predators</b>	<b>21,200</b>	<b>18,400</b>	<b>15,200</b>	<b>14,200</b>	<b>19,800</b>	<b>23,000</b>
<b>Total Losses</b>	<b>44,000</b>	<b>46,000</b>	<b>44,500</b>	<b>43,000</b>	<b>47,200</b>	<b>46,300</b>
Percent of Total by Cause						
Bear	4.5	2.2	8.8	6.3	8.5	4.1
Bobcat	1.1	-	1.3	-	-	-
Coyote	30.5	37.8	36.9	43.3	35.4	27.6
Dog	2.0	2.6	2.9	3.7	2.1	1.7
Fox	2.0	1.7	1.3	1.2	1.1	1.1
Mountain Lion	7.5	8.7	7.4	8.4	5.3	1.9
Wolves	-	-	-	-	-	-
Eagle	2.7	2.4	2.2	2.1	2.5	3.2
Other/Unknown	1.4	1.5	4.9	2.1	3.2	10.6
<b>Total Predators</b>	<b>51.8</b>	<b>60.0</b>	<b>65.8</b>	<b>67.0</b>	<b>58.1</b>	<b>50.3</b>
Diseases	5.5	4.1	4.7	3.5	7.4	2.6
Enterotoxaemia	2.5	2.2	1.6	3.3	-	1.9
Weather Conditions	12.0	7.4	7.4	13.3	7.6	13.6
Lambing Complications	10.2	6.5	4.0	2.6	6.1	8.2
Old Age	4.5	4.8	5.4	3.0	3.8	3.2
On Back	-	-	-	-	-	-
Poison	2.3	4.6	2.5	1.4	3.2	2.6
Theft	-	-	2.0	-	1.1	-
Other/Unknown	11.1	10.4	6.5	6.0	12.7	17.5
<b>Total Non-Predators</b>	<b>48.2</b>	<b>40.0</b>	<b>34.2</b>	<b>33.0</b>	<b>41.9</b>	<b>49.7</b>
<b>Total Losses</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>
Dollar Value of Losses by Cause (000)						
Bear	180	236	335	246	326	199
Bobcat	41	-	44	-	-	-
Coyote	1,075	1,274	1,144	1,462	1,317	1,144
Dog	84	99	121	146	86	89
Fox	67	47	35	31	30	38
Mountain Lion	274	350	265	301	210	96
Wolves	-	-	-	-	-	-
Eagle	78	65	59	55	72	113
Other/Unknown	48	60	139	71	125	455
<b>Total Predators</b>	<b>1,846</b>	<b>2,131</b>	<b>2,142</b>	<b>2,312</b>	<b>2,166</b>	<b>2,134</b>
Diseases	215	178	203	148	338	127
Enterotoxaemia	97	87	50	150	-	87
Weather Conditions	404	267	239	405	233	541
Lambing Complications	377	272	176	116	260	436
Old Age	296	338	352	185	262	253
On Back	-	-	-	-	-	-
Poison	98	266	109	61	176	156
Theft	-	-	106	-	56	-
Other/Unknown	453	406	215	224	497	883
<b>Total Non-Predators</b>	<b>1,940</b>	<b>1,814</b>	<b>1,449</b>	<b>1,289</b>	<b>1,822</b>	<b>2,483</b>
<b>Total Losses</b>	<b>3,786</b>	<b>3,946</b>	<b>3,591</b>	<b>3,601</b>	<b>3,988</b>	<b>4,617</b>

<sup>1</sup> Lamb losses include both before and after docking losses.

<sup>2</sup> - Indicates less than 500 head and are included in Other/Unknown.

### Losses of Sheep by Cause: Utah, 2005-2010 <sup>1</sup>

Cause of Loss	2005	2006	2007	2008	2009	2010
Number of Head						
Bear	600	2,400	1,200	1,000	1,000	600
Bobcat	-	-	-	-	-	-
Coyote	2,400	2,600	2,000	4,000	3,700	1,900
Dog	-	-	500	600	-	-
Fox	-	-	-	-	-	-
Mountain Lion	700	1,200	800	1,000	700	-
Wolves	-	-	-	-	-	-
Eagle	-	-	-	-	-	-
Other/Unknown	600	500	200	200	700	1,500
<b>Total Predators</b>	<b>4,300</b>	<b>5,300</b>	<b>4,700</b>	<b>6,800</b>	<b>6,100</b>	<b>4,000</b>
Diseases	700	700	900	700	1,500	-
Enterotoxaemia	-	-	-	800	-	-
Weather Conditions	700	700	500	700	-	700
Lambing Complications	1,000	1,000	800	600	1,000	1,600
Old Age	2,000	2,200	2,400	1,300	1,800	1,500
On Back	-	-	-	-	-	-
Poison	-	1,500	500	-	1,000	700
Theft	-	-	600	-	-	-
Other/Unknown	2,300	1,600	600	1,100	2,100	3,500
<b>Total Non-Predators</b>	<b>6,700</b>	<b>7,700</b>	<b>6,300</b>	<b>5,200</b>	<b>7,400</b>	<b>8,000</b>
<b>Total Losses</b>	<b>11,000</b>	<b>13,000</b>	<b>11,000</b>	<b>12,000</b>	<b>13,500</b>	<b>12,000</b>
Percent of Total by Cause						
Bear	5.5	18.5	10.9	8.3	7.4	5.0
Bobcat	-	-	-	-	-	-
Coyote	21.8	20.0	18.2	33.3	27.4	15.8
Dog	-	-	4.5	5.0	-	-
Fox	-	-	-	-	-	-
Mountain Lion	6.4	9.2	7.3	8.3	5.2	-
Wolves	-	-	-	-	-	-
Eagle	-	-	-	-	-	-
Other/Unknown	5.5	3.8	1.8	1.7	5.2	12.5
<b>Total Predators</b>	<b>39.1</b>	<b>40.8</b>	<b>42.7</b>	<b>56.7</b>	<b>45.2</b>	<b>33.3</b>
Diseases	6.4	5.4	8.2	5.8	11.1	-
Enterotoxaemia	-	-	-	6.7	-	-
Weather Conditions	6.4	5.4	4.5	5.8	-	5.8
Lambing Complications	9.1	7.7	7.3	5.0	7.4	13.3
Old Age	18.2	16.9	21.8	10.8	13.3	12.5
On Back	-	-	-	-	-	-
Poison	-	11.5	4.5	-	7.4	5.8
Theft	-	-	5.5	-	-	-
Other/Unknown	20.9	12.3	5.5	9.2	15.6	29.2
<b>Total Non-Predators</b>	<b>60.9</b>	<b>59.2</b>	<b>57.3</b>	<b>43.3</b>	<b>54.8</b>	<b>66.7</b>
<b>Total Losses</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>
Dollar Value of Losses by Cause (000)						
Bear	89	154	176	142	146	101
Bobcat	-	-	-	-	-	-
Coyote	355	399	293	568	538	320
Dog	-	-	73	85	-	-
Fox	-	-	-	-	-	-
Mountain Lion	104	184	117	142	102	-
Wolves	-	-	-	-	-	-
Eagle	-	-	-	-	-	-
Other/Unknown	89	76	30	28	103	254
<b>Total Predators</b>	<b>636</b>	<b>814</b>	<b>689</b>	<b>966</b>	<b>889</b>	<b>675</b>
Diseases	104	107	132	99	218	-
Enterotoxaemia	-	-	-	114	-	-
Weather Conditions	104	107	73	99	-	118
Lambing Complications	148	154	117	85	146	270
Old Age	296	338	352	185	262	253
On Back	-	-	-	-	-	-
Poison	-	230	73	-	146	118
Theft	-	-	88	-	-	-
Other/Unknown	339	246	88	156	306	590
<b>Total Non-Predators</b>	<b>992</b>	<b>1,182</b>	<b>923</b>	<b>738</b>	<b>1,078</b>	<b>1,349</b>
<b>Total Losses</b>	<b>1,628</b>	<b>1,996</b>	<b>1,612</b>	<b>1,704</b>	<b>1,967</b>	<b>2,024</b>

<sup>1</sup> - Indicates less than 500 head and are included in Other/Unknown.

### Losses of All Lambs by Cause: Utah, 2005-2010<sup>1 2</sup>

Cause of Loss	2005	2006	2007	2008	2009	2010
Number of Head						
Bear	1,400	1,400	2,700	1,700	3,000	1,300
Bobcat	-	-	500	-	-	-
Coyote	11,000	14,800	14,400	14,600	13,000	10,900
Dog	600	900	800	1,000	700	500
Fox	800	800	600	500	500	500
Mountain Lion	2,600	2,800	2,500	2,600	1,800	600
Wolves	-	-	-	-	-	-
Eagle	1,200	1,100	1,000	900	1,200	1,500
Other/Unknown	900	500	2,100	700	1,100	4,000
<b>Total Predators</b>	<b>18,500</b>	<b>22,300</b>	<b>24,600</b>	<b>22,000</b>	<b>21,300</b>	<b>19,300</b>
Diseases	1,700	1,200	1,200	800	2,000	800
Enterotoxaemia	800	700	600	600	-	700
Weather Conditions	4,600	2,700	2,800	5,000	3,400	5,600
Lambing Complications	3,500	2,000	1,000	500	1,900	2,200
Old Age	-	-	-	-	-	-
On Back	-	-	-	-	-	-
Poison	600	600	600	-	500	500
Theft	-	-	-	-	-	-
Other/Unknown	3,300	3,500	2,700	2,100	4,600	5,200
<b>Total Non-Predators</b>	<b>14,500</b>	<b>10,700</b>	<b>8,900</b>	<b>9,000</b>	<b>12,400</b>	<b>15,000</b>
<b>Total Losses</b>	<b>33,000</b>	<b>33,000</b>	<b>33,500</b>	<b>31,000</b>	<b>33,700</b>	<b>34,300</b>

Percent of Total by Cause						
Bear	4.2	4.2	8.1	5.5	8.9	3.8
Bobcat	-	-	1.5	-	-	-
Coyote	33.3	44.8	43.0	47.1	38.6	31.8
Dog	1.8	2.7	2.4	3.2	2.1	1.5
Fox	2.4	2.4	1.8	1.6	1.5	1.5
Mountain Lion	7.9	8.5	7.5	8.4	5.3	1.7
Wolves	-	-	-	-	-	-
Eagle	3.6	3.3	3.0	2.9	3.6	4.4
Other/Unknown	2.7	1.5	6.3	2.3	3.3	11.7
<b>Total Predators</b>	<b>56.1</b>	<b>67.6</b>	<b>73.4</b>	<b>71.0</b>	<b>63.2</b>	<b>56.3</b>
Diseases	5.2	3.6	3.6	2.6	5.9	2.3
Enterotoxaemia	2.4	2.1	1.8	1.9	-	2.0
Weather Conditions	13.9	8.2	8.4	16.1	10.1	16.3
Lambing Complications	10.6	6.1	3.0	1.6	5.6	6.4
Old Age	-	-	-	-	-	-
On Back	-	-	-	-	-	-
Poison	1.8	1.8	1.8	-	1.5	1.5
Theft	-	-	-	-	-	-
Other/Unknown	10.0	10.6	8.1	6.8	13.6	15.2
<b>Total Non-Predators</b>	<b>43.9</b>	<b>32.4</b>	<b>26.6</b>	<b>29.0</b>	<b>36.8</b>	<b>43.7</b>
<b>Total Losses</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>	<b>100.0</b>

Dollar Value of Losses by Cause (000)						
Bear	92	83	160	104	180	98
Bobcat	-	-	30	-	-	-
Coyote	719	875	851	893	779	824
Dog	39	53	47	61	42	38
Fox	52	47	35	31	30	38
Mountain Lion	170	165	148	159	108	45
Wolves	-	-	-	-	-	-
Eagle	78	65	59	55	72	113
Other/Unknown	59	30	124	43	66	303
<b>Total Predators</b>	<b>1,210</b>	<b>1,318</b>	<b>1,454</b>	<b>1,346</b>	<b>1,277</b>	<b>1,459</b>
Diseases	111	71	71	49	120	60
Enterotoxaemia	52	41	35	37	-	53
Weather Conditions	301	160	165	306	204	423
Lambing Complications	229	118	59	31	114	166
Old Age	-	-	-	-	-	-
On Back	-	-	-	-	-	-
Poison	39	35	35	-	30	38
Theft	-	-	-	-	-	-
Other/Unknown	216	207	160	128	276	394
<b>Total Non-Predators</b>	<b>948</b>	<b>632</b>	<b>526</b>	<b>551</b>	<b>744</b>	<b>1,134</b>
<b>Total Losses</b>	<b>2,158</b>	<b>1,950</b>	<b>1,980</b>	<b>1,897</b>	<b>2,021</b>	<b>2,593</b>

<sup>1</sup> Lamb losses include both before and after docking losses.

<sup>2</sup> - Indicates less than 500 head and are included in Other/Unknown.

### Losses of Lambs Before Docking: Utah 2005-2010 <sup>1</sup>

Cause of Loss	2005	2006	2007	2008	2009	2010
Number of Head						
Bear	-	-	600	-	500	-
Bobcat	-	-	-	-	-	-
Coyote	4,300	6,500	5,800	6,300	5,300	4,200
Dog	-	600	-	500	-	-
Fox	500	500	-	-	-	-
Mountain Lion	600	600	500	500	700	-
Wolves	-	-	-	-	-	-
Eagle	1,100	800	900	800	800	800
Other/Unknown	900	400	2,900	1,200	1,100	3,200
<b>Total Predators</b>	7,400	9,400	10,700	9,300	8,400	8,200
Diseases	1,200	500	600	-	1,500	500
Enterotoxemia	-	-	-	-	-	-
Weather conditions	3,800	2,000	1,900	4,100	3,000	5,000
Lambing Complications	3,500	2,000	1,000	500	1,900	2,200
Old Age	-	-	-	-	-	-
On Back	-	-	-	-	-	-
Poison	-	-	-	-	-	-
Theft	-	-	-	-	-	-
Other/Unknown	2,100	1,100	1,300	1,100	2,900	3,400
<b>Total Non-Predators</b>	10,600	5,600	4,800	5,700	9,300	11,100
<b>TOTAL LOSSES</b>	18,000	15,000	15,500	15,000	17,700	19,300

<sup>1</sup> - Indicates less than 500 head and are included in Other/Unknown.

### Losses of Lambs After Docking: Utah 2005-2010 <sup>1</sup>

Cause of Loss	2005	2006	2007	2008	2009	2010
Number of Head						
Bear	1,200	1,300	2,100	1,400	2,500	1,300
Bobcat	-	-	-	-	-	-
Coyote	6,700	8,300	8,600	8,300	7,700	6,700
Dog	-	-	600	500	600	-
Fox	-	-	-	-	-	-
Mountain Lion	2,000	2,200	2,000	2,100	1,100	500
Wolves	-	-	-	-	-	-
Eagle	-	-	-	-	-	700
Other/Unknown	1,200	1,100	600	400	1,000	1,900
<b>Total Predators</b>	11,100	12,900	13,900	12,700	12,900	11,100
Diseases	500	700	600	-	500	-
Enterotoxemia	500	500	500	600	-	500
Weather conditions	800	700	900	900	-	600
Lambing Complications	-	-	-	-	-	-
Old Age	-	-	-	-	-	-
On Back	-	-	-	-	-	-
Poison	500	500	500	-	-	-
Theft	-	-	-	-	-	-
Other/Unknown	1,600	2,700	1,600	1,800	2,600	2,800
<b>Total Non-Predators</b>	3,900	5,100	4,100	3,300	3,100	3,900
<b>TOTAL LOSSES</b>	15,000	18,000	18,000	16,000	16,000	15,000

<sup>1</sup> - Indicates less than 500 head and are included in Other/Unknown.

# Hogs and Pigs

## Hogs and Pigs: Farms, Inventory and Value, Utah, 2003-2010

Year	Farms with Hogs	Hogs and Pigs on Farms December 1		
		Number	Value <sup>1</sup>	
			Per Head	Total
	<i>Number</i>	<i>1,000 Head</i>	<i>Dollars</i>	<i>1,000 Dollars</i>
2003	500	660	72.00	47,520
2004	500	690	110.00	75,900
2005	450	690	100.00	69,000
2006	450	680	93.00	63,240
2007	610	790	76.00	60,040
2008	( <sup>2</sup> )	740	93.00	68,820
2009	( <sup>2</sup> )	730	87.00	63,510
2010	( <sup>2</sup> )	740	110.00	81,400

<sup>1</sup> Values as of December 31.

<sup>2</sup> Livestock operations published every 5 years beginning 2007, to coincide with U.S. Census of Agriculture.

## Hogs and Pigs: Inventory by Class and Weight Group, Utah, December 1, 2003-2007 <sup>1</sup>

Year	Total	Breeding	Market	Market Hogs & Pigs by Weight Group			
				Under 60 lbs	60-119 Lbs	120-179 Lbs	180 Lbs & Over
				<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>
2003	660	91	569	245	123	123	78
2004	690	92	598	250	131	131	86
2005	690	92	598	260	146	136	56
2006	680	103	577	273	129	115	60
2007	790	100	690	275	148	142	125

<sup>1</sup> Market hogs and pigs weight groups were changed after 2007.

## Hogs and Pigs: Inventory by Class and Weight Group, Utah, December 1, 2008-2010 <sup>1</sup>

Year	Total	Breeding	Market	Market Hogs & Pigs by Weight Group			
				Under 50 lbs	50-119 Lbs	120-179 Lbs	180 Lbs & Over
				<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>
2008	740	75	665	235	170	140	120
2009	730	75	655	260	135	130	130
2010	740	80	660	260	135	130	135

<sup>1</sup> Market hogs and pigs weight groups were changed after 2007.

## Hogs and Pigs: Balance Sheet, Utah, 2003-2010

Year	Inventory Beginning of Year <sup>1</sup>	Annual Pig Crop	Inshipments	Marketings <sup>2</sup>	Farm Slaughter <sup>3</sup>	Deaths	Inventory End of Year
	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>	<i>1,000 Head</i>
2003	670	1,272	8	1,195	1	94	660
2004	660	1,320	8	1,200	1	97	690
2005	690	1,325	12	1,255	1	81	690
2006	690	1,365	12	1,303	1	83	680
2007	680	1,565	12	1,348	1	118	790
2008	790	1,614	12	1,527	1	148	740
2009	740	1,645	12	1,554	1	112	730
2010	730	1,637	2	1,539	1	89	740

<sup>1</sup> Hogs and pigs inventory is as of December 1 previous year.

<sup>2</sup> Includes custom slaughter for use on farm where produced, State out-shippments, but excludes interfarm sales within the State.

<sup>3</sup> Excludes custom slaughter for farmers at commercial establishments.



## Hogs and Pigs: Production, Marketings and Income, Utah, 2003-2010

Year	Production <sup>1</sup>	Marketings <sup>2</sup>	Price per 100 Lbs	Value of Production	Cash Receipts <sup>3</sup>	Value of Home Consumption	Gross Income
	<i>1,000 Pounds</i>	<i>1,000 Pounds</i>	<i>Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>	<i>1,000 Dollars</i>
2003	282,066	286,560	45.40	127,833	130,098	218	130,316
2004	291,866	287,760	53.90	157,128	155,103	259	155,362
2005	296,717	300,960	55.90	164,344	168,237	268	168,505
2006	285,755	286,440	49.40	139,583	141,501	237	141,738
2007	301,090	282,870	50.80	152,190	143,698	244	143,942
2008	312,262	320,460	52.30	163,240	167,601	251	167,852
2009	324,227	326,130	47.50	153,912	155,111	228	155,140
2010	301,479	299,030	60.70	183,197	181,806	291	182,097

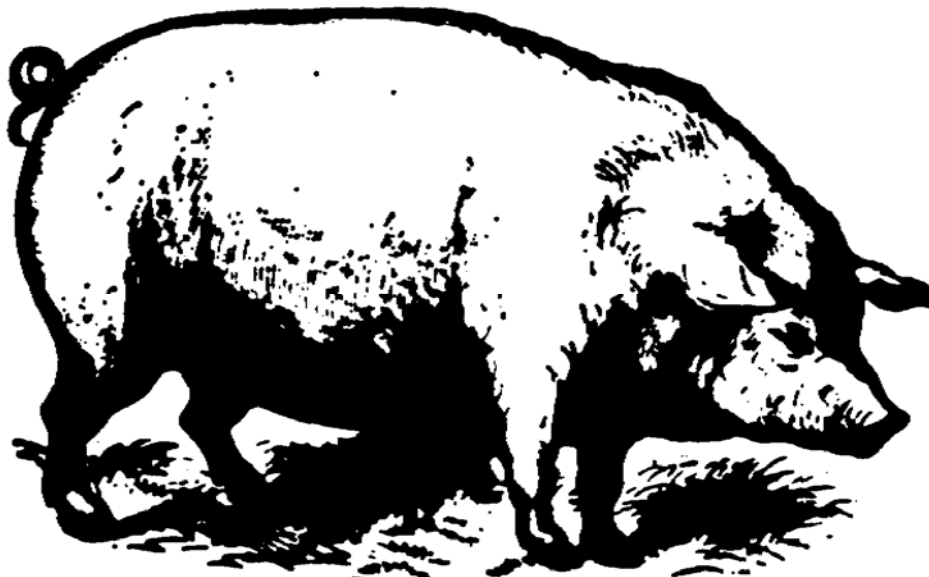
<sup>1</sup> Adjustments made for inshipments and changes in inventories.

<sup>2</sup> Excludes interfarm sales within the State and custom slaughter for use on farms where produced.

<sup>3</sup> Includes receipts from marketings and from sales of farm slaughtered meat.

## Pig Crop: Sows Farrowing and Pigs Saved, Utah, 2003-2010

Year	Sows Farrowing	Pigs per Litter	Pigs Saved
	<i>1,000 Head</i>	<i>Head</i>	<i>1,000 Head</i>
2003	136.0	9.35	1,272
2004	142.0	9.30	1,320
2005	139.0	9.53	1,325
2006	144.0	9.48	1,365
2007	160.0	9.78	1,565
2008	163.0	9.90	1,614
2009	167.0	9.85	1,645
2010	162.0	10.04	1,637



# Chickens and Eggs

## Layers & Eggs: Number, Production and Value of Production, Utah 2003-2010 <sup>1</sup>

Year	Average Number of Layers	Eggs per Layer <sup>2</sup>	Total Egg Production	Price per Dozen	Value of Production
	<i>1,000 Head</i>	<i>Number</i>	<i>Millions</i>	<i>Dollars</i>	<i>1,000 Dollars</i>
2003	3,340	259	866	0.520	37,556
2004	3,182	261	831	0.520	36,012
2005	3,285	267	878	0.318	23,248
2006	3,457	271	937	0.394	30,727
2007	3,575	267	954	0.662	52,618
2008	3,389	270	914	0.951	72,422
2009	3,378	274	925	0.681	52,470
2010	3,404	273	929	( <sup>3</sup> )	64,329

<sup>1</sup> Estimates cover the 12 month period, December 1 previous year, through November 30.

<sup>2</sup> Total egg production divided by average number of layers on hand.

<sup>3</sup> Price per dozen no longer published at the State level.

## Chicken Inventory: Number and Value, Utah, December 1, 2003-2010 <sup>1</sup>

Year	Layers	Pullets	Total Chickens		
	Total	Total <sup>2</sup>	Number	Value	
				Average Per Head	Total
	<i>1,000</i>	<i>1,000</i>	<i>1,000</i>	<i>Dollars</i>	<i>1,000 Dollars</i>
2003	3,394	500	3,894	2.30	8,956
2004	3,176	701	3,877	1.30	5,040
2005	3,402	756	4,158	1.70	7,069
2006	3,763	650	4,413	1.20	5,296
2007	3,522	675	4,197	1.40	5,876
2008	3,403	509	3,912	2.30	8,998
2009	3,402	627	4,029	1.80	7,252
2010	3,448	814	4,262	2.20	9,376

<sup>1</sup> Excludes commercial broilers

<sup>2</sup> Pullet total begins in 2003.

## Chicken: Lost, Sold, and Value of Sales, Utah, 2003-2010 <sup>1</sup>

Year	Number Lost <sup>2</sup>	Number Sold	Pounds Sold	Price per Pound	Value of Sales
	<i>1,000</i>	<i>1,000</i>	<i>1,000</i>	<i>Dollars</i>	<i>1,000 Dollars</i>
2003	489	1,776	6,571	0.010	66
2004	511	1,626	6,016	0.010	60
2005	523	1,610	5,796	0.010	58
2006	751	1,451	4,788	0.001	5
2007	1,067	1,533	5,059	0.001	5
2008	932	1,747	5,765	0.001	6
2009	492	1,657	5,468	0.001	5
2010	612	1,388	4,442	0.001	4

<sup>1</sup> Estimates exclude broilers and cover the 12 month period December 1 previous year through November 30.

<sup>2</sup> Includes rendered, died, destroyed, composted, or disappeared for any reason except sold during the 12 month period.

# Bees, Honey, & Trout

## Honey: Colonies of Bees, Production, & Value, Utah, 2003-2010

Year	Honey Producing Colonies <sup>1</sup>	Honey			
		Production		Value of Production	
		Yield per Colony	Total	Average Price per Pound <sup>2</sup>	Total <sup>3</sup>
	<i>1,000</i>	<i>Pounds</i>	<i>1,000 Pounds</i>	<i>Cents</i>	<i>1,000 Dollars</i>
2003	25	57	1,425	128	1,824
2004	24	70	1,680	110	1,848
2005	24	45	1,080	95	1,026
2006	26	50	1,300	98	1,274
2007	28	42	1,176	113	1,329
2008	28	48	1,344	157	2,110
2009	26	38	988	146	1,442
2010	26	30	780	152	1,186

<sup>1</sup> Honey producing colonies are the maximum number of colonies from which honey was taken during the year. It is possible to take honey from colonies which did not survive the entire year.

<sup>2</sup> Average price per pound based on expanded sales.

<sup>3</sup> Value of production is equal to production multiplied by average price per pound.

## Trout: Number of Operations, Total Value of Fish Sold, and Foodsize Sales, Utah, 2004-2010

Year	Total Number of Operations	Total Value of Fish Sold	Foodsize (12 inches or longer)			
			Number of Fish	Live Weight	Sales	
					Total <sup>1</sup>	Average Price per pound
	<i>Number</i>	<i>1,000 Dollars</i>	<i>1,000</i>	<i>1,000 Pounds</i>	<i>1,000 Dollars</i>	<i>Dollars</i>
2004	27	760	180	165	421	2.55
2005	21	540	166	157	466	2.97
2006	26	318	75	87	301	3.46
2007	25	436	101	111	350	3.15
2008 <sup>2</sup>	( <sup>3</sup> )	535	109	124	433	3.49
2009	( <sup>3</sup> )	529	99	106	333	3.14
2010	( <sup>3</sup> )	601	100	116	365	3.15

<sup>1</sup> Due to rounding, total live weight multiplied by average pounds per unit may not exactly equal total sales.

<sup>2</sup> Revised.

<sup>3</sup> State level number of operations will only be published every 5 years in conjunction with Census of Agriculture.

# Mink

## Number of Ranches, Pelts Produced, Females Bred, Average Price & Value, Utah and United States, 2003-2010

Year	Utah			United States				
	Ranches Producing Pelts <sup>1</sup>	Pelts Produced	Females Bred	Ranches Producing Pelts	Pelts Produced	Females Bred	Average Marketing Price	Value of Pelts
	<i>Number</i>	<i>1,000</i>	<i>1,000</i>	<i>Number</i>	<i>1,000</i>	<i>1,000</i>	<i>Dollars</i>	<i>Million Dollars</i>
2003	80	590	135	305	2,549.0	603.4	40.10	102.2
2004	80	580	143	296	2,558.1	604.8	47.10	120.5
2005	70	600	150	275	2,637.8	641.4	60.90	160.6
2006	66	623	155	279	2,858.8	654.1	48.40	138.4
2007	65	600	155	283	2,828.2	696.1	65.70	185.8
2008	( <sup>1</sup> )	550	156	274	2,820.7	691.3	41.60	117.3
2009	( <sup>1</sup> )	614	157	278	2,866.7	674.2	65.10	186.6
2010	( <sup>1</sup> )	678	171	265	2,822.2	670.2	81.90	231.1

<sup>1</sup> Beginning in 2008 State level number of operations will only be published every five years in conjunction with the Census of Agriculture.

## Pelts Produced in 2010 and Females Bred for 2011, by Type, Utah and United States

Type	Pelts Produced 2010		Females Bred To Produce Kits 2011	
	Utah	United States	Utah	United States
	<i>Number</i>	<i>Number</i>	<i>Number</i>	<i>Number</i>
Black <sup>1</sup>	245,000	1,443,600	62,000	363,500
Demi/Wild <sup>2</sup>	(D)	101,200	7,500	26,120
Pastel	(D)	66,820	(D)	17,200
Sapphire <sup>3</sup>	12,000	76,480	4,500	20,380
Blue Iris <sup>4</sup>	(D)	263,620	(D)	58,000
Mahogany	300,000	725,900	73,000	171,860
Pearl	(D)	74,900	(D)	18,600
Lavender <sup>5</sup>	-	6,030	-	2,410
Violet	-	9,440	-	3,550
White	(D)	46,800	(D)	17,780
Other <sup>6</sup>	-	7,410	-	1,600
Total	677,900	2,822,200	168,600	701,000

- Represents zero.

(D) Withheld to avoid disclosing data for individual operations.

<sup>1</sup> Black - formerly Standard, includes Pure Dark

<sup>2</sup> Demi/Wild - includes Dark brown, Ranch Wild, Demi-buff

<sup>3</sup> Sapphire - includes Pale Brown

<sup>4</sup> Blue Iris - for Gunmetal, includes Aleutian

<sup>5</sup> Lavender - formerly Lavender Hope

<sup>6</sup> Other - Includes Pink

# Agricultural Prices – Paid & Received

## Farm Labor: Number Hired, Wage Rates, & Hours Worked, Mountain II Region, July 2010, October 2010, January 2011, and April 2011 <sup>1 2</sup>

	July 2010	October 2010	January 2011	April 2011
<b>Hired Workers (1,000 employees)</b>				
Hired workers	24	19	15	( <sup>3</sup> )
Expected to be employed				
150 days or more	18	15	14	( <sup>3</sup> )
149 days or less	6	4	1	( <sup>3</sup> )
<b>Hours Worked (per week)</b>				
Hours worked by hired workers	44.1	42.0	40.2	( <sup>3</sup> )
<b>Wage Rates (dollars per hours)</b>				
Wage rates for all hired workers	10.05	11.95	12.00	( <sup>3</sup> )
Type of worker				
Field	9.61	10.91	10.89	( <sup>3</sup> )
Livestock	8.99	11.01	10.56	( <sup>3</sup> )
Field & Livestock combined	9.40	10.95	10.70	( <sup>3</sup> )

<sup>1</sup> Mountain II Region includes Colorado, Nevada, and Utah.

<sup>2</sup> Excludes Agricultural Service workers.

<sup>3</sup> Labor Survey Not Conducted in April 2011

## Grazing Fee Annual Average Rates, Utah, 2003 - 2010

Year	Per Animal Unit <sup>1</sup>	Cow-Calf	Per Head
	<i>Dollars Per Month</i>	<i>Dollars Per Month</i>	<i>Dollars Per Month</i>
2003	11.60	13.40	12.50
2004	11.80	13.80	13.10
2005	11.60	13.60	13.00
2006	11.70	14.60	13.50
2007	12.90	14.60	14.20
2008	13.00	15.90	15.50
2009	13.00	16.30	15.30
2010	13.10	17.00	15.50

<sup>1</sup> Includes animal unit plus Cow-calf rate converted to animal unit (AUM) using (1 aum=cow-calf \* 0.833)

## Average Prices Received: by Farmers, Utah, 2003-2010

Year	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Mktg Year Avg <sup>1</sup>
<b>Barley (Dollars per Bushel)</b>													
2003	2.58	2.52	2.58	2.75	2.54	2.57	2.12	2.25	2.35	2.25	2.28	2.44	2.30
2004	2.39	2.74	2.59	2.72	2.71	2.51	2.42	2.30	2.05	1.96	2.39	1.91	2.21
2005	2.11	1.96	1.89	2.04	(D)	2.10	2.03	1.94	1.96	(D)	2.09	(D)	2.06
2006	2.34	2.11	2.17	2.29	2.20	(D)	2.36	2.39	2.58	2.95	2.72	3.40	3.02
2007	3.65	3.91	3.70	3.18	3.72	(D)	3.38	3.39	4.71	5.59	5.22	4.99	3.99
2008	6.03	(D)	4.76	(D)	(D)	(D)	(D)	4.56	4.45	4.07	(D)	(D)	4.41
2009	(D)	(D)	(D)	(D)	3.23	(D)	(D)	2.50	2.25	2.14	2.49	2.72	2.56
2010	2.89	3.03	2.95	2.91	2.97	3.21	2.66	2.88	3.05	3.11	3.73	4.35	3.43
<b>Alfalfa &amp; Alfalfa Hay Mixtures, Baled (Dollars per Ton)</b>													
2003	94.00	93.00	90.00	93.00	99.00	93.00	83.00	83.00	81.00	76.00	70.00	87.00	82.00
2004	84.00	78.00	75.00	81.00	90.00	88.00	90.00	87.00	85.00	86.00	92.00	87.00	89.00
2005	85.00	91.00	99.00	92.00	90.00	95.00	95.00	90.00	95.00	97.00	100.00	104.00	96.00
2006	95.00	100.00	96.00	106.00	98.00	101.00	101.00	101.00	97.00	99.00	99.00	101.00	101.00
2007	100.00	105.00	105.00	110.00	120.00	130.00	130.00	130.00	132.00	132.00	135.00	140.00	131.00
2008	145.00	145.00	145.00	150.00	155.00	165.00	175.00	175.00	170.00	172.00	180.00	162.00	170.00
2009	150.00	145.00	150.00	140.00	135.00	105.00	100.00	105.00	105.00	100.00	105.00	100.00	102.00
2010	90.00	100.00	100.00	95.00	95.00	100.00	100.00	100.00	108.00	108.00	108.00	109.00	106.00
<b>Other Hay, Baled (Dollars per Ton)</b>													
2003	60.00	63.00	63.00	76.00	76.00	72.00	70.00	72.00	61.00	60.00	60.00	76.00	68.00
2004	71.00	66.00	62.00	70.00	75.00	80.00	80.00	80.00	78.00	80.00	88.00	83.00	80.00
2005	75.00	80.00	80.00	80.00	80.00	85.00	85.00	85.00	80.00	82.00	82.00	82.00	83.00
2006	80.00	85.00	85.00	90.00	75.00	81.00	81.00	76.00	72.00	72.00	72.00	75.00	77.00
2007	75.00	80.00	80.00	85.00	93.00	110.00	105.00	110.00	120.00	120.00	120.00	120.00	113.00
2008	120.00	120.00	125.00	130.00	145.00	130.00	140.00	140.00	145.00	135.00	130.00	135.00	137.00
2009	135.00	140.00	130.00	115.00	130.00	100.00	90.00	90.00	85.00	100.00	(D)	90.00	94.00
2010	85.00	100.00	105.00	90.00	85.00	95.00	100.00	85.00	99.00	99.00	99.00	99.00	98.00
<b>All Hay, Baled (Dollars per Ton)</b>													
2003	93.00	91.00	88.00	92.00	99.00	92.00	82.00	82.00	80.00	75.00	70.00	86.00	81.50
2004	83.00	78.00	75.00	81.00	90.00	88.00	90.00	87.00	85.00	86.00	92.00	87.00	88.50
2005	85.00	91.00	98.00	92.00	89.00	94.00	93.00	89.00	93.00	95.00	98.00	102.00	94.50
2006	93.00	99.00	95.00	104.00	98.00	100.00	100.00	99.00	96.00	97.00	98.00	100.00	99.50
2007	99.00	104.00	104.00	109.00	119.00	129.00	126.00	129.00	131.00	131.00	133.00	138.00	129.00
2008	139.00	143.00	140.00	148.00	154.00	163.00	172.00	173.00	168.00	168.00	175.00	157.00	167.00
2009	149.00	145.00	144.00	130.00	135.00	105.00	100.00	105.00	105.00	100.00	105.00	100.00	102.00
2010	90.00	100.00	100.00	95.00	95.00	100.00	100.00	100.00	108.00	108.00	108.00	109.00	106.00

<sup>1</sup> Marketing year, barley, July 1 to June 30; hay, May 1 to April 30.

(D) Not published to avoid disclosure of individual operations.

### Average Prices Received: by Farmers, Utah, 2003-2010 <sup>1</sup>

Year	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Mktg Year Avg
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#### Milk, All (Dollars per Cwt)

2003	10.50	10.60	10.60	11.60	12.40	14.20	14.80	14.40	13.70	11.30	11.10	10.60	12.10
2004	12.50	13.00	14.90	16.50	20.00	18.60	16.40	14.30	14.90	15.10	15.60	16.30	15.70
2005	16.60	14.90	15.30	14.80	14.40	14.10	14.50	14.50	14.90	15.10	14.50	14.10	14.80
2006	14.00	13.70	12.70	11.60	11.50	11.40	11.40	11.80	13.10	13.30	13.80	14.10	12.70
2007	14.50	14.70	15.50	16.00	17.80	20.20	21.20	21.00	21.40	21.10	21.10	21.10	18.90
2008	18.20	18.50	19.50	19.00	17.80	17.40	17.20	16.70	15.70	20.20	18.70	18.70	18.10
2009	11.20	10.70	10.90	10.60	11.60	12.40	14.30	14.70	16.00	12.70	10.80	10.90	12.20
2010	14.30	15.10	15.60	15.80	16.70	17.40	18.40	18.10	17.00	15.70	15.40	14.90	16.20

#### Milk, Eligible for Fluid Market (Dollars per Cwt) <sup>2</sup>

2003	10.50	10.60	10.60	11.60	12.40	14.20	14.80	14.40	13.70	11.30	11.10	10.60	12.10
2004	12.50	13.00	14.90	16.50	20.00	18.60	16.40	14.30	14.90	15.10	15.60	16.30	15.70
2005	16.60	14.90	15.30	14.80	14.40	14.10	14.50	14.50	14.90	15.10	14.50	14.10	14.80

#### Milk, Manufacturing Grade (Dollars per Cwt)

2003	10.20	10.00	10.00	11.10	13.00	15.00	15.50	15.60	13.90	10.70	10.70	10.40	12.10
2004	13.00	12.80	14.30	18.00	20.50	19.30	16.50	14.90	15.50	15.90	16.30	17.50	16.20
2005	16.70	15.80	15.30	15.20	14.50	14.10	14.40	14.30	15.10	16.00	15.40	15.20	15.10

<sup>1</sup> Milk not broken out by grade after 2005.

<sup>2</sup> Includes surplus diverted to manufacturing.

### Average Prices Received: by Farmers, Milk Cows, Utah 2003-2010

Year	2003	2004	2005	2006	2007	2008	2009	2010
	<i>Per Head</i>	<i>Per Head</i>	<i>Per Head</i>	<i>Per Head</i>	<i>Per Head</i>	<i>Per Head</i>	<i>Per Head</i>	<i>Per Head</i>
<b>Mktg Year Avg</b>	1,270	1,510	1,620	1,620	1,620	1,660	1,220	1,160

### Average Prices Received: by Farmers, Sheep and Lambs, Utah 2003-2010

Year	2003	2004	2005	2006	2007	2008	2009	2010
	<i>Per Cwt</i>	<i>Per Cwt</i>	<i>Per Cwt</i>	<i>Per Cwt</i>	<i>Per Cwt</i>	<i>Per Cwt</i>	<i>Per Cwt</i>	<i>Per Cwt</i>
<b>Sheep Mktg Year Avg</b>	29.90	33.80	44.00	33.20	27.90	25.00	30.20	47.80
<b>Lambs Mktg Year Avg</b>	92.00	101.00	117.00	98.50	98.50	102.00	99.90	126.00



# *Ranking: Utah Top Five Counties by Commodity*

County Estimates are an integral part of agricultural statistics. These estimates provide data to compare acres, production, and yield in different counties within the State of Utah. Crop county estimates play a major role in Federal Farm Program payments and crop insurance settlements, thus, directly affecting many farmers and ranchers. A cooperative agreement between the Utah Department of Agriculture and Food and USDA, NASS, Utah Field Office provides funding in support of county estimates contained in this publication.

County estimates may be downloaded in .CSV file format by accessing the NASS homepage at <http://www.nass.usda.gov/> under (QuickStats state and county data).” Additional County level data can be found in the 2007 Census of Agriculture at <http://www.agcensus.usda.gov/>.

		<b>Hay – Alfalfa</b>		<b>Barley – All</b>		
Rank	County	Production Tons	% of Total	County	Production Bushel	% of Total
1	Millard	302,000	14%	Cache	898,000	37%
2	Iron	228,000	11%	Millard	330,000	14%
3	Cache	193,000	9%	Utah	249,000	10%
4	Box Elder	188,000	9%	Box Elder	239,000	10%
5	Sanpete	144,000	7%	Sanpete	110,000	5%
<b>State Total</b>		<b>2,160,000</b>	<b>100%</b>		<b>2,430,000</b>	<b>100%</b>

		<b>Cattle – All Cattle</b>		<b>Cattle – Beef Cows</b>		
Rank	County	Inventory January 1, 2011	% of Total	County	Inventory January 1, 2011	% of Total
1	Box Elder	93,000	12%	Box Elder	38,500	12%
2	Millard	71,000	9%	Millard	23,000	7%
3	Utah	62,000	8%	Duchesne	22,500	7%
4	Cache	58,000	7%	Uintah	20,500	6%
5	Sanpete	54,000	7%	Utah	17,900	5%
<b>State Total</b>		<b>800,000</b>	<b>100%</b>		<b>333,000</b>	<b>100%</b>

		<b>Cattle – Milk Cows</b>		<b>Sheep - All</b>		
Rank	County	Inventory January 1, 2011	% of Total	County	Inventory January 1, 2011	% of Total
1	Cache	16,500	19%	Sanpete	60,000	21%
2	Millard	14,500	17%	Box Elder	41,500	15%
3	Utah	13,800	16%	Summit	32,500	12%
4	Box Elder	10,300	12%	Iron	24,000	9%
5	Sanpete	8,700	10%	Utah	16,600	6%
<b>State Total</b>		<b>87,000</b>	<b>100%</b>		<b>280,000</b>	<b>100%</b>

## County Estimates: by County, Selected Items and Years, Utah

Item	Unit	State	County					
			Beaver	Box Elder	Cache	Carbon	Daggett	Davis
<b>2010 Production</b>								
All Barley	Bu	2,430,000	(D)	239,000	898,000	(D)	(D)	(D)
Alfalfa & Alfalfa Mix Hay	Tons	2,160,000	91,400	188,000	193,000	16,000	8,000	19,500
<b>January 1, 2011 Inventory</b>								
All Cattle & Calves	Head	800,000	30,000	93,000	58,000	9,100	3,500	4,100
Beef Cows	Head	333,000	11,000	38,500	9,300	5,000	1,900	(D)
Milk Cows	Head	87,000	2,800	10,300	16,500	(D)	(D)	(D)
Sheep & Lambs	Head	280,000	(D)	41,500	1,800	10,300	(D)	500
<b>Cash Receipts, 2009 <sup>1</sup></b>								
Livestock	(000)	791,196	165,648	64,104	76,978	3,596	948	5,580
Crops	(000)	438,413	12,489	55,189	32,232	1,060	684	27,413
Total	(000)	1,229,609	178,137	119,293	109,210	4,656	1,632	32,993
<b>2007 Census of Agriculture</b>								
Number of Farms	Num	16,700	229	1,113	1,195	294	48	496
Land in Farms	Acres	11,094,700	158,323	1,320,177	251,550	215,557	(D)	49,279
Harvested Cropland <sup>2</sup>	Acres	964,702	24,710	137,779	100,999	7,927	5,656	9,238
Irrigated Land <sup>3</sup>	Acres	1,134,144	29,917	112,113	80,236	14,837	9,179	12,244

See footnotes below.

## County Estimates: by County, Selected Items and Years, Utah (continued)

Item	Unit	County						
		Duchesne	Emery	Garfield	Grand	Iron	Juab	Kane
<b>2010 Production</b>								
All Barley	Bu	(D)	(D)	(D)	(D)	(D)	71,800	(D)
Alfalfa & Alfalfa Mix Hay	Tons	130,000	57,300	33,100	10,600	228,000	64,000	6,400
<b>January 1, 2011 Inventory</b>								
All Cattle & Calves	Head	43,000	25,500	14,500	2,700	19,900	17,300	6,400
Beef Cows	Head	22,500	14,800	9,200	(D)	10,000	(D)	3,900
Milk Cows	Head	2,300	(D)	(D)	(D)	1,600	(D)	(D)
Sheep & Lambs	Head	2,100	3,700	500	(D)	24,000	7,500	500
<b>Cash Receipts, 2009 <sup>1</sup></b>								
Livestock	(000)	20,328	6,283	4,899	1,214	26,235	8,638	7,015
Crops	(000)	9,618	3,075	1,821	1,178	53,887	9,901	394
Total	(000)	29,946	9,358	6,720	2,392	80,122	18,539	7,409
<b>2007 Census of Agriculture</b>								
Number of Farms	Num	879	545	275	90	487	335	145
Land in Farms	Acres	1,076,470	204,775	81,866	(D)	492,235	260,444	113,417
Harvested Cropland <sup>2</sup>	Acres	48,952	20,140	11,483	3,626	51,666	27,278	1,737
Irrigated Land <sup>3</sup>	Acres	101,974	41,823	22,331	4,712	59,138	27,118	4,315

<sup>1</sup> SOURCE: Bureau of Economic Analysis, U.S. Department of Commerce.

<sup>2</sup> Includes land from which crops were harvested or hay was cut, and land in orchards.

<sup>3</sup> Includes all land watered by any artificial or controlled means, such as sprinklers, furrows or ditches, and spreader dikes.

(D) Withheld to avoid disclosing data for individual farms.

## County Estimates: by County, Selected Items and Years, Utah (continued)

Item	Unit	County							
		Millard	Morgan	Piute	Rich	Salt Lake	San Juan	Sanpete	Sevier
<b>2010 Production</b>									
All Barley	Bu	330,000	(D)	(D)	76,000	(D)	(D)	110,000	36,200
Alfalfa & Alfalfa Mix Hay	Tons	302,000	33,500	25,400	23,600	10,700	9,900	144,000	121,000
<b>January 1, 2011 Inventory</b>									
All Cattle & Calves	Head	71,000	8,400	18,800	38,500	4,100	13,300	54,000	43,500
Beef Cows	Head	23,000	4,000	8,800	(D)	1,900	8,200	16,400	13,800
Milk Cows	Head	14,500	700	2,000	(D)	(D)	(D)	8,700	3,700
Sheep & Lambs	Head	4,700	13,900	3,900	8,100	900	5,800	60,000	3,700
<b>Cash Receipts, 2009<sup>1</sup></b>									
Livestock	(000)	78,623	7,698	8,941	12,306	3,068	4,719	74,827	25,220
Crops	(000)	53,958	1,758	565	1,103	15,090	5,093	16,098	16,210
Total	(000)	132,581	9,456	9,506	13,409	18,158	9,812	90,925	41,430
<b>2007 Census of Agriculture</b>									
Number of Farms	Num	703	316	113	167	587	758	879	655
Land in Farms	Acres	566,692	301,095	42,380	363,567	107,477	1,546,914	311,551	185,708
Harvested Cropland <sup>2</sup>	Acres	96,473	13,229	12,217	40,699	12,962	48,168	54,929	32,824
Irrigated Land <sup>3</sup>	Acres	103,272	13,794	16,913	51,752	9,872	5,177	70,770	52,473

See footnotes below.

## County Estimates: by County, Selected Items and Years, Utah (continued)

Item	Unit	County							
		Summit	Tooele	Uintah	Utah	Wasatch	Washington	Wayne	Weber
<b>2010 Production</b>									
All Barley	Bu	(D)	(D)	79,000	249,000	(D)	(D)	(D)	31,800
Alfalfa & Alfalfa Mix Hay	Tons	20,100	30,900	119,000	127,000	25,100	19,000	35,700	67,800
<b>January 1, 2011 Inventory</b>									
All Cattle & Calves	Head	23,500	21,000	41,500	62,000	10,400	15,000	26,500	21,500
Beef Cows	Head	11,000	(D)	20,500	17,900	4,600	6,900	13,900	4,700
Milk Cows	Head	1,100	(D)	600	13,800	900	(D)	1,600	4,600
Sheep & Lambs	Head	32,500	700	15,600	16,600	10,500	700	5,200	600
<b>Cash Receipts, 2009<sup>1</sup></b>									
Livestock	(000)	18,749	22,037	24,398	84,580	5,312	4,508	10,152	14,592
Crops	(000)	2,137	10,414	11,349	74,193	1,742	5,004	1,465	13,293
Total	(000)	20,886	32,451	35,747	158,773	7,054	9,512	11,617	27,885
<b>2007 Census of Agriculture</b>									
Number of Farms	Num	629	379	981	2,175	432	593	201	1,001
Land in Farms	Acres	414,928	252,848	1,799,785	345,634	65,935	174,192	45,222	106,247
Harvested Cropland <sup>2</sup>	Acres	15,972	11,188	43,838	72,335	9,373	7,422	16,186	25,696
Irrigated Land <sup>3</sup>	Acres	23,960	24,538	84,529	77,457	17,420	13,751	18,905	29,624

<sup>1</sup> SOURCE: Bureau of Economic Analysis, U.S. Department of Commerce.

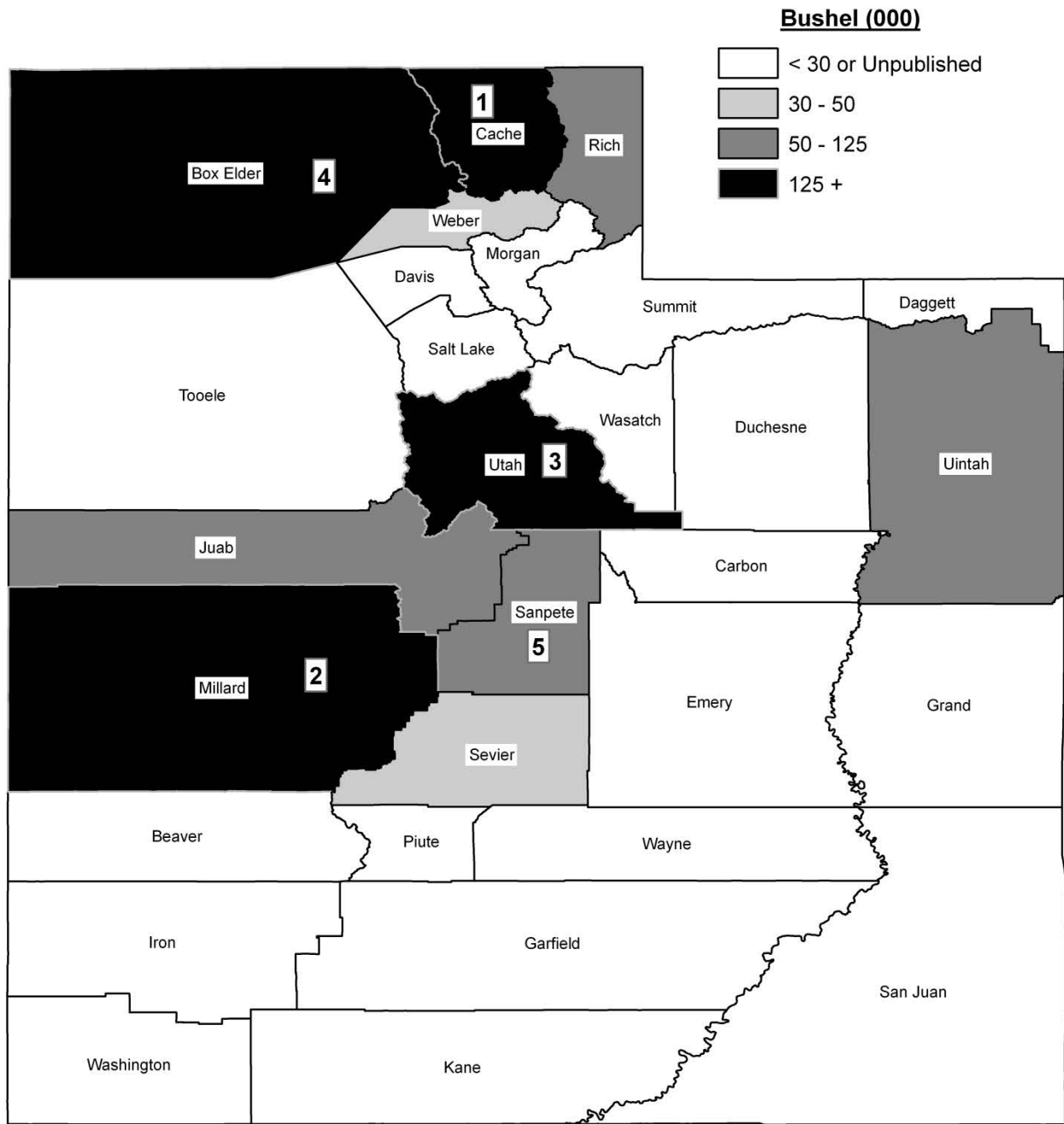
<sup>2</sup> Includes land from which crops were harvested or hay was cut, and land in orchards.

<sup>3</sup> Includes all land watered by any artificial or controlled means, such as sprinklers, furrows or ditches, and spreader dikes.

(D) Withheld to avoid disclosing data for individual farms.

# UTAH BARLEY PRODUCTION

## By County, 2010



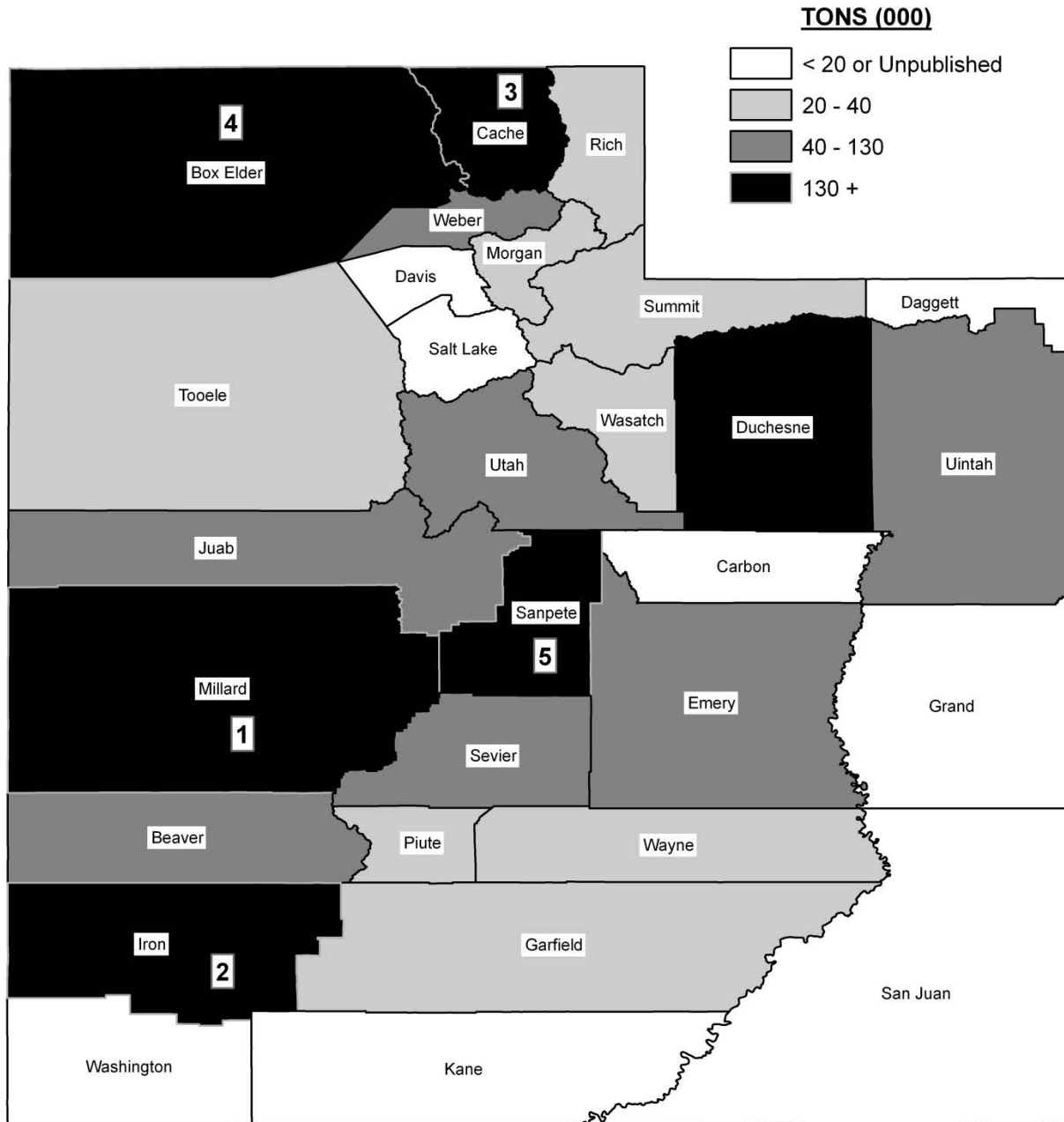
## County Estimates: All Barley, All Cropping Practices, Utah, 2009 & 2010 <sup>1</sup>

District and County	Acres				Harvested Yield		Production	
	Planted		Harvested		2009	2010	2009	2010
	2009	2010	2009	2010				
	<i>Acres</i>	<i>Acres</i>	<i>Acres</i>	<i>Acres</i>	<i>Bushels</i>	<i>Bushels</i>	<i>Bushels</i>	<i>Bushels</i>
<b>Northern</b>								
Box Elder	3,400	3,400	2,700	2,950	83	81	225,000	239,000
Cache	13,300	11,700	12,400	10,800	73	83	908,000	898,000
Davis	-	-	-	-	-	-	-	-
Morgan	1,400	-	1,400	-	81	-	114,000	-
Rich	-	900	-	850	-	89	-	76,000
Salt Lake	-	-	-	-	-	-	-	-
Tooele	700	-	400	-	98	-	39,000	-
Weber	-	900	-	350	-	91	-	31,800
Other Counties	1,100	1,900	1,100	1,450	95	100	104,000	145,200
<b>Total</b>	19,900	18,800	18,000	16,400	77	85	1,390,000	1,390,000
<b>Central</b>								
Juab	1,000	1,000	900	800	78	90	70,000	71,800
Millard	5,300	5,300	3,000	3,150	90	105	270,000	330,000
Sanpete	3,700	3,000	1,700	1,000	101	110	171,000	110,000
Sevier	1,900	1,700	800	400	106	91	85,000	36,200
Utah	2,700	2,600	2,700	2,450	109	102	294,000	249,000
Other Counties	-	-	-	-	-	-	-	-
<b>Total</b>	14,600	13,600	9,100	7,800	98	102	890,000	797,000
<b>Eastern</b>								
Carbon	-	-	-	-	-	-	-	-
Daggett	-	-	-	-	-	-	-	-
Duchesne	-	-	-	-	-	-	-	-
Emery	500	-	400	-	63	-	25,000	-
Grand	-	-	-	-	-	-	-	-
San Juan	-	-	-	-	-	-	-	-
Summit	-	-	-	-	-	-	-	-
Uintah	900	1,000	900	1,000	100	79	90,000	79,000
Wasatch	-	-	-	-	-	-	-	-
Other Counties	900	2,000	600	900	98	87	59,000	78,000
<b>Total</b>	2,300	3,000	1,900	1,900	92	83	174,000	157,000
<b>Southern</b>								
Beaver	-	-	-	-	-	-	-	-
Garfield	-	-	-	-	-	-	-	-
Iron	500	-	300	-	110	-	33,000	-
Kane	-	-	-	-	-	-	-	-
Piute	-	-	-	-	-	-	-	-
Washington	-	-	-	-	-	-	-	-
Wayne	1,400	-	300	-	80	-	24,000	-
Other Counties	1,300	3,600	400	900	98	96	39,000	86,000
<b>Total</b>	3,200	3,600	1,000	900	96	96	96,000	86,000
<b>State</b>								
<b>Total</b>	40,000	39,000	30,000	27,000	85	90	2,550,000	2,430,000

<sup>1</sup> Counties with missing data are included in the appropriate district's "Other Counties". Dash (-) indicates missing data.

# UTAH ALFALFA HAY PRODUCTION

By County, 2010



**County Estimates: Alfalfa & Alfalfa Mixtures for Hay,  
All Cropping Practices, Utah, 2009 & 2010 <sup>1</sup>**

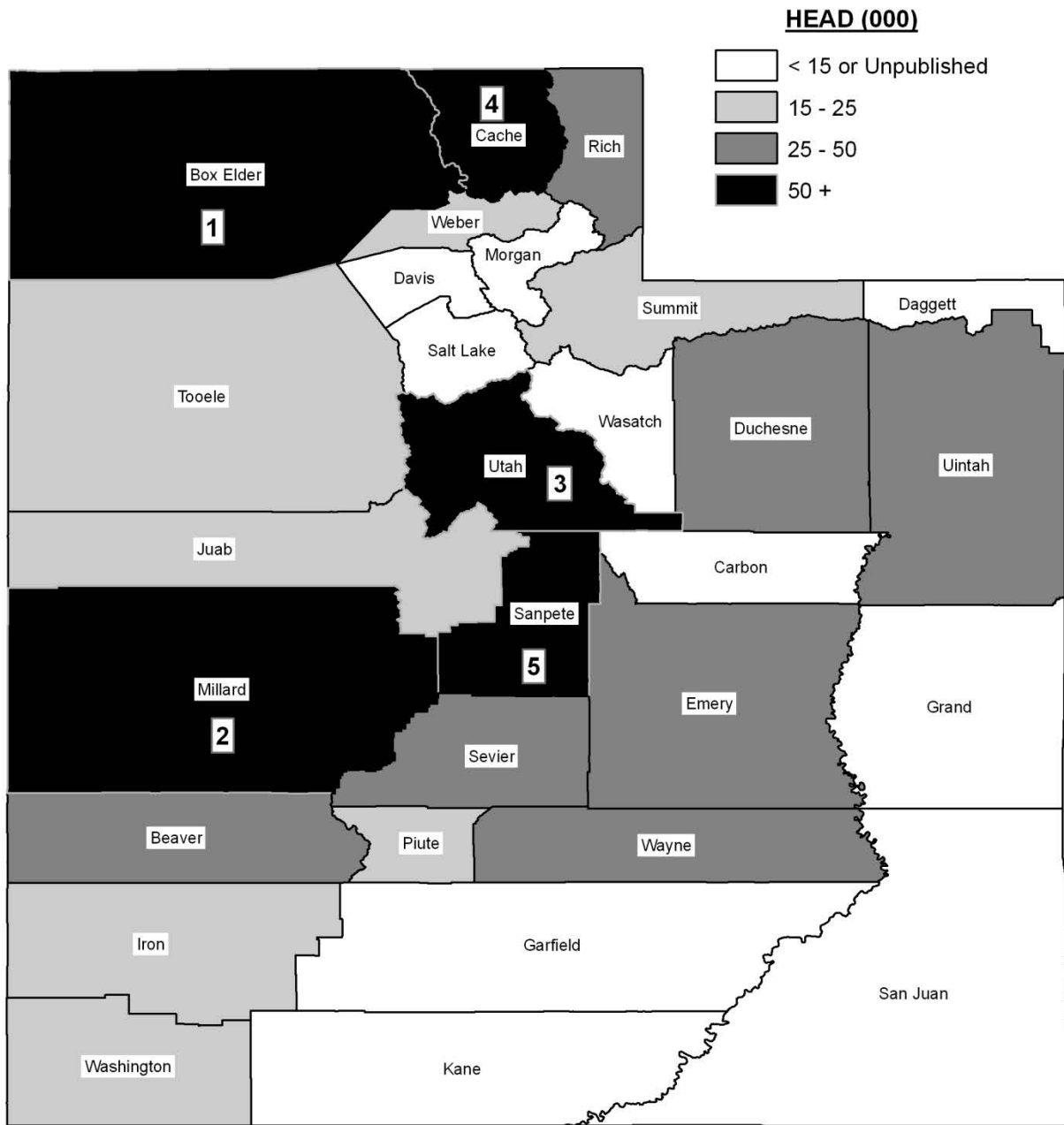
District and County	Acres Harvested		Harvested Yield		Production	
	2009	2010	2009	2010	2009	2010
	<i>Acres</i>	<i>Acres</i>	<i>Tons</i>	<i>Tons</i>	<i>Tons</i>	<i>Tons</i>
<b><i>Northern</i></b>						
Box Elder	48,100	49,000	4.0	4.0	192,000	188,000
Cache	50,300	54,000	4.1	4.1	207,000	193,000
Davis	3,900	4,600	4.4	4.4	17,000	19,500
Morgan	8,300	12,000	3.3	3.3	27,000	33,500
Rich	9,100	8,500	2.8	2.8	25,000	23,600
Salt Lake	2,900	2,500	4.5	4.5	13,000	10,700
Tooele	8,400	8,400	3.8	3.8	32,000	30,900
Weber	15,000	16,000	4.3	4.3	64,000	67,800
Other Counties	-	-	-	-	-	-
<b>Total</b>	<b>146,000</b>	<b>155,000</b>	<b>4.0</b>	<b>4.0</b>	<b>577,000</b>	<b>567,000</b>
<b><i>Central</i></b>						
Juab	15,700	16,400	4.2	4.2	66,000	64,000
Millard	63,300	61,000	5.0	5.0	315,000	302,000
Sanpete	37,000	36,800	4.2	4.2	154,000	144,000
Sevier	26,200	26,600	4.5	4.5	118,000	121,000
Utah	29,800	27,200	4.7	4.7	138,000	127,000
Other Counties	-	-	-	-	-	-
<b>Total</b>	<b>172,000</b>	<b>168,000</b>	<b>4.6</b>	<b>4.6</b>	<b>791,000</b>	<b>758,000</b>
<b><i>Eastern</i></b>						
Carbon	6,200	5,700	3.1	3.1	19,000	16,000
Daggett	4,500	4,500	2.0	2.0	9,000	8,000
Duchesne	38,200	35,100	3.7	3.7	142,000	130,000
Emery	16,200	17,900	3.2	3.2	51,000	57,300
Grand	2,700	2,600	4.1	4.1	11,000	10,600
San Juan	4,000	3,900	2.5	2.5	10,000	9,900
Summit	9,600	8,600	2.6	2.6	25,000	20,100
Uintah	28,800	29,100	4.4	4.4	125,000	119,000
Wasatch	6,800	6,600	3.8	3.8	26,000	25,100
Other Counties	-	-	-	-	-	-
<b>Total</b>	<b>117,000</b>	<b>114,000</b>	<b>3.6</b>	<b>3.6</b>	<b>418,000</b>	<b>396,000</b>
<b><i>Southern</i></b>						
Beaver	19,000	18,900	5.1	5.1	96,000	91,400
Garfield	9,600	10,800	3.4	3.4	32,000	33,100
Iron	41,500	51,100	5.2	5.2	213,000	228,000
Kane	2,700	2,100	3.0	3.0	8,000	6,400
Piute	8,000	6,600	3.7	3.7	29,000	25,400
Washington	4,500	4,300	4.7	4.7	21,000	19,000
Wayne	9,700	9,200	4.3	4.3	41,000	35,700
Other Counties	-	-	-	-	-	-
<b>Total</b>	<b>95,000</b>	<b>103,000</b>	<b>4.7</b>	<b>4.7</b>	<b>440,000</b>	<b>439,000</b>
<b><i>State</i></b>						
<b>Total</b>	<b>530,000</b>	<b>540,000</b>	<b>4.2</b>	<b>4.2</b>	<b>2,226,000</b>	<b>2,160,000</b>

<sup>1</sup> Counties with missing data are included in the appropriate district's "Other Counties". Dash (-) indicates missing data.



# ALL CATTLE INVENTORY

By County, January 1, 2011



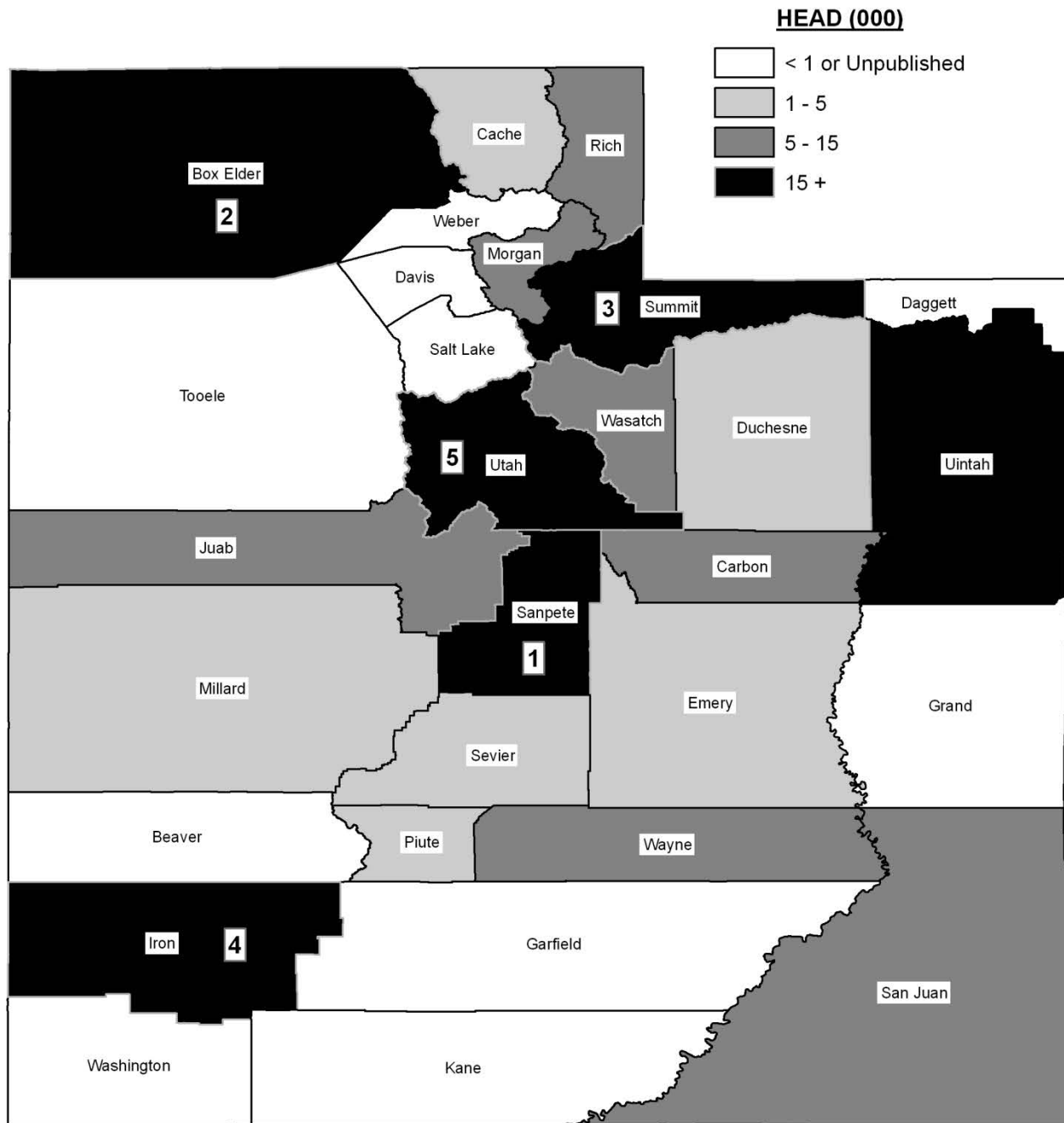
## County Estimates: Cattle, Utah, January 1, 2010 & 2011

County	All Cattle		Beef Cows <sup>1</sup>		Milk Cows <sup>1</sup>	
	2010	2011	2010	2011	2010	2011
	<i>Number</i>	<i>Number</i>	<i>Number</i>	<i>Number</i>	<i>Number</i>	<i>Number</i>
<b><i>Northern</i></b>						
Box Elder	94,000	93,000	38,500	38,500	10,200	10,300
Cache	59,000	58,000	9,400	9,300	16,000	16,500
Davis	4,200	4,100	-	-	-	-
Morgan	8,500	8,400	4,100	4,000	700	700
Rich	39,000	38,500	-	-	-	-
Salt Lake	4,200	4,100	2,000	1,900	-	-
Tooele	21,500	21,000	-	-	-	-
Weber	22,000	21,500	4,700	4,700	4,500	4,600
<b><i>Central</i></b>						
Juab	17,500	17,300	-	-	-	-
Millard	71,000	71,000	23,000	23,000	13,900	14,500
Sanpete	54,000	54,000	16,600	16,400	8,400	8,700
Sevier	44,000	43,500	13,900	13,800	3,500	3,700
Utah	63,000	62,000	18,100	17,900	13,200	13,800
<b><i>Eastern</i></b>						
Carbon	9,300	9,100	5,100	5,000	-	-
Daggett	3,500	3,500	1,900	1,900	-	-
Duchesne	43,500	43,000	23,000	22,500	2,200	2,300
Emery	26,000	25,500	14,900	14,800	-	-
Grand	2,800	2,700	-	-	-	-
San Juan	13,600	13,300	8,300	8,200	-	-
Summit	24,000	23,500	11,100	11,000	1,000	1,100
Uintah	42,000	41,500	20,500	20,500	600	600
Wasatch	10,500	10,400	4,700	4,600	900	900
<b><i>Southern</i></b>						
Beaver	30,500	30,000	11,100	11,000	2,700	2,800
Garfield	14,700	14,500	9,400	9,200	-	-
Iron	19,900	19,900	10,100	10,000	1,500	1,600
Kane	6,500	6,400	3,900	3,900	-	-
Piute	19,000	18,800	8,900	8,800	1,900	2,000
Washington	15,300	15,000	7,000	6,900	-	-
Wayne	27,000	26,500	14,000	13,900	1,600	1,600
<b>Other Counties</b>	-	-	51,800	51,300	1,200	1,300
<b>State Total</b>	<b>810,000</b>	<b>800,000</b>	<b>336,000</b>	<b>333,000</b>	<b>84,000</b>	<b>87,000</b>

<sup>1</sup> Counties with missing data are included in "Other Counties". Dash (-) indicates missing data.

# UTAH SHEEP & LAMB INVENTORY

By County, January 1, 2011



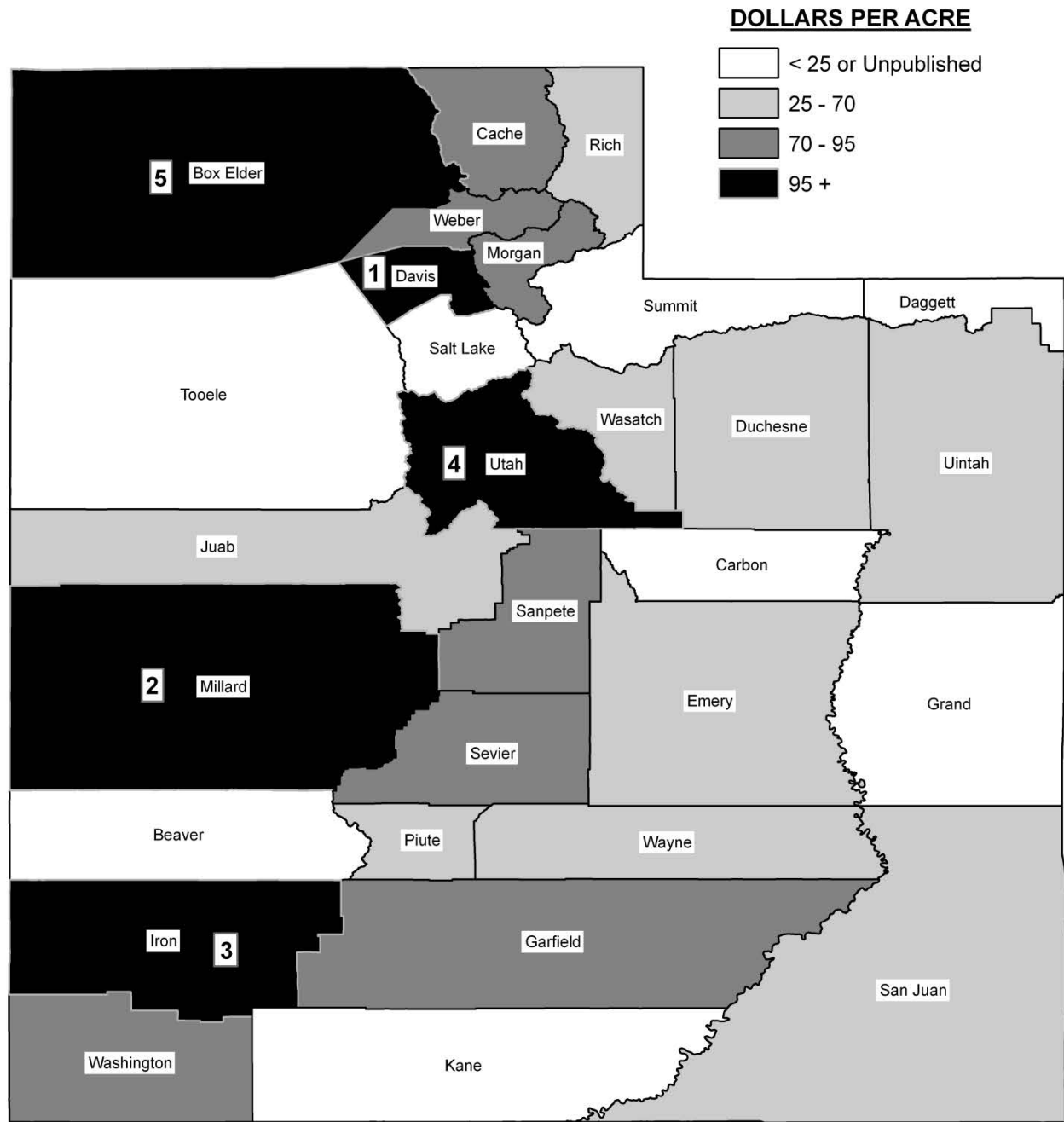
## County Estimates: Sheep, Utah, January 1, 2010 & 2011 <sup>1</sup>

District and County	Breeding Sheep 2010	All Sheep & Lambs 2011
	<i>Number</i>	<i>Number</i>
<b><i>Northern</i></b>		
Box Elder	43,000	41,500
Cache	1,900	1,800
Davis	500	500
Morgan	14,400	13,900
Rich	8,400	8,100
Salt Lake	900	900
Tooele	800	700
Weber	600	600
<b><i>Central</i></b>		
Juab	7,800	7,500
Millard	4,900	4,700
Sanpete	63,000	60,000
Sevier	3,800	3,700
Utah	17,000	16,600
<b><i>Eastern</i></b>		
Carbon	10,600	10,300
Daggett	-	-
Duchesne	2,200	2,100
Emery	3,800	3,700
Grand	-	-
San Juan	6,000	5,800
Summit	33,500	32,500
Uintah	16,200	15,600
Wasatch	10,900	10,500
<b><i>Southern</i></b>		
Beaver	-	-
Garfield	500	500
Iron	24,500	24,000
Kane	500	500
Piute	4,000	3,900
Washington	700	700
Wayne	5,400	5,200
<b>Other Counties</b>	4,200	4,200
<b>State Total</b>	290,000	280,000

<sup>1</sup> Counties with missing data are included in "Other Counties". Dash (-) indicates missing data.

# UTAH IRRIGATED CROPLAND CASH RENT PAID PER ACRE

By County, 2011



## County Estimates: Cash Rent Per Acre, 2010 & 2011\*

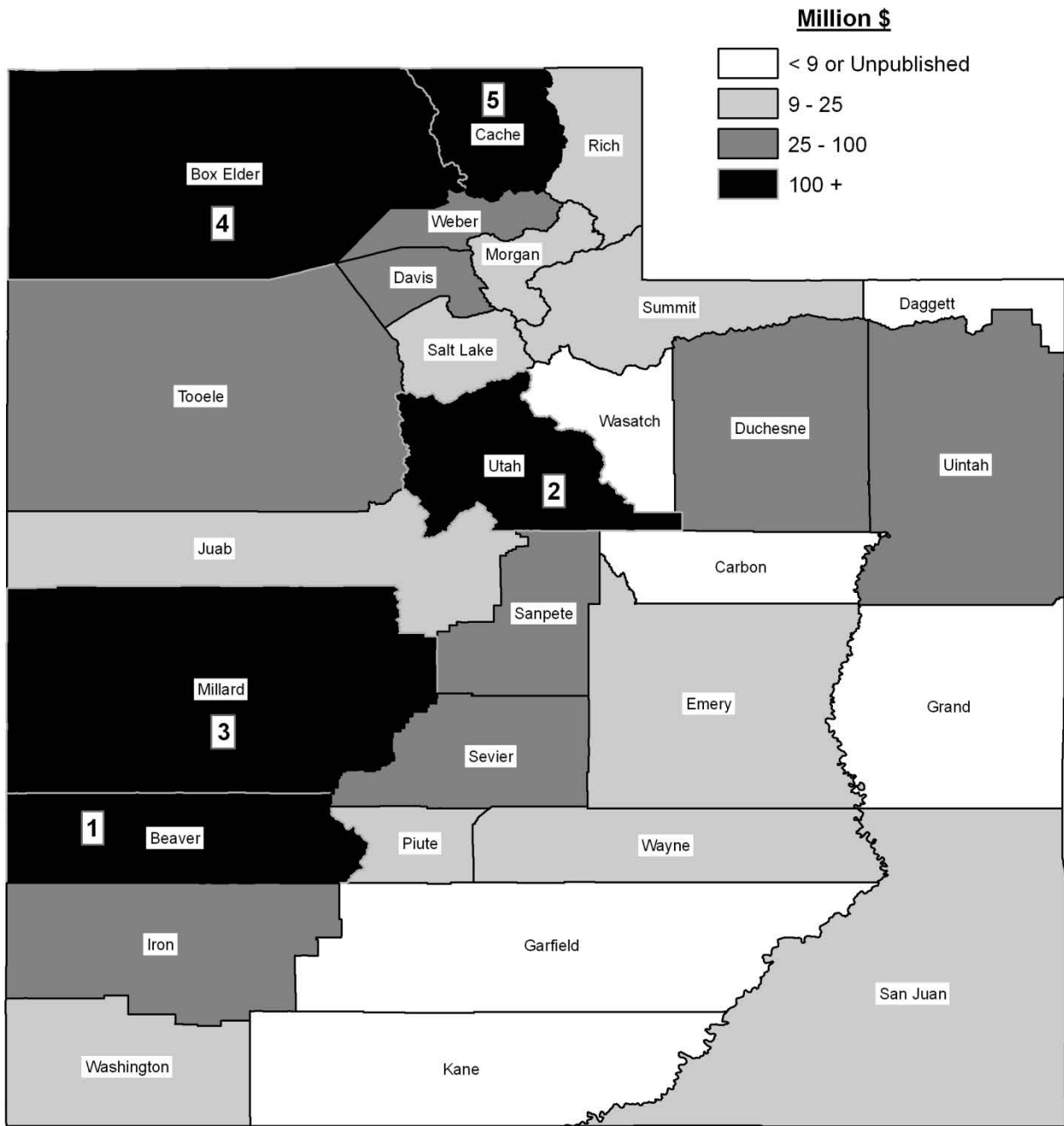
District and County	Rented for Cash <sup>1</sup>					
	Irrigated Cropland		Non-Irrigated Cropland		Pastureland	
	2010	2011	2010	2011	2010	2011
	<i>Dollars Per Acre</i>	<i>Dollars Per Acre</i>	<i>Dollars Per Acre</i>	<i>Dollars Per Acre</i>	<i>Dollars Per Acre</i>	<i>Dollars Per Acre</i>
<b>Northern</b>						
Box Elder	83.50	95.00	17.50	34.00	3.60	-
Cache	76.00	79.50	28.50	39.50	9.90	12.50
Davis	-	111.00	-	-	-	14.50
Morgan	65.00	87.50	-	42.50	2.90	2.10
Rich	44.50	46.50	10.50	-	3.40	-
Salt Lake	83.50	-	-	12.00	-	-
Tooele	-	-	-	-	-	-
Weber	75.50	92.50	-	41.00	-	-
Other Counties	95.00	76.50	21.00	29.00	5.20	5.30
<b>Total</b>	76.50	84.50	19.50	32.50	4.20	4.70
<b>Central</b>						
Juab	54.50	45.00	-	-	-	-
Millard	92.50	110.00	-	-	9.00	4.60
Sanpete	83.50	73.00	13.00	25.00	7.60	4.90
Sevier	78.00	80.50	27.00	-	-	-
Utah	72.50	96.00	24.50	-	5.90	7.00
Other Counties	-	-	15.00	13.00	3.70	6.60
<b>Total</b>	79.50	88.50	16.00	16.00	6.20	5.80
<b>Eastern</b>						
Carbon	-	-	-	-	3.00	2.90
Daggett	-	-	-	-	-	-
Duchesne	59.50	63.00	-	-	12.00	18.00
Emery	40.00	26.50	-	16.00	3.00	3.30
Grand	-	-	-	-	-	-
San Juan	-	56.50	33.50	-	-	3.30
Summit	51.50	-	-	-	-	5.80
Uintah	41.50	38.50	-	-	9.00	-
Wasatch	42.50	46.00	-	-	-	-
Other Counties	42.00	45.00	32.50	18.50	7.30	7.00
<b>Total</b>	48.50	48.00	32.50	18.00	6.30	5.90
<b>Southern</b>						
Beaver	96.50	-	-	-	-	-
Garfield	45.50	82.00	-	-	-	7.30
Iron	77.50	105.00	-	23.50	2.10	2.80
Kane	60.00	-	9.20	-	-	3.10
Piute	61.00	57.00	-	30.00	-	-
Washington	83.00	80.50	-	-	-	-
Wayne	45.00	69.00	-	42.00	10.50	15.00
Other Counties	-	110.00	12.50	21.50	4.80	8.50
<b>Total</b>	72.50	94.50	11.50	24.00	3.20	3.90
<b>State</b>						
<b>Total</b>	73.00	80.00	20.00	23.00	5.00	5.00

\* No Estimates were published for any land types for Tooele, Daggett or Grand counties.

<sup>1</sup> Counties with missing data are included in the appropriate district's "Other Counties". Dash (-) indicates missing data.

# UTAH CASH RECEIPTS FROM FARMING

By County, 2009



## County Estimates: Farm Income and Expenses by County - 2009

County and District	Cash Receipts			Government Payments	Other Farm Income	Gross Farm Income	Farm Production Expenses	Realized Net Farm Income
	Livestock & Products	Crops	Total					
	<i>Thousand Dollars</i>	<i>Thousand Dollars</i>	<i>Thousand Dollars</i>	<i>Thousand Dollars</i>	<i>Thousand Dollars</i>	<i>Thousand Dollars</i>	<i>Thousand Dollars</i>	<i>Thousand Dollars</i>
<b>Northern</b>								
Box Elder	64,104	55,189	119,293	12,789	21,174	140,467	140,691	-224
Cache	76,978	32,232	109,210	8,233	13,519	122,729	134,121	-11,392
Davis	5,580	27,413	32,993	160	4,179	37,172	49,908	-12,736
Morgan	7,698	1,758	9,456	308	3,329	12,785	19,119	-6,334
Rich	12,306	1,103	13,409	473	2,713	16,122	18,385	-2,263
Salt Lake	3,068	15,090	18,158	97	5,579	23,737	32,964	-9,227
Tooele	22,037	10,414	32,451	219	2,181	34,632	32,070	2,562
Weber	14,592	13,293	27,885	1,384	4,829	32,714	46,889	-14,175
<b>Total</b>	206,363	156,492	362,855	23,663	57,503	420,358	474,147	-53,789
<b>Central</b>								
Juab	8,638	9,901	18,539	1,929	3,852	22,391	22,217	174
Millard	78,623	53,958	132,581	3,962	9,824	142,405	136,709	5,696
Sanpete	74,827	16,098	90,925	1,669	6,055	96,980	131,416	-34,436
Sevier	25,220	16,210	41,430	853	2,801	44,231	59,200	-14,969
Utah	84,580	74,193	158,773	2,404	16,105	174,878	201,493	-26,615
<b>Total</b>	271,888	170,360	442,248	10,817	38,637	480,885	551,035	-70,150
<b>Eastern</b>								
Carbon	3,596	1,060	4,656	245	836	5,492	7,853	-2,361
Daggett	948	684	1,632		192	1,824	2,979	-1,155
Duchesne	20,328	9,618	29,946	605	4,572	34,518	51,546	-17,028
Emery	6,283	3,075	9,358	544	1,788	11,146	17,539	-6,393
Grand	1,214	1,178	2,392		73	2,465	6,107	-3,642
San Juan	4,719	5,093	9,812	3,148	5,779	15,591	21,531	-5,940
Summit	18,749	2,137	20,886	372	3,711	24,597	25,459	-862
Uintah	24,398	11,349	35,747	969	3,760	39,507	44,713	-5,206
Wasatch	5,312	1,742	7,054	267	1,799	8,853	13,438	-4,585
<b>Total</b>	54,392	35,936	121,483	6,150	22,510	143,993	191,165	-47,172
<b>Southern</b>								
Beaver	165,648	12,489	178,137	779	2,657	180,794	204,791	-23,997
Garfield	4,899	1,821	6,720	427	3,022	9,742	15,618	-5,876
Iron	26,235	53,887	80,122	654	2,048	82,170	77,209	4,961
Kane	7,015	394	7,409	490	1,326	8,735	11,462	-2,727
Piute	8,941	565	9,506	422	847	10,353	11,370	-1,017
Washington	4,508	5,004	9,512	160	1,663	11,175	20,705	-9,530
Wayne	10,152	1,465	11,617	401	1,479	13,096	15,333	-2,237
<b>Total</b>	227,398	75,625	303,023	3,333	13,042	316,065	356,488	-40,423
<b>State Total</b>								
<b>Total</b>	791,196	438,413	1,229,609	43,963	131,692	1,361,301	1,572,835	-211,534

SOURCE: Bureau of Economic Analysis, U.S. Department of Commerce, Washington, D.C.  
Last updated: April 21, 2011



# Enterprise Budgets

Prepared by the Economics Department, Utah State University

The following crop and livestock enterprise budgets were prepared by personnel at Utah State University with input from farmers and ranchers. These budgets are provided to assist farmers and ranchers in evaluating alternatives that may increase the profitability of their operation. The costs and returns commonly vary for a particular farm or ranch from those shown. Therefore, a column has been provided to adapt the budget to reflect the costs and returns for a specific farm or ranch enterprise.

Questions concerning these budgets should be referred to the appropriate contact individual in the Economics department at Utah State University in Logan at (435) 797-2310.

Budgets published in this and previous Editions of Utah Agricultural Statistics as well as budgets for other crop and livestock enterprises may be found on the extension web page at Utah State University, <http://extension.usu.edu/>.

## *Index of Enterprise Budgets by Subject and Year Most Recently Published in Utah Agricultural Statistics, 1994-2011*

Alfalfa Hay, establishment with oat hay	1998	Milk Cows, Jersey	1998
Alfalfa Hay, establishment, Grand County	1994	Milk Cows, Holstein	2010
Alfalfa Hay, irrigated, East Millard County	2001	Dairy Bull	1998
Alfalfa Hay, dryland, Box Elder County	2002	Deer Hunt Pack Trip	1996
Alfalfa Hay, Uintah County	2008	Floriculture	2004
Alfalfa Haylage, Millard County	2001	Elk	1997
Alfalfa Hay, Cache County	2011	Grass Hay, Rich County	2006
Apples, Utah County	1994	Grass Hay, Daggett County	2007
Barley, Irrigated (feed) , Cache County	2011	Lawn Turf	2006
Beef Cattle		Machinery & Equipment Costs	2008
Background Feeder Cattle	2000	Manure & Waste Disposal, Dairy	1998
Feeder Cattle Backgrounding Budget	2009	Oat Hay, San Juan County	2003
Feeder Cattle Drylot Budget	2009	Oats, San Juan County	2003
Feeder Cattle Summer Grazing Budget	2009	Oats, irrigated, Uintah County	2011
Beef heifer replacement	1998	Onion Production	2005
Cow/calf	1997	Ostrich	1995
Cow/calf northern Utah	2004	Pasture, irrigated	1995
Cow/calf, southern Utah	2000	Pasture Establishment	1995
Cow/calf/yearling, Rich County	1996	Peaches, Box Elder County	1994
Cow/calf, Tooele & Duchesne Counties	2007	Pheasants	1995
Cull Cows	2006	Pumpkin	1997
Feeder cattle	2005	Raspberry	1996
Feeder steer calves	2003	Safflower, dryland	1999
Finish cattle	2000	Safflower, irrigated	2005
Berries		Sheep, range	1997
High Tunnel Fall Raspberry	2010	Lamb Feeding Budget	2009
Strawberry High Tunnel	2010	Soybean	1998
Bison, Cow/Calf, 50 Cows	2001	Swine, farrow to finish	1998
Canola, Spring irrigated	1996	Tomatoes	2003
Cantaloupe	2006	Triticale	1996
Cherries, Tart	1995	Turkeys, Hen	2000
Corn for grain, Box Elder County	2002	Watermelons	1996
Corn Silage, Cache County	2002	Wheat, dryland	2008
Corn, Sweet	1996	Wheat, Spring, irrigated	1994
CRP Contract, per acre	2001	Wheat, Irrigated, Cache County	2011
Custom Operators Rates	2010	Wheat Straw Residue	1997
Dairy		Wheat, Soft White Winter, Irrigated, Box Elder Co	2000
Holstein Heifer Replacement	2001		
Jersey Heifer Replacement	2000		

# 150 Acres of Alfalfa Hay, Cache County, 2011

Utah State University, Cooperative Extension

Applied Economics Department

	Total Units	Unit	Price/Cost Per Unit	Total Cost/Value	Total Cost/Value Per Acre	Your Farm
<b>GROSS INCOME</b>						
Alfalfa Hay	5.00	Tons	\$ 130.00	\$ 97,500.00	\$ 650.00	_____
<b>TOTAL GROSS INCOME</b>				\$ 97,500.00	\$ 650.00	
<b>OPERATING COSTS</b>						
Insecticide 1	50.00	Acre	\$ 9.00	\$ 1,350.00	\$ 9.00	_____
Herbicide 1	50.00	Acre	\$ 15.00	\$ 2,250.00	\$ 15.00	_____
Fertilizer 1	50.00	Acre	\$ 80.00	\$ 12,000.00	\$ 80.00	_____
Custom Chemical App	150.00	Acre	\$ 16.50	\$ 2,475.00	\$ 16.50	_____
Testing (Soil & Forage)	1.00	Annual	\$ 130.00	\$ 130.00	\$ 0.87	_____
Irrigation	1.00	Annual	\$ 7,200.00	\$ 7,200.00	\$ 48.00	_____
Labor	150.00	Acre	\$ 20.00	\$ 3,000.00	\$ 20.00	_____
Operator Labor	150.00	Acre	\$ 75.00	\$ 11,250.00	\$ 75.00	_____
Fuel & Lube	1.00	Annual	\$ 7,774.80	\$ 7,774.80	\$ 51.83	_____
Maintenance	1.00	Annual	\$ 8,280.80	\$ 8,280.80	\$ 55.21	_____
Miscellaneous	150.00	Acre	\$ 5.00	\$ 750.00	\$ 5.00	_____
<b>TOTAL OPERATING COSTS</b>				\$ 56,460.60	\$ 376.40	
<b>INCOME ABOVE OPERATING COSTS</b>				\$ 41,039.40	\$ 273.60	
<b>OWNERSHIP COSTS</b>						
<b>CASH OVERHEAD COSTS</b>						
Liability/Crop Insurance				\$ 1,140.00	\$ 7.60	_____
Accounting & Legal				\$ 1,140.00	\$ 7.60	_____
Office & Travel				\$ 1,140.00	\$ 7.60	_____
Annual Investment Insurance				\$ 1,139.38	\$ 7.60	_____
Annual Investment Taxes				\$ 418.55	\$ 2.79	_____
<b>TOTAL CASH OVERHEAD COSTS</b>				\$ 4,977.93	\$ 33.19	
<b>NONCASH OVERHEAD COSTS (Capital Recovery)</b>						
Buildings, Improvements, & Equipment				\$ 8,263.81	\$ 55.09	_____
Machinery & Vehicles				\$ 19,407.00	\$ 129.38	_____
<b>TOTAL NONCASH OVERHEAD COSTS</b>				\$ 27,670.81	\$ 184.47	
<b>TOTAL OWNERSHIP COSTS</b>				\$ 32,648.73	\$ 217.66	
<b>TOTAL COSTS</b>				\$ 89,109.33	\$ 594.06	
<b>NET PROJECTED RETURNS</b>				\$ 8,390.67	\$ 55.94	

# 80 Acres of Irrigated Barley (feed), Cache County, 2011

Utah State University, Cooperative Extension

Applied Economics Department

	Total Units	Unit	Price/Cost Per bu.	Total Cost/Value	Total Cost/Value Per Acre	Your Farm
<b>GROSS INCOME</b>						
Barley	100.00	Bushels	\$ 3.41	\$ 27,280.00	\$ 341.00	_____
<b>TOTAL GROSS INCOME</b>				\$ 27,280.00	\$ 341.00	
<b>OPERATING COSTS</b>						
Insecticide	80.00	Acre	\$ 3.00	\$ 240.00	\$ 3.00	_____
Herbicide 80.	00	Acre	\$ 6.75	\$ 540.00	\$ 6.75	_____
Fertilizer 80.	00	Acre	\$ 57.50	\$ 4,600.00	\$ 57.50	_____
Custom Chemical App	80.00	Acre	\$ 11.00	\$ 880.00	\$ 11.00	_____
Custom Combine	80.00	Acre	\$ 30.00	\$ 2,400.00	\$ 30.00	_____
Testing (Soil)	1.00	Annual	\$ 55.00	\$ 55.00	\$ 0.69	_____
Seed	80.00	Acre	\$ 24.00	\$ 1,920.00	\$ 24.00	_____
Irrigation	1.00	Annual 2,	\$ 560.00	\$ 2,560.00	\$ 32.00	_____
Labor	80.00	Acre	\$ 20.00	\$ 1,600.00	\$ 20.00	_____
Operator Labor	80.00	Acre	\$ 75.00	\$ 6,000.00	\$ 75.00	_____
Fuel & Lube	1.00	Annual	\$ 1,100.00	\$ 1,100.00	\$ 13.75	_____
Maintenance	1.00	Annual	\$ 1,501.50	\$ 1,501.50	\$ 18.77	_____
Miscellaneous	80.00	Acre	\$ 5.00	\$ 400.00	\$ 5.00	_____
<b>TOTAL OPERATING COSTS</b>				\$ 23,796.50	\$ 297.46	
<b>INCOME ABOVE OPERATING COSTS</b>				\$ 3,483.50	\$ 43.54	
<b>OWNERSHIP COSTS</b>						
<b>CASH OVERHEAD COSTS</b>						
Liability/Crop Insurance				\$ 600.00	\$ 7.50	_____
Accounting & Legal				\$ 600.00	\$ 7.50	_____
Office & Travel				\$ 600.00	\$ 7.50	_____
Annual Investment Insurance				\$ 271.06	\$ 3.39	_____
Annual Investment Taxes				\$ 104.50	\$ 1.31	_____
<b>TOTAL CASH OVERHEAD COSTS</b>				\$ 2,175.56	\$ 27.19	
<b>NONCASH OVERHEAD COSTS (Capital Recovery)</b>						
Buildings, Improvements, & Equipment				\$ 1,603.50	\$ 20.04	_____
Machinery & Vehicles				\$ 2,910.00	\$ 36.38	_____
<b>TOTAL NONCASH OVERHEAD COSTS</b>				\$ 4,513.50	\$ 56.42	
<b>TOTAL OWNERSHIP COSTS</b>				\$ 6,689.06	\$ 83.61	
<b>TOTAL COSTS</b>				\$ 30,485.56	\$ 381.07	
<b>NET PROJECTED RETURNS</b>				\$ (3,205.56)	\$ (40.07)	

# 80 Acres of Irrigated Wheat, Cache County, 2011.

## Utah State University, Cooperative Extension

### Applied Economics Department

	Total Units	Unit	Price/Cost Per bu.	Total Cost/Value	Total Cost/Value Per Acre	Your Farm
<b>GROSS INCOME</b>						
Wheat	75.00	Bushels	\$ 6.85	\$ 41,100.00	\$ 513.75	_____
<b>TOTAL GROSS INCOME</b>				<b>\$ 41,100.00</b>	<b>\$ 513.75</b>	
<b>OPERATING COSTS</b>						
Insecticide	80.00	Acre	\$ 3.00	\$ 240.00	\$ 3.00	_____
Herbicide 80.	00	Acre	\$ 6.75	\$ 540.00	\$ 6.75	_____
Fertilizer 80.	00	Acre	\$ 74.00	\$ 5,920.00	\$ 74.00	_____
Custom Chemical App	80.00	Acre	\$ 11.00	\$ 880.00	\$ 11.00	_____
Custom Combine	80.00	Acre	\$ 30.00	\$ 2,400.00	\$ 30.00	_____
Testing (Soil)	1.00	Annual	\$ 55.00	\$ 55.00	\$ 0.69	_____
Seed	80.00	Acre	\$ 24.00	\$ 1,920.00	\$ 24.00	_____
Irrigation	1.00	Annual 2,	\$ 560.00	\$ 2,560.00	\$ 32.00	_____
Labor	80.00	Acre	\$ 20.00	\$ 1,600.00	\$ 20.00	_____
Operator Labor	80.00	Acre	\$ 75.00	\$ 6,000.00	\$ 75.00	_____
Fuel & Lube	1.00	Annual	\$ 1,100.00	\$ 1,100.00	\$ 13.75	_____
Maintenance	1.00	Annual	\$ 1,501.50	\$ 1,501.50	\$ 18.77	_____
Miscellaneous	80.00	Acre	\$ 5.00	\$ 400.00	\$ 5.00	_____
<b>TOTAL OPERATING COSTS</b>				<b>\$ 25,116.50</b>	<b>\$ 313.96</b>	
<b>INCOME ABOVE OPERATING COSTS</b>				<b>\$ 15,983.50</b>	<b>\$ 199.79</b>	
<b>OWNERSHIP COSTS</b>						
<b>CASH OVERHEAD COSTS</b>						
Liability/Crop Insurance				\$ 600.00	\$ 7.50	_____
Accounting & Legal				\$ 600.00	\$ 7.50	_____
Office & Travel				\$ 600.00	\$ 7.50	_____
Annual Investment Insurance				\$ 271.06	\$ 3.39	_____
Annual Investment Taxes				\$ 104.50	\$ 1.31	_____
<b>TOTAL CASH OVERHEAD COSTS</b>				<b>\$ 2,175.56</b>	<b>\$ 27.19</b>	
<b>NONCASH OVERHEAD COSTS (Capital Recovery)</b>						
Buildings, Improvements, & Equipment				\$ 1,603.50	\$ 20.04	_____
Machinery & Vehicles				\$ 2,910.00	\$ 36.38	_____
<b>TOTAL NONCASH OVERHEAD COSTS</b>				<b>\$ 4,513.50</b>	<b>\$ 56.42</b>	
<b>TOTAL OWNERSHIP COSTS</b>				<b>\$ 6,689.06</b>	<b>\$ 83.61</b>	
<b>TOTAL COSTS</b>				<b>\$ 31,805.56</b>	<b>\$ 397.57</b>	
<b>NET PROJECTED RETURNS</b>				<b>\$ 9,294.44</b>	<b>\$ 116.18</b>	

# 100 Acres of Irrigated Oats, Uintah County, 2011.

## Utah State University, Cooperative Extension Applied Economics Department

	Total Units	Unit	Price/Cost Per Unit	Total Cost/Value	Total Cost/Value Per Acre	Your Farm
<b>GROSS INCOME</b>						
Oats	100.00	Bushels	\$ 2.53	\$ 25,300.00	\$ 253.00	_____
Straw	1.50	Ton	\$ 50.00	\$ 7,500.00	\$ 75.00	_____
<b>TOTAL GROSS INCOME</b>				<b>\$ 32,800.00</b>	<b>\$ 328.00</b>	
<b>OPERATING COSTS</b>						
Herbicide 100.	00	Acre	\$ 8.00	\$ 800.00	\$ 8.00	_____
Custom Spray Application	100.00	Acre	\$ 10.00	\$ 1,000.00	\$ 10.00	_____
Custom Combine	100.00	Acre	\$ 30.00	\$ 3,000.00	\$ 30.00	_____
Seed	100.00	Acre	\$ 20.00	\$ 2,000.00	\$ 20.00	_____
Irrigation	100.00	Acre	\$ 88.00	\$ 8,800.00	\$ 88.00	_____
Labor	100.00	Acre	\$ 58.00	\$ 5,800.00	\$ 58.00	_____
Fuel & Lube	1.00	Annual	\$ 1,936.00	\$ 1,936.00	\$ 19.36	_____
Maintenance	1.00	Annual	\$ 2,652.10	\$ 2,652.10	\$ 26.52	_____
Miscellaneous	100.00	Acre	\$ 5.00	\$ 500.00	\$ 5.00	_____
<b>TOTAL OPERATING COSTS</b>				<b>\$ 26,488.10</b>	<b>\$ 264.88</b>	
<b>INCOME ABOVE OPERATING COSTS</b>				<b>\$ 6,311.90</b>	<b>\$ 63.12</b>	
<b>OWNERSHIP COSTS</b>						
<b>CASH OVERHEAD COSTS</b>						
Liability/Crop Insurance				\$ 600.00	\$ 6.00	_____
Accounting & Legal				\$ 600.00	\$ 6.00	_____
Office & Travel				\$ 600.00	\$ 6.00	_____
Annual Investment Insurance				\$ 480.22	\$ 4.80	_____
Annual Investment Taxes				\$ 96.80	\$ 0.97	_____
<b>TOTAL CASH OVERHEAD COSTS</b>				<b>\$ 2,377.02</b>	<b>\$ 23.77</b>	
<b>NONCASH OVERHEAD COSTS (Capital Recovery)</b>						
Buildings, Improvements, & Equipment				\$ 2,500.80	\$ 25.01	_____
Machinery & Vehicles				\$ 4,686.00	\$ 46.86	_____
<b>TOTAL NONCASH OVERHEAD COSTS</b>				<b>\$ 7,186.80</b>	<b>\$ 71.87</b>	
<b>TOTAL OWNERSHIP COSTS</b>				<b>\$ 9,563.82</b>	<b>\$ 95.64</b>	
<b>TOTAL COSTS</b>				<b>\$ 36,051.92</b>	<b>\$ 360.52</b>	
<b>RETURNS TO LAND, LABOR AND MANAGEMENT</b>				<b>\$ (3,251.92)</b>	<b>\$ (32.52)</b>	

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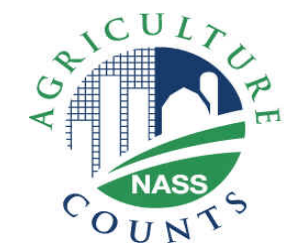
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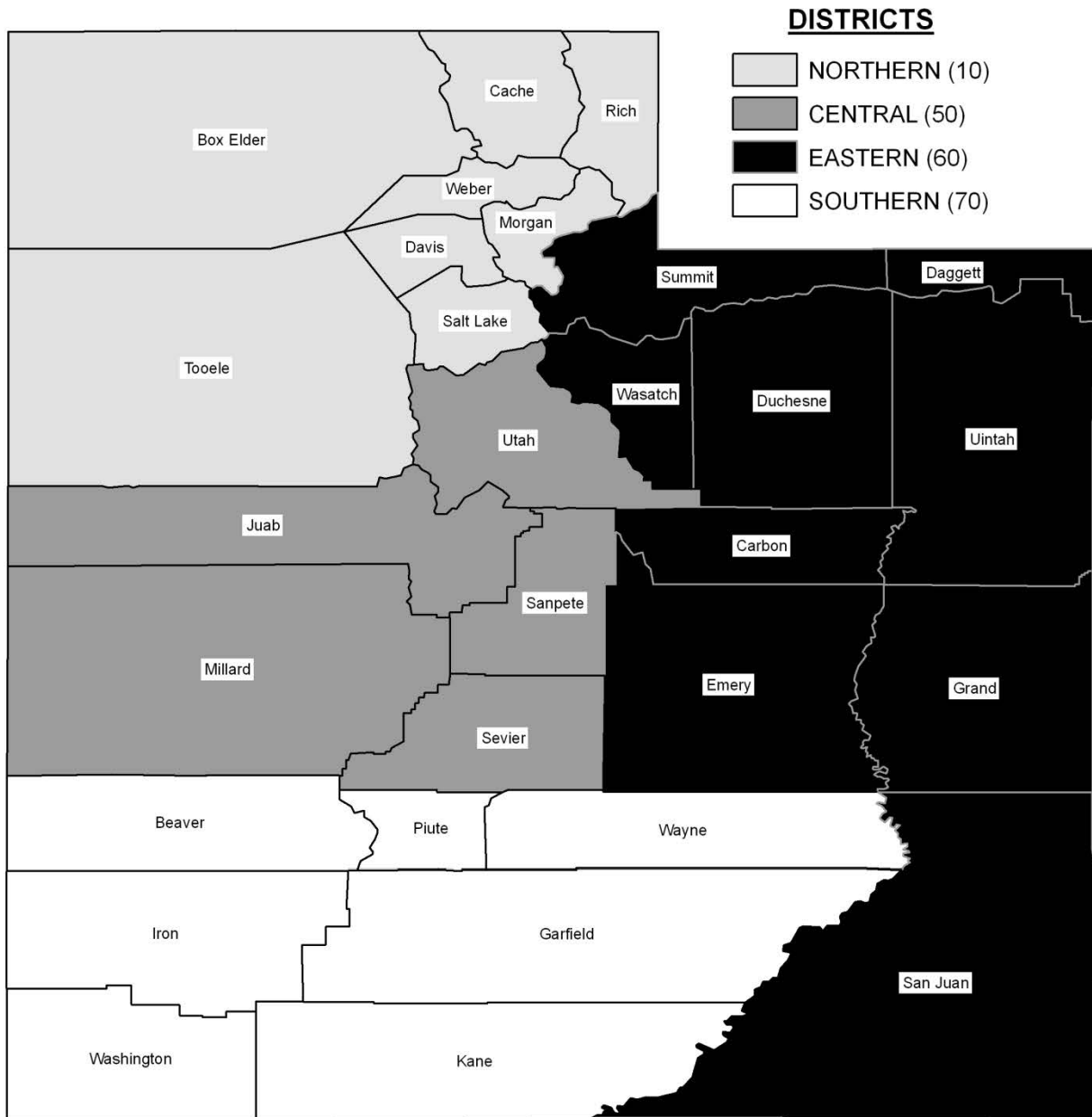
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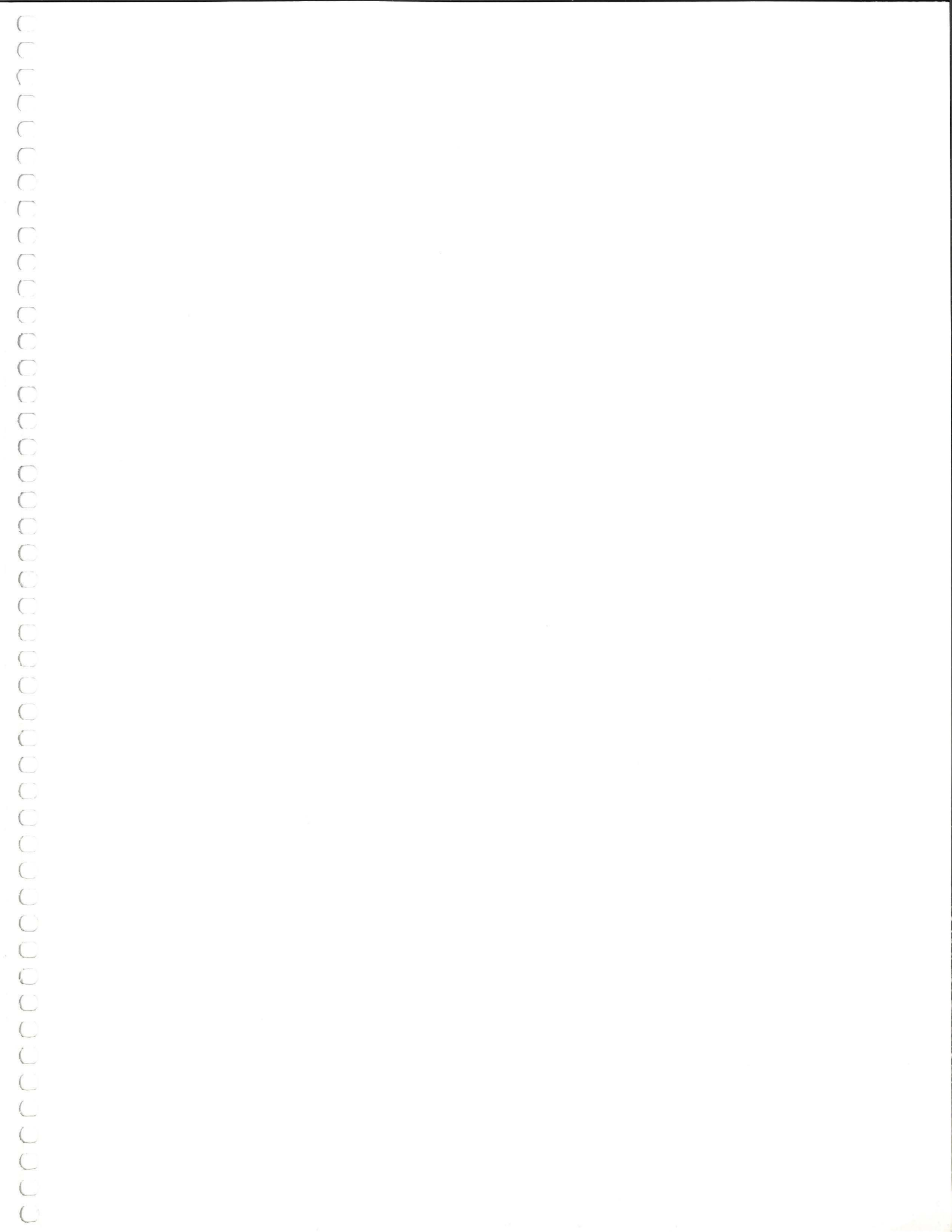
# UTAH COUNTIES AND DISTRICTS



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