# Boulder County Parks and Open Space Cropland Policy



Approved by the Boulder County Board of County Commissioners

January 12, 2012

Updated and Approved April 13, 2017

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# **Boulder County Parks & Open Space**

# Cropland Policy April 18, 2017

The Boulder County Parks & Open Space Cropland Policy outlines the policies and practices that guide and direct the management of cropland owned and managed by Boulder County Parks & Open Space.

The Cropland Policy was originally approved on January 5, 2012. The policies were then amended in April 13, 2017.

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Parks & Open Space Department • Boulder County

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# **Boulder County Cropland Policy Background**

#### **Boulder County Parks and Open Space Mission**

To conserve natural, cultural and agricultural resources and provide public uses that reflect sound resource management and community values

## 1. Boulder County Parks and Open Space

Geographically situated at the intersection of the Great Plains and the Rocky Mountains, Boulder County's boundaries encompass enormous diversity of land forms, natural resources and habitat. This rich, scenic and natural heritage forms the foundation for Boulder County's quality of life. The idea of the Parks and Open Space Department was initiated in the mid-1960s by citizens who were interested in preserving open space land in the face of rapid county development. Citizens have supported the county Parks and Open Space program, voting in favor of several sales tax ballot issues between 1993 and 2010.

Today Boulder County owns an interest in nearly 100,000 acres of land (63,696 ac in fee, 36,023 ac in Conservation Easements) divided roughly equally between the plains and mountains. Along with these lands, Boulder County owns water rights valued at \$70 million. Open space lands are governed by the Boulder County Comprehensive Plan, which outlines several purposes (emphasis added):

- Urban shaping between or around municipalities or community service areas
- Preservation of critical ecosystems, habitats and scenic vistas, outdoor recreation areas and trails
- Conservation of natural resources, including forest lands, range lands and agricultural lands
- Protection of designated areas of environmental concern

#### 2. Management Background

The Boulder County Comprehensive Plan provides the overarching vision and guiding policies for managing county open space lands. The Boulder County Comprehensive Plan addresses cropland policies in two sections: the Open Space Element and the Agriculture Element. Two pertinent examples:

#### Policy OS 2.03.03:

Management of individual open space lands, including those under agricultural leases, shall follow good stewardship practices and other techniques that protect and preserve natural and cultural resources.

#### Policy AG 1.02

The county shall foster and encourage varied activities and strategies which encourage a diverse and sustainable agricultural economy and utilization of agricultural resources.

In 2007, Boulder County Parks and Open Space staff started working on a series of policy documents to streamline decision-making and help translate the broad goals of the Boulder County Comprehensive Plan into practice. For staff within the organization, these policies serve as a reference for decision-

making and bridge the conceptual direction of the Comprehensive Plan and the detailed direction in property management plans. For the public and elected officials, the policies serve as a guide to the management philosophy within the organization.

#### Policies include:

- Forest Policy (2010)
- Conservation Easement Policy (2010)
- Water Policy (internal Draft 2008)
- Cropland Policy (2011, renewed 2017)
- Grasslands Policy (adoption anticipated by 2020)
- Cultural Resources Policy (adoption anticipated by 2020)
- Visitor Use Policy (adoption anticipated by 2020)
- Wildlife Policy (adoption anticipated by 2020)

#### Early Agriculture in Boulder County

Miners flocked to Boulder County after the discovery of gold in the foothills northwest of Boulder in 1859. But few who travelled across the Plains found the fortunes in gold that they came for. Many returned disillusioned to their families back East. Others saw opportunities to provide food, livestock feed and supplies for the mining camps.

Farming began in Boulder County with the harvesting of prairie grasses for the gold camps in 1859. Many of the first settlers filed homestead claims along the streams to assure their water supplies, while others understood the need to develop irrigation systems to move water onto land further from the creeks to make it more productive. While the first irrigation ditch was dug by Marinus Smith and William Pell in Boulder, the first water court approved ditch decree in the County is Lower Boulder Ditch with an appropriation date of October 1, 1859.

Many of the early farms provided fresh fruit, vegetables, flour, dairy products and meat for the local residents as well as produce and livestock hay for the mining camps west of Boulder. Living conditions on the plains were harsh and farming methods learned back East had to be adapted for our semi-arid climate.

During the 1860's, especially with the relocation of the remaining Indian populations to reservations, there was renewed interest in migration to the Colorado Territory. Coal was discovered in Marshall, new mineral discoveries in the mountains swelled their populations, toll roads were constructed into the mining camps, public schools were established, worship services were moved from homes to church buildings, newspapers were published and postal services were extended from Denver. Over the next decade railroad tracks were laid to extend commercial activity, new towns sprang up and the University of Colorado was established in Boulder. This renewed activity and population also increased the need for more agriculture products.

# 3. Cropland Management on Boulder County Open Space

Today, Boulder County Parks and Open Space oversees approximately 25,000 acres of agricultural land through the Parks and Open Space Agricultural Resources Division. About 15,100 acres are considered cropland. Cropland is defined as land used for irrigated crops, dryland crops, irrigated pastureland, and areas set aside for support facilities and some limited areas set aside for natural resource protection. The majority of the rest of the land managed by the Agricultural Resources Division is dry pastureland used for grazing.

Unlike other properties owned by the County, agricultural lands are managed through a partnership with farmers who pay to lease the land for agricultural production. Today, the county has 120 leases with 70 farmers and ranchers. With assistance from the Natural Resource Conservation Service (NRCS), these farmers and ranchers develop water and soil conservation plans for the property, County staff develop operating plans for each lease, and then County staff and the farmers/ranchers work together to ensure that infrastructure is up-to-date, water is being properly delivered and the property and the goals for the property are being met. The County invests the rental proceeds back into the agricultural lands, through the five-year Capital Improvement Project plan.

# 4. Purpose of the Cropland Policy

Boulder County manages cropland for the long-term. The purpose of the Cropland Policy is to link the goals of the Boulder County Comprehensive Plan with the operational activities of Boulder County Parks and Open Space staff.

#### **Cropland Policy Vision**

Boulder County Parks and Open Space's vision is to be a national leader in sustainable agriculture.

There are many definitions of sustainable agriculture, and most of them include three elements: economic, environmental and social

sustainability. Examples include the work of policy organizations such as the USDA National Institute for Food and Agriculture, the Leopold Center for Sustainable Agriculture and Sustainable Agriculture Research and Education.

The Cropland Policy sets forth the policies and practices that define sustainable agriculture on Boulder County open space lands.

#### **Soil and Water**

Soils: Boulder County soils are suited to many kinds of native grasses, shrubs, and other forage plants. Most soils tend toward the clayey end of soil texture, with some sandier areas. Boulder County producers need to implement soil management practices similar to other producers in notable crop production centers of the U.S.

Water: Understanding the intimate connection between land and water, Boulder County Parks and Open Space (BCPOS) has been vigilant in its acquisition not only of land, but also the water necessary to keep that land and associated ecosystems healthy and productive. The County's water portfolio is valued at over \$70 million and includes ownership in 61 incorporated ditches, 31 unincorporated ditches, 13 reservoirs and at least 57 directly held water rights.

Boulder County Parks and Open Space operators are required to work with the NRCS to develop soil and water conservation plans.

# Agriculture in Boulder County today (Quick Facts)

Boulder County, 2007 Census of

Agriculture:

No. of Farms: 746

Avg. Size of Farms: 185 ac

Top crops: Forage, Wheat, Corn for grain, Barley for grain, Corn for

silage

Market Value of Farm Products

sold: \$34,037,000

Avg. Market Value per Farm:

\$45,625

Federal Government Payments:

\$376,000

Avg. per farm receiving payments: \$4,525

\$4,525

Avg. age of principal operator: 59.4

years

Primary Occupation of Principal Operators: 39% Farming, 61% Other

# Boulder County Parks and Open Space:

Agricultural Land: 25,000 ac Cropland: 15,100 ac Types of operations: crop,

crop/livestock, livestock, market

farm

No. of leases: 120

No. of tenant farmers: 70

Lease revenues: \$1.1M - \$1.3M per

year

Budget: 74% of lease revenue goes toward crop share and water assessments; 17% goes toward operation and maintenance

# 5. Cropland Policy Process

The Cropland Policy was developed in several stages: internal scoping, public outreach, policy development and public review.

The first stage, internal scoping, began with a series of brainstorming sessions. These brainstorming sessions led to the development of a staff team including members of the Director's staff, the Agricultural Resources staff, Planning staff, Resource Management, and a representative from the Colorado State University Extension Service. This staff met regularly to manage the policy development process, work directly with advisory groups, and draft the proposed policy.

In May 2010 the public education phase of the process began with the Cropland Management Policy Open House. Over 100 interested residents of Boulder County attended this event at the Boulder County Fairgrounds. The purpose of the event was to reintroduce residents of the county to the Agricultural Resources Program, provide data regarding the program, and release a preliminary plan for the public outreach portion of the Cropland Management Policy.

Following on the heels of the Open House, staff organized Cropland Tours each month during the summer of 2010 and again in July and August of 2011. These tours took hundreds of county residents into the fields to talk to farmers and get a first-hand look at challenges and opportunities of farming in Boulder County. County staff created a virtual Harvest Tour online, allowing residents to learn what types of crops were being harvested and where the harvests might be taking place. The online tour also posted information about crops commonly grown in the county.

The 2010 public education phase of the outreach process continued in November with a Sustainable Agriculture Forum. This public forum brought together a small group of experts to discuss the subject of sustainable agricultural practices and policies in Boulder County. In February of 2011 the staff brought together local producers to discuss their work in the fields at the Farmer and Rancher Panel Discussion. These forums allowed stakeholders to understand the many different ways in which agriculture and farmers directly impact the lives of people who may never see wheat being harvested.

In 2011 the public process shifted to developing policies for managing croplands in the long-term. The Boulder County Commissioners appointed nine citizens to the Cropland Policy Advisory Group (CPAG) to develop policy recommendations.

The final stage of the Cropland Policy process was public review, with an informal open house and formal public hearings with the Food and

Agriculture Policy Council and the Parks and Open Space Advisory Committee. The final step was a public hearing before the Boulder County Commissioners who approved the Cropland Policy on December 20, 2011.

## 6. Cropland Policy Advisory Group

The nine members of the Commissioner-appointed Cropland Policy Advisory Group represented a variety of stakeholder perspectives, with three conventional farmers, two organic farmers, a representative from an organic dairy, and three at-large citizens. CPAG met approximately twice a month for nine months in 2011. The advisory group process was designed to encourage collaboration and consensus-building through discussion and deliberation. Where consensus was not possible, minority opinions are included in this report.

CPAG meetings were open to the public for observation; public comments were taken in written form and forwarded to CPAG for review; at the request of members of the public, a public input session was added to the CPAG schedule. All meetings were run by a professional facilitator from outside of Boulder County government, contracted to provide her services throughout this process and ensure a fair and balanced group process.

#### 7. Document Overview

The remainder of this document includes the policy, working documents, supporting materials, and public comment from throughout the process. Not every issue pertaining to day-to-day operation is covered specifically in this document. In many cases, some policies are expanded upon in other documents.

The Policy section of the document includes the policies developed by the Cropland Policy Advisory Group. The majority of policies reflect a consensus of the CPAG; where members of CPAG disagreed with a specific policy or felt more policies were needed, individual members submitted minority opinions, which are included in the policy document.

The appendices include a number of examples of working documents used by staff to carry out the policies described in the body of the Cropland Policy, supporting documentation submitted by members of CPAG, and public comments received during the process.

# **Boulder County Parks and Open Space Cropland Policy**

This document consists of the collected consensus proposals of the Cropland Policy Advisory Group and, where applicable, the minority opinions. In cases where consensus was not reached, the split within the Advisory Group is noted at the end of the policy.

#### 1. Administration

The Agricultural Resources Division manages thousands of acres of cropland and rangeland in cooperation with tenants who lease land from Boulder County. Boulder County supports agriculture in the county and preserves open space. Through this partnership the Agricultural Resources Program shall be administered in a manner that promotes sustainable agriculture and in alignment with community goals.

This Cropland Policy shall be periodically reviewed and revised, as needed, in response to new scientific developments, new farming tools and techniques, changes in the global and local economy, environment and the evolution of community goals for this publicly-owned land.

Sustainable agriculture is defined by a long term view and by farming practices that ensure that croplands can be farmed and crops produced in perpetuity without diminishing yield, quality of crop, or health and resource of the soils, by continually regenerating soil quality in balance with what is removed in food and fiber.

Sustainable agriculture provides a livable financial base for the farmer and both serves and receives support from the local economy in which it operates.

- 1.1. Most leases shall be bid competitively and the selection criteria shall be publicly available. In some cases properties are not competitively bid in order to respect a specific purchase agreement, or to recognize the efficiencies gained by combining adjacent parcels for improved land management including irrigation management.
- 1.2. Leases are negotiated based on a standard form at market rates, but reflect conditions at each property, the type of operation proposed, and the goals of sustainable agriculture as stated in the Cropland Policy.
- 1.3. Parks and Open Space uses both cash rent and crop share methods to tailor leases to the character of the land and the type of operation.
- 1.4. Leases are awarded to farmers who employ sustainable practices and who demonstrate a commitment to investing in innovative practices through education and skills development. (Appendix 3: Bid Process)

- 1.5. Boulder County recognizes the importance of developing farmers interested in many different forms of farming. Boulder County shall continue to support beginning farmers through youth in agriculture programs, working with Boulder County Extension, and providing competitive lease rates. Boulder County shall develop programs to foster the development of beginning farmers on Boulder County Open Space.
- 1.6. Revenue obtained through the lease of agriculturally designated land should first be used to fund the Agricultural Resources Program and the capital and maintenance activities of the Program.
- 1.7. Lessees seeking USDA organic certification shall receive a 50% reduction in rent during the three-year transition period.
- 1.8. Boulder County shall prioritize opportunities for organic operations on POS land and continue expansion of certified organic agriculture on Open Space land with the goal of maintaining a growth rate in acres leased for organic agriculture that meets or exceeds the national growth rate of organic acres in each year, with the goal of reaching or exceeding 20% of cropland certified organic or in transition by 2020, if market forces allow. Boulder County will work with producers, the natural foods industry, and other stakeholders to explore and expand market opportunities.
- 1.9. Staff shall develop methods for creating public awareness of the role of public open space in crop and local food production. (Appendix 4: Education and Outreach)
- 1.10. Boulder County will prioritize the expansion of food crops on Open Space land for local markets.
- 1.11. Standard operating procedures shall be developed to protect cultural resources on cropland.
- 1.12. Structures, facilities, and special uses for agricultural properties may be allowed, but must first be approved by POS, allowed under County Land Use Code, and not remove cropland from productive use. Such structures, facilities, and uses shall be of a scale such that they do not impact the predominate nature of Open Space as open land. POS approval shall consider neighborhood compatibility and other potential impacts.
- 1.13. Boulder County shall adopt a Good Neighbor Policy. All agricultural tenants shall be provided, and comply with, the expectations of the Good Neighbor Policy.
- 1.14. Boulder County Parks and Open Space shall establish the Good Neighbor Policy to assist farmers of Open Space properties in resolving conflicts arising from common practices and practices specific to a lessee's operations. Boulder County shall provide a venue for sharing

information on the standards and policies for farming on Open Space and provide a method and venue for mediating disputes arising out of the interaction among farms and with residential areas. A draft Good Neighbor Policy as discussed and approved by the Cropland Policy Advisory Group can be found in the Appendix 5: Boulder County POS Good Neighbor Policy.

- 1.15. Lease applications and lease consideration shall be available to individuals, non-profits, or community groups who wish to lease an agricultural parcel for the purpose of rebuilding soil and ecosystem health of the parcel, transitioning the parcel to organic certification and production, or farming the parcel for public and community benefit.
- 1.16. Boulder County Parks and Open Space supports farmer succession planning. Boulder County considers succession plans as one of many factors evaluated in the lease bid process.
- 1.17. Food safety regulations for producers on Boulder County cropland are enforced through governmental entities, which include but are not limited to: Boulder County Health Department, Colorado Department of Public Health and the Environment, and Federal regulators. Farmers must abide by these regulations.

#### 2. Market, Small, and Specialty Crop Farms

Boulder County Parks and Open Space can play an important role in developing alternative markets and diversifying the agricultural economy in Boulder County. The small and market farm programs are designed to provide a stepping stone to economic sustainability and contribute to the availability of local food.

- 2.1. Boulder County shall administer a program to support and encourage small acreage farms on Boulder County Parks and Open Space land.
- 2.2. Boulder County shall develop and maintain a Growers' Association program to help beginning farmers to develop skills and practices while sharing land management responsibilities with other farmers.
- 2.3. Boulder County supports the development of direct-to-market operations such as on-site sales and shall consider facilities and structures, subject to land use code, necessary for such operations as described in the Administrative Section of the Cropland Policy.
- 2.4. Boulder County shall work collaboratively with farmers' markets and other marketing opportunities to support the use of open space products in providing local foods.
- 2.5. Boulder County shall work with County Extension and other organizations to foster communication and coordination among growers to proactively address co-existence issues such as cross-pollination and chemical trespass.

#### 3. Water

Boulder County owns and manages a significant portfolio of water resources for environmental and agricultural purposes. The water resources managed by Parks and Open Space allow farmers to successfully produce crops on our Cropland. Parks and Open Space must continue to manage water such that farmers can have access to the water they need to succeed.

Water is a precious resource for agriculture in Boulder County and throughout the arid west. Yearly fluctuations in precipitation and the seasonality of that precipitation make managing water a key to any successful agricultural resources program. Boulder County addresses this issue in two important ways. First, the staff works with farmers to ensure that water is delivered and used in the most efficient manner. Boulder County works with farmers to install more efficient watering systems such as pivot irrigators, and when possible, drip irrigation systems. Second, as a major holder and user of water in the county, Boulder County is on the board of or an active participant in, most ditch companies within Boulder County.

The Water Policy is a separate document covering the full range of water management issues. It will be presented to the public in 2012 for review and comment. The policies below relate to agriculture and are cross-referenced to the Water Policy where applicable.

- 3.1. Boulder County shall maximize the beneficial application and use of water by analyzing available water resources, agricultural properties, and diversity of crops. Fully use county-owned water to avoid potential abandonment.
- 3.2. (Water Policy 1a.ivi.) [Boulder County shall] Use supplemental water shares, primarily Colorado Big Thompson water, where it can provide the most benefit and when possible, purchase all water rights, including supplemental water, in new acquisitions.
- 3.3. (Water Policy 1e.i.) [Boulder County shall] Work with policy makers to advocate that water law continues to support agricultural uses.
- 3.4. (Water Policy 1h.) [Boulder County shall] Explore and implement rainwater storage devices where legally possible.
- 3.5. (Water Policy 1i.) [Boulder County shall] Continue to purchase additional water rights if funds are available and if they can be beneficially used.
- 3.6. (Water Policy 1I.) [Boulder County shall] Monitor water supply and delivery in both the short and long term, to measure the impact of climate change. Alter practices and planning as appropriate to reflect anticipated climate impact changes.
- 3.7. (Water Policy 2a.iv.) [Boulder County shall] Advocate for maintaining Ditch Company by-laws that support continued agricultural use of water.
- 3.8. (Water Policy 2e.) Boulder County shall work collaboratively with other agencies to protect the quality of irrigation waters

- 3.9. (Water Policy 3e.) Boulder County shall research the potential impacts of climate change on riparian habitats along water delivery systems. Develop practices that maintain riparian ecosystem health under future conditions.
- 3.10. (Water Policy 4g.) Boulder County shall evaluate all storage proposals and support those that benefit the Department's agricultural or conservation programs and that are suitable environmentally.
- 3.11. (Water Policy 7a.iv.) Boulder County shall use Best Management Practices to protect water quality and reduce soil erosion.

#### 4. Soil Health and Quality

The long-term health of agricultural soils is a major determining factor in how successful Boulder County will be in creating a sustainable agricultural system on its cropland. Sustainability as it relates to soil health and quality requires affirmative efforts to protect the resource base of cropland so that it shall be productive in the future. Indicators of soil health and quality include, but are not limited to: percent of organic matter, soil salts, pesticide residue, and the degree of soil erosion. Soil health policies address these dimensions of soil health and quality. The policies below are cross-referenced to the Water Policy where applicable.

- 4.1. Tenants shall operate in accordance with Soil and Water Conservation Plans approved by the Natural Resources Conservation Service.
- 4.2. Tenants shall operate in accordance with operating plans developed in collaboration with Parks and Open Space.
- 4.3. Boulder County shall maintain relationships with partner agencies, organizations, and consultants that provide guidance to farmers; provide access to these agencies, organizations, and consultants; and encourage farmers to seek innovative solutions to sustainable practice and soil healthy/quality issues.
- 4.4. (Water Policy 2e.) Boulder County shall work collaboratively with other agencies to protect the quality of irrigation waters entering and leaving Boulder County properties.
- 4.5. (Water Policy 7 b.) Boulder County shall meet or exceed local, state, and federal water laws and regulations.
- 4.6. (Water Policy 7b.iii.) Boulder County shall be informed of, identify, summarize, and comply with relevant water quality regulations and laws pertaining to Boulder County activities.

- 4.7. Boulder County shall require best management practices with respect to soil health and quality (Appendix 6: Soil Health and Quality). These practices may include but are not limited to:
  - Conservation tillage
  - Soil amendments
  - Cover crops
  - Residue management
  - Crop Rotation
  - Rotational Grazing
- 4.8. Boulder County shall implement monitoring regimes to ensure that practices and policies are stabilizing and improving soil health and quality.
- 4.9 Boulder County shall encourage experimental farming practices and adoption of these practices where and when appropriate. Boulder County shall collect and disseminate data on experimentation. Such lands shall be administered as a part of a lease to an existing farmer tenant or as a special lease for the purpose of RD&D and may include crop sharing or flat rentals as with other leases, or incentive leases to stimulate RD&D. BCPOS shall be a repository of all such RD&D reports and shall make the reports and raw data readily available two years after the completion of the project.
- 4.10 Boulder County gathers and maintains, and makes available if requested data concerning the key indicators of soil health.

## **5. Economic Viability**

Economic viability requires attracting high quality agricultural operators and providing an environment that supports their long term economic survival. Boulder County develops and follows clear practices and guidelines that allow agricultural operations to flourish.

- 5.1. Boulder County supports self-sufficient and economically viable agricultural operations and recognizes they are essential to the overall viability of the agricultural program.
- 5.2. Boulder County shall promote and encourage diversity in cropping systems, crops, and practices, to balance risks associated with factors beyond farmers' control, such as weather events, price fluctuations, federal price supports, etc.
- 5.3. Boulder County supports operators willing to explore and adopt new farming practices and new markets that embody the Department's and the community's long term goals while also practicing sound management.
- 5.4. Boulder County shall work with local and regional economic development, business and community organizations to integrate agricultural economic development into overall community and economic development strategies and to promote strategies to strengthen

- and expand existing farm and agri-businesses and attract activities complementary to agriculture to Boulder County.
- 5.5. Boulder County works with farmers, resource providers, local businesses, and organizations to encourage development of necessary infrastructure and relationships to support existing markets and explore new markets.
- 5.6. Boulder County works with a variety of organizations including CSU Extension to support educational programs that promote farming as a career, enrich farming practices, and encourage engagement with farmers.
- 5.7. Boulder County maintains current infrastructure and invests strategically in capital improvement projects to attract a larger pool of agricultural producers.
- 5.8. Boulder County supports creating lease terms that encourage tenant investment in infrastructure to enhance productivity.
- 5.9. Boulder County reviews economic viability of agricultural operations on Boulder County Parks and Open Space land. The Agricultural Resources Division shall work with farmers to improve productivity when and where possible.

#### 6. Agricultural Inputs

Agriculture has an impact on the air, land, and water. Sustainable agriculture includes efforts to reduce extractive and destructive processes. Different types of agriculture use different techniques for maintaining a balance of practices to sustain the air, land, and water. The policies below attempt to address these different techniques while making it clear that Boulder County Parks and Open Space is committed to sustainable agriculture.

#### 6.1. **Genetically Engineered Crops**

Crops have been selectively bred and manipulated for thousands of years. With the advent of new technologies, corporations and universities are using advanced techniques for inserting and altering genetic codes to create commercially viable plants that address continued issues in agriculture such as pest control and drought tolerance. Controversies have sprung up around the techniques, practices, and consequences of this technology. However, commercially available seeds and treatments are reviewed, tested, and approved by the Environmental Protection Agency, the U.S. Department of Agriculture, and the Food and Drug Administration.

Boulder County Parks and Open Space believes that sustainable agriculture for Boulder County must be founded upon the idea of long term viability.

In light of ongoing controversy over the public health, environmental, and socio-economic impacts of genetically engineered (GE) crops, Boulder County will, in general, only allow the planting of GE crops on County Open Space cropland when the likely, demonstrable benefits from the planting of a federally-approved GE crop will surpass the known and potential risks associated with adoption of the GE technology.

Boulder County shall consider the following potential impacts of a GE crop, as well as specific trait claims, in making its determination regarding whether the expected benefits exceed the costs and credibly verified scientifically-documented risks associated with planting the GE crop. Proposals shall be evaluated based on the applicable criteria that best relate to the specific trait claim made by the manufacturer. Decisions shall be made by the BOCC with input from POS staff and consultation with appropriate representatives from the University of Colorado (CU), Colorado State University (CSU), CSU Extension, tenant representatives, and other agricultural organizations and stakeholders.

- 6.1.1. Integrated Pest Management and Resistance Management: The GE technology shall be compatible with the core principles of Integrated Pest Management, which include an emphasis on pest prevention, diversification in the tools used to control pests, avoiding excessive reliance on any single tool, and attacking pests at their most vulnerable points in their lifecycle.
- 6.1.2. **Pesticide Resistance:** The GE cultivar shall allow farmers to significantly reduce the impacts of pesticides on non-target organisms and people, water and soil quality, or biodiversity either through a shift to reduced-risk pesticides or a reduction in pesticide use on a per acre basis (or both).
- 6.1.3. **Conservation:** The GE technology shall be compatible with core principles of Best Management Practices promoting soil conservation, water quality, and water conservation.
- 6.1.4. **Yield and Quality Management:** The GE technology shall substantially increase crop yield or crop quality, and/or profitability compared to best available genetics and production systems for the area.
- 6.1.5. **Human Nutrition:** The novel traits in the GE crop shall substantially enhance the nutritional quality and content of the harvested crop, so that any finished product containing the crop or ingredient qualify for FDA labeling requirements of "High," "Rich in," or "Provides." (Current FDA regulations specify 20% or more.)
- 6.1.6. **Allergens and Toxicity:** The engineered crop shall substantially reduce the levels of known or expected human allergens or toxins, and the label associated with the crop, or foods containing the crop, identify the allergen whose levels have been reduced, the degree of reduction, and state that the crop was genetically engineered.

Approval of any GE crop shall be granted for five years at a time. For all GE crops approved for use, Boulder County shall develop a monitoring system in cooperation with farmers, CSU, and other partner agencies to determine whether the GE technology is consistently delivering the anticipated and claimed benefits and whether any unanticipated adverse impacts have occurred.

In 2016, five years following the approval of the 2011 Cropland Policy and several GE crop traits, the county held a series of public meetings concerning the continued use of genetically engineered crops on

county-owned open space. During the process, the Board of County Commissioners expressed concerns about the long-term viability and sustainability of GE cropping systems designed to incorporate or rely on pesticide use. Citing broad environmental and food system impacts related to the pesticides required by GE crops, as well as policy concerns about the GE agricultural system, the BOCC voted to phase-out their use, as well as neonicotinoid pesticides, on open space within five years at a November 30, 2016 public meeting. However, the BOCC did acknowledge that some potential GE traits that do not contain a reliance on pesticides, such as drought resistance, could be considered in the future per the GE crop approval process in Section 6.1 of the Cropland Policy. During this five year period (2017-2021), the use of GE corn and sugar beet crops and neonicotinoids on open space will be governed by the Transition Policy that was approved at the November meeting. The approved Transition Policy is incorporated in this Cropland Policy as Appendix 13. During the transition period, farming operations with GE crops will continue to comply with the Gene Flow, Notification, and Resistance Management protocols established in the original policy below.

Any approval of genetically engineered crops or organisms on Boulder County Open Space land must address gene flow, notification, and resistance management. Genetically engineered crops must be approved for use by the Federal government and shall not be approved for planting on Open Space land for a minimum of three years after approval for use by the Federal government. This will allow experts and policy-makers to assess possible impacts.

Gene Flow: Protocols surrounding gene flow are instituted in order to minimize opportunities for the intermingling of GE and non-GE genetics. Procedures will vary based on how the organism under consideration reproduces. Common practices with respect to plants currently approved by the USDA include removing bolts and planting non-GE buffers. If the Department approves a particular genetically engineered organism for Open Space properties, protocols for minimizing gene flow must be included.

**Notification** is currently part of the protocols for genetically engineered corn planted on Open Space. As with gene flow, protocols for proposed genetically engineered organisms will vary. Notification protocols shall protect neighbors from the possibility of gene flow and encourage communication to help with resistance management.

Resistance management addresses concerns regarding the development of pests resistant to pesticides. Resistance can be managed in a number of ways and protocols may call for additional resistance management techniques. To prevent development of weed resistance to glyphosate, BCPOS growers are required to rotate to a non-Roundup Ready cropping system in the year following a Roundup Ready crop. If this is not possible and Roundup Ready cropping is done in two consecutive years then a field must stay out of Roundup Ready cropping system for two years before returning to a Roundup Ready crop.

Resistance management protocols will also be required for Bt corn. Boulder County reserves the right to require best management practices as indicated by Bt resistance management studies.

#### 6.2. Pest Management

Managing pests whether animal, plant, fungus, or other is a constant battle for farmers in Boulder County. Tools for managing pests vary by farmer, crop, and area. However, clear state and federal guidelines dictate application practices and precautions. Boulder County reserves the right to impose additional protocols to protect farmers, neighbors, plants, and/or animals.

- 6.2.1. Sustainable pest management is recognized as an integral part of agriculture operations. Boulder County supports the safe and controlled management of pests on Boulder County Property to protect the environment, neighbors and users.
- 6.2.2. Boulder County shall manage pests through a Strategic Integrated Pest Management Program that protects the environment, neighbors, and users (Appendix 7: Strategic Integrated Pest Management and Appendix 9: Pesticide Application Protocols).
- 6.2.3. Boulder County Ag tenants shall use any legal method for pest control allowed under State and Federal Law and in compliance with Boulder County's Strategic IPM Guidelines and Cropland Policy. Boulder County Parks and Open Space reserves the right to restrict specific pesticides and/or application practices. Boulder County Ag tenants shall reduce pesticide usage over time with the goal of minimizing the use, volume, and toxicity of these pesticides.
- 6.2.4. Any pesticide application on Open Space Agricultural Lands shall be completed in compliance with the Agricultural Division's application protocols.
- 6.2.5. Signage shall be posted on any fee-owned county properties along trails where pesticide spraying will take place adjacent to trails. Signage will be posted prior to pesticide spraying. The signage will include the spray date (or range of dates), type of pesticide being sprayed, and trail closures if necessary.
- 6.2.6. Boulder County recognizes that in addition to offering sustainability, pest management with several integrated tactics often results in better environmental stewardship. All tenants shall be strongly encouraged to coordinate multiple complementary approaches of pest management to avoid excessive reliance on a single tactic, practice, genetic trait, or pesticide thus extending the length of time over which practices are effective.
- 6.2.7. Boulder County shall implement monitoring and reporting regimes to evaluate pesticide usage on Open Space Agricultural properties with the goal of reducing pesticide use, volume, and toxicity.
- 6.2.8. Boulder County shall work collaboratively with producers, technical advisors, and researchers to determine the best and most effective tools for managing pests on Open Space Agricultural properties.
- 6.2.9. Agricultural tenants shall be provided, and comply, with clear expectations of Strategic Integrated Pest Management goals.

#### 6.3. Soil Fertility and Amendments

Soil fertility is integral to sustainable agriculture. Boulder County supports efforts to maintain and improve soil fertility.

- 6.3.1. Maintain relationships with partner agencies, organizations, and consultants that provide guidance to farmers. Provide access to these agencies, organizations, and consultants; and encourage farmers to seek innovative solutions to sustainable practice and soil fertility issues.
- 6.3.2. Boulder County encourages farmers to implement practices that improve and/or maintain fertility over the long term while maintaining economic and environmental goals.
- 6.3.3. Boulder County shall implement monitoring regimes to ensure that practices and policies are stabilizing and improving soil fertility.
- 6.3.4. Boulder County shall assure compliance with all Federal, State, and local health department requirements, as well as implement all Parks and Open Space requirements for the use of biosolids on Boulder County lands. (Appendix 8: Biosolids Standard Operating Procedures)

## 7. Livestock Management

Livestock of many different types have been an important component of agriculture in Boulder County for years. Livestock operations differ significantly from other cropland practices and many of their actions will be governed by the Grassland Management Policy, scheduled to be created and adopted in 2012.

- 7.1. Livestock operations are permitted on properties suitable for livestock.
- 7.2. Livestock operations shall be encouraged as a management tool when and where appropriate and employed as a valuable management or rotational use for rebuilding soil health.
- 7.3. Animal Feeding Operations (AFOs) are permitted on Parks and Open Space property on agricultural properties only with specific permission.
- 7.4. Animal Feeding Operations (AFOs) shall be sited according to federal, state and, county laws, in appropriate areas with consideration given for appropriate buffers for natural resources and neighbors.
- 7.5. AFOs shall employ BMPs for manure management to maximize the use and preservation of manure nutrients in local crop production and shall minimize the release of environmental air and water emissions.

- 7.6. Boulder County Parks and Open Space shall develop educational material demonstrating the value and importance of livestock and grazing for the agricultural economy of Boulder County and as a cropland management tool.
- 7.7. Lands for forage production shall be maintained within the Parks and Open Space system to support the livestock industry in Boulder County.
- 7.8. Parks and Open Space shall collaborate with others to develop infrastructure to support expanded livestock operations in Boulder County.

#### 8. Recreation on Cropland

Passive recreation is part of the mission of Boulder County Parks and Open Space. While cropland is protected for agricultural uses, recreation opportunities may be part of sustainable agriculture in Boulder County.

- 8.1. Trails shall be developed on agricultural land only with appropriate considerations for agricultural value. Trails shall be:
  - Designed to minimize loss of cropland, irrigation interference, and impact on agricultural operations.
  - Sited to reduce the possibility of weed transfer to ditches or fields.
  - Closed to the public if/when pesticide application is in progress.

## 9. Natural Resources on Cropland

Natural resource protection is part of the mission of Boulder County Parks and Open Space. Sustainable agricultural practices include protecting natural resource systems.

- 9.1. Boulder County and its agricultural tenants shall abide by all federal and state laws governing wetlands\_wildlife, and plant species.
- 9.2. The County Comprehensive Plan Critical Wildlife habitats shall be considered a priority for protection when leases and agricultural operating plans are developed.
- 9.3. For any wildlife designated as State Threatened or Species of County or State Concern, POS staff shall work with tenants to develop best management practices and site specific plans to manage them. (Appendix 10: Wildlife Best Management Practices)
- 9.4. If a new occurrence of a protected species occurs on POS land, no additional disturbance within the recommended US Fish and Wildlife Service (USFWS) or Colorado Department of Parks and Wildlife (CDPW) buffer shall occur. Existing operations can continue except where prohibited by these agencies.
- 9.5. At the beginning or at the renewal of a lease, lease terms may be modified to protect natural resources. If during a lease term, measures, approved by Boulder County, to protect a natural

- resource impact the terms of the lease, Boulder County shall compensate for the losses at the tenants share of an average crop insurance claim.
- 9.6. All cropland shall be defined as a No Prairie Dog Area as outlined in section 6.3 of the Prairie Dog Element of the Grassland Management Policy.
- 9.7. Priority shall be given to discouraging prairie dogs from occupying cropland. Prairie dogs will be managed in accordance with Section 8.2 and 8.3 of the Prairie Dog Element of the Grassland Management Plan.
- 9.8. After training and with approval from Parks and Open Space, lease-holders may perform management of prairie dogs on their leased cropland through a system developed by BCPOS by July 1, 2012.
- 9.9. To the extent possible, Boulder County POS shall preserve wildlife corridors through agricultural land:
  - 9.9.1. Highest priority corridors to preserve are natural streams POS shall develop BMPs and appropriate, site specific, buffers to protect these areas. (Appendix 11: Riparian and Wetland Best Management Practices)
  - 9.9.2. Ditches often serve as corridors and to the extent possible, these riparian-like habitats shall be maintained.
- 9.10. Boulder County shall preserve wetlands and Comprehensive Plan designated Critical Wildlife Habitat by developing site specific best management practices and buffers to protect these areas.
- 9.11. Where feasible, Boulder County shall enhance wildlife habitat on agricultural properties (drainages, grassed waterways, corners of pivot systems, and non-productive land).
- 9.12. Pollinators, especially bees, are vital to agriculture in Boulder County. Maintaining healthy pollinator populations requires cooperation between farmers, ranchers, bee keepers, and the county. The county shall provide opportunities for dialogue and cooperation between all parties. In the event that any pesticides or practices are linked with Colony Collapse Disorder, Boulder County will work with all involved to eliminate the impact possibly including a ban on a practice or pesticide.

# **Appendices**

## **Appendix 1: Cropland Policy Advisory Group Minority Reports**

The reports in this section were submitted by members of CPAG who did not vote with the majority of members on the policies noted. These alternative policies were included in the documents provided to all advisory groups and the Commissioners for approval. Additional Minority reports that did not correspond to particular policies can be found in Appendix 11.

#### **Minority Report on Policy 4.9:**

BCPOS shall make available appropriate lands from the croplands owned by the county for the purpose of conducting research, development and demonstration (RD&D) of innovative sustainable agricultural practices, including such things as evaluating new high value crops which can support and create local consumption or processing inputs to other local industries, perennial crops such as grains, fruits, vegetables, herbs and fibers, methods for reducing greenhouse gas emissions, methods to rejuvenate and build soil health and productivity, plant selection and animal husbandry by traditional non-GE methods, practices and methods to minimize nonrenewable energy in agriculture, long term comparative field trials of comparing different modes of crop production such as organic and mainstream methods, local non-GMO seed production, methods to better capture and utilize valuable plant nutrients, and other innovative concepts which can potentially benefit local economy, the local food supplies, and simultaneously protect and improve the environment, and the health and well-being of Boulder County citizens.

All such RD&D shall be fully open for free access and application by everyone, no secrecy or licensing shall be allowed. Technologies may be freely used by the developers but without exclusivity. BCPOS will routinely disseminate the full results of all such RD&D conducted on its lands, shall hold annual reviews workshops or conferences, and use other appropriate means to release the knowledge gained. BCPOS shall be a repository of all such RD&D reports and shall make the reports readily available to all parties. Tenant farmers on BCPOS lands shall also be encouraged to host such RD&D on existing leased lands with the proviso that all such research shall be free and open and be submitted to BCPOS for dissemination.

BCPOS shall solicit proposals for such sustainable agriculture RD&D on an annual basis, or appropriate schedule based upon the available stock of land, with a goal of providing up to 5% of croplands for this purpose. Such lands shall be administered as a special lease for the purpose of RD&D and may include crop sharing or flat rentals as with other leases, or incentive leases to stimulate RD&D, or other methods found to be appropriate.

#### **Minority Report on Policy 6.1:**

1. No crops {or animals} grown on Boulder County Parks and Open Space (BCPOS) lands can be genetically modified as defined by the USDA. This requirement shall go into effect for the calendar

year 2012. Prior approvals for genetically modified corn crops shall be rescinded, effective for crop year 2012.

- 2. Boulder County shall establish goals and implementation programs for 10% of its croplands to be operated using organic production methods by 2015, 20% of its croplands to be operated using organic methods by 2020, and 50% of its croplands to be operated using organic production methods by the year 2025. Goals to transition to organic production shall be re-evaluated by BCPOS every five years to consider potential acceleration of transitioning to sustainable organic production.
- 3. Boulder County Parks and Open Space shall declare all open space agriculture lands as non-GMO refuge areas. In order to provide tenant farmers with non-GMO options in their seed supplies, the BCPOS shall make available croplands for and encourage farming operations for the production of non-GMO seed, including such crops as sugar beets, corn, alfalfa, barley, wheat and other crops that are supply threatened by monopoly seed company practices. BCPOS shall establish and enforce genetic isolation measures to ensure the integrity of such non-GMO seed production activities, organic farming activities and its non-GMO refuge. GMO producers within insect pollinator, wind, water or other vector isolation buffers of open space lands shall be required to give prior notice to BCPOS and its tenant farmers, and shall take all necessary measure to prevent contamination of any non-GMO seed production and organic farming operations on BCPOS lands.

#### **Minority Report on Policy 6.2.3**

- 1. Boulder County Parks and Open Space lands should ban the use of all pesticides containing glyphosate herbicides on its lands, including croplands, rangelands and other locations. A prompt phase out program of no more than one year duration should be implemented.
- 2. Boulder County Parks and Open Space lands should ban the use of all neonicotinoid pesticides on its lands, croplands, rangelands and other locations.

# **Appendix 2: Sample Lease**

#### **SAMPLE LEASE AGREEMENT**

made to be effective as of the 1st day of ** January, 200, between the County of Boulder, a			
body corporate and politic, hereinafter referred to as "Landlord" or "County", and whose address is			
, whose address is, hereinafter referred to as "Tenant".			
In consideration of the mutual covenants contained herein and other valuable consideration, the parties hereto agree as follows.			
1. LEASE OF PREMISES			
The Landlord and Tenant hereby agree to enter into a lease for approximately acres of land known as the Open Space, Boulder County, Colorado, hereinafter referred to as the "Leased Premises", legally described in Exhibit A, and as shown or the map attached hereto as Exhibit B, which exhibits are made a part hereof by this reference.  **Included in the Leased Premises are the following structures, facilities and equipment as identified on Exhibit B;  ** center pivot irrigation system,			
2. TERM			
The term of this Lease shall commence on			
**USE THIS PARAGRAPH IF THERE IS A POSSIBILITY THAT THE PROPERTY MAY BE SOLD DURING THE TERM OF THIS LEASE**			

Landlord may also terminate this Lease if it sells the Leased Premises to a third party. In the event Landlord sells the Leased Premises to a third party prior to the expiration of this Lease, Landlord shall provide written notice to Tenant of such sale no less than thirty (30) days prior to the date of sale. Tenant reserves the right to negotiate a new lease with the new owner. However, if Tenant is unable to negotiate a new lease with the new owner, Tenant may remain in possession of Leased Premises after the sale until: (a) the later of 60 days or the end of the

current growing season (the growing season being from March 1 to October 31); or (b) the later of 60 days or the start of the next growing season if the sale occurs during the dormant season.

#### \*\* IF LANDLORD WANTS TENANT TO VACATE ONE OF THE PARCELS\*\*

Landlord and Tenant agree that, notwithstanding anything in this Lease to the contrary, Landlord may terminate the Lease as to \*\*Name of Parcel\*\* at any time upon thirty (30) days written notice to Tenant.

\*\*USE THIS PARAGRAPH IF THERE IS A POSSIBILITY THAT THE TENANT OWNS A HOMESTEAD ON THE PROPERTY AND SELLS TENANT'S PROPERTY DURING THE TERM OF THIS LEASE\*\*

In the event Tenant owns property adjacent to the Leased Premises ("Tenant's Property"), Landlord may terminate this Lease if Tenant sells the Tenant's Property to a third party. In the event Tenant sells the Tenant's Property to a third party prior to the expiration of this Lease, Tenant shall provide written notice to Landlord of such sale no less than thirty (30) days prior to the date of sale. Landlord reserves the right to terminate the Lease and negotiate a new lease with the new owner or lease the property to a new tenant, at Landlord's sole discretion. Tenant may remain in possession of Leased Premises after the sale for up to 30 days, but must remove all personal property within that time period

# 3. RENT

#### \*\*Cash Rent\*\*

Tenant shall pay the Landlord rent of \*\* DOLLARS (\$ \*\*.00) per annum, based on \_\_\_\_\_ acres at \*\* DOLLARS (\$ \*\*.00) per acre and shall be paid as follows: \_\_\_\_\_ FINAL PAYMENT MUST BE RECEIVED BY **DECEMBER 15** OF THE APPLICABLE YEAR.

Within thirty (30) days of planting perennial crop seed, Tenant shall submit to Landlord written evidence of the cost of such seed. Should Tenant cease to lease the Leased Premises within five (5) years after Tenant's planting perennial crop seed, unless the Lease is terminated pursuant to Paragraph 18, Landlord shall reimburse Tenant a pro rata share of the cost of such perennial crop seed. Such reimbursement shall be paid to Tenant within thirty (30) days after expiration or termination of this Lease. At the Landlord's sole discretion, the reimbursement for perennial crop seed may be credited against the final cash rent payment due from Tenant.

#### -OR-

#### \*\*CROP SHARE RENT

Rent is based on the following crop share arrangement as follows:

1. Alfalfa, grass and other forage crops harvested mechanically:

a. Crop Share:

Landlord receives One-half (1/2) of the crops / Tenant receives One-half (1/2) of the crops

b. Cost Share:

Seed – 100% furnished by Landlord

Cost and application of Herbicide, Insecticide, Fertilizer and Pesticide -

One-half (1/2) Landlord / One-half (1/2) Tenant

Mowing, Raking - Tenant provides all

Baling, Stacking - One-half (1/2) Landlord / One-half (1/2) Tenant

#### -AND-

- 2. Beans, corn, small grains, and other crops:
  - a. Crop Share:

Landlord receives One-half (1/2) of the crops / Tenant receives One-half (1/2) of the crops

b. Cost Share:

Seed – 100% furnished by Landlord

Cost and application of Fertilizer, Herbicide, Insecticide and Pesticide -

One-half (1/2) Landlord / One -half (1/2) Tenant

Harvest - One-half (1/2) Landlord / One -half (1/2) Tenant

- c. Freight expense:
  - a. within 5 miles of Leased Premises 100% Tenant
  - b. over 5 miles from Leased Premises One-half (1/2) Landlord / One-half (1/2) Tenant
  - c. Comparative freight expense deducted from price of feed crops purchased by producer.
- d. Crop Residue:

Crop Share:

Landlord receives One-half (1/2) of the crop residue / Tenant receives One-half (1/2) of the crop residue

Cost Share:

One-half (1/2) of expenses to Landlord / One-half (1/2) of expenses to Tenant

#### -OR-

- 2. Beans, corn, small grains, and other crops:
  - a. Crop Share:

Landlord receives One-third (1/3) of the crops / Tenant receives two-thirds (2/3) of the crops

#### b. Cost Share:

 $Seed-100\%\ furnished\ by\ Tenant$ 

Cost and application of Fertilizer, Herbicide, Insecticide and Pesticide -

One-third (1/3) Landlord / Two-thirds (2/3) Tenant

Harvest - 100% furnished by Tenant

#### c. Freight expense:

- 1. within 5 miles of Leased Premises 100% Tenant
- 2. over 5 miles from Leased Premises One-third (1/3) Landlord / Two-thirds (2/3) Tenant
- 3. Comparative freight expense deducted from price of feed crops purchased by producer.

#### d. Crop Residue:

Crop Share:

Landlord receives One-third (1/3) of the crop residue / Tenant receives two-thirds (2/3) of the crop residue

Cost Share:

One-third (1/3) of expenses to Landlord / two-thirds (2/3) of expenses to Tenant

#### AND/OR

#### 3. Sugar Beets:

a. Crop Share:

Landlord receives One-fourth (1/4) of the crops / Tenant receives Three-fourths (3/4) of the crops

b. Cost Share:

Seed – 100% furnished by Tenant

Cost and application of Fertilizer – One-half (1/2) Landlord, One-half (1/2) Tenant

Cost and application of Herbicide, Insecticide and Fumigant - One-fourth (1/4) Landlord / Three-fourths (3/4) Tenant

Freight - One-fourth (1/4) Landlord / Three-fourths (3/4) Tenant

Harvest - 100% furnished by Tenant

For any reimbursable crop share expense, Tenant shall submit to the Landlord, within sixty (60) days after incurred, written evidence of the cost of such expense. Any expenses incurred by the Tenant, not presented to the Landlord in the time allowed, shall be reimbursed only at Landlord's sole discretion.

\*\*DO NOT REMOVE THE FOLLOWING PARAGRAPHS FOR CROP SHARE RENT\*\*

Tenant shall harvest the crop and deliver it to a mutually agreed upon market. Within 30 days after harvest, but in no event later than **November 15** of the applicable year of the Lease, Tenant must give Landlord production numbers and revenue totals. The only exception to this deadline shall be if, prior to November 15 of the applicable year, the Director of the Boulder County Parks and Open Space Department gives Tenant written approval to provide these figures after November 15. Upon completion of harvest, Tenant shall furnish Landlord with documentation confirming sale or storage of Landlord's share of the crop in Landlord's name. Remittance of sale proceeds or verification of stored crop is due within thirty (30) days of completion of harvest, but in no event later than **December 15** of the applicable year of the Lease or option, or the Director of the Boulder County Parks and Open Space Department may give written approval prior to December 15th of the applicable year as to the date the crop is marketed. Tenant reserves the right to purchase Landlord's share of the crops. If Tenant wishes to purchase the Landlord's share of crop, Tenant must inform Landlord of his/her/it's intentions to buy no later than 30 days after harvest. Total payment for this share of the crop must be paid in full by December 15<sup>th</sup> of each year to the Landlord.

#### Sale of Crop to Tenant:

Prices for the following crops shall be established as follows:

- a. Alfalfa price will be determined at each cutting depending upon quality and prevailing market price
- b. The price of corn silage will be determined at prevailing market price at time of sale, less a freight deduction of \*\* \$1.50 \*\* for each gross ton.
- c. Shelled corn (including high moisture corn and other small grains) will be purchased at prevailing market price at harvest, less a freight deduction of \*\* \$ 0.20 \*\* per bushel (corn- \*\* 56 lbs. \*\*).
- d. Payment for feed crops purchased by Tenant will be according to paragraph 3 of the Lease.

Rent payment shall be satisfied upon receipt of sale proceeds from, or verification of storage of, Landlord's share, in Landlord's name. Landlord reserves the right to sell Landlord's portion of the crop at Landlord's discretion at any time during the Lease term. Proceeds or notice shall be mailed to the Attn: Accounts Receivable Department, Boulder County Finance, P.O. Box 471, Boulder, CO 80306.

#### -OR-

#### \*\*RENT FOR GRAZING

In addition to the Cash Rent, for crop not harvested mechanically and for crop after-math that is grazed, the Tenant shall pay the Landlord rent equal to \*\* DOLLARS/CENTS (\$0.\*\*) per animal unit equivalent per day ("AUD"). The total rent owed for each year shall be established at the end of each grazing season by an accounting between the Landlord and the Tenant, hereinafter referred to as the "Final Accounting". Rent shall be paid as follows: The total rent payment shall be due 30 days after the Final Accounting for each grazing season, but in no event later than **December 15** of the applicable year of the initial term of the Lease. Thereafter the final rent payment during the term of any option shall be due 30 days after the Final Accounting for each grazing season throughout the term of any option but in no event later than **December** 

**15** of the applicable year of the option. \*\*OR\*\* Thereafter, one-half of the estimated annual rent shall be due on January 1 of each year during the term of any option, and the final rent payment shall be due 30 days after the Final Accounting for each grazing season throughout the term of any option but in no event later than December 15<sup>th</sup> of the applicable year of the option.

#### RENT OF YARDAGE

If any grazing on aftermath occurs whereby animals are provided with feed not grown on the Leased Premises, Tenant t shall pay the Landlord FIVE CENTS (\$0.05) per AUD

\*\*KEEP THE FOLLOWING SENTENCE EVEN IF YOU DELETE GRAZING

PARAGRAPH\*\*

# \*\*IF ANY PORTION OF THE LEASED PREMISES ARE ACTIVELY UNDER ORGANIC CROP CERTIFICATION, USE THIS PARAGRAPH\*\*

#### ORGANIC CERTIFICATION

For acreage in transition from conventional to organic production methods, with prior written agreement of Landlord, Tenant's rent will be reduced by 50% for each of the three years of the organic certification process. In the event Tenant receives organic certification after the three-year certification process, Landlord will pay any certification fees for the initial year following certification, if those fees are not otherwise paid for by other incentive programs. In the County's discretion, the Lease may be extended for an additional two years beyond the term described in paragraph 2 of this Lease, if certification is obtained within the term of the Lease.

Rent is due by 4:30 p.m. on the specified date by mail to the Boulder County Finance Department, Attn: Accounts Receivable, P.O. Box 471, Boulder, Colorado 80306.

#### 4. LATE PAYMENTS

If any of the payments for \*\*cash rent, rent for grazing, crop share rent and/or water assessments\*\* or any other payments due under this Lease are more than thirty (30) days past due, the balance due and owing shall begin to accrue interest after 4:30 p.m. on the due date at a rate of 1.5 percent per month. Tenant may not exercise any option to renew the Lease if Tenant is not current with rental payments at the time Tenant gives notice of intent to exercise the option.

#### 5. USE

Tenant shall use the Leased Premises for the purpose of agricultural production.

#### 6. WATER RIGHTS

Tenant acknowledges that there are no water rights available for irrigation of the Leased Premises.

#### -OR-

Tenant acknowledges that the following irriga	tion water rights are owned by the Landlord
and available to Tenant for agricultural use:	

\_\_ shares of the \_\_\_\_\_ \_\_\_\_\_ Ditch Company water. The irrigation water is to be used for irrigation of the Leased Premises only. Landlord shall be responsible for payment of water assessments for this/these share/s. \*\* Tenant agrees to reimburse Landlord for payment of the water assessments as invoiced by Landlord. Payment shall be made within 30 days from the date of receipt of Landlord's invoice \*\*. Tenant acknowledges that Landlord makes no guaranty or representation as to the amount or quality of water any shares or other interest in a water right(s) will provide. Tenant shall be responsible for acquisition of, and payment for additional rental water to be used on the Leased Premises, including ditch carrying charges resulting from such rental. \*\*USE THE FOLLOWING SENTENCE FOR CROP SHARE OR GRAZING LEASES ONLY\*\* On rare occasions, Landlord may participate in purchase of rental water, but only after prior written agreement is given by the Director of the Boulder County Parks and Open Space Department, based on a determination that the additional water will add considerable yield to the property. Additionally, if pumping is necessary for irrigation, the Tenant shall be responsible for any utility charges or fuel to pump water associated with any system. Tenant further agrees to provide County with an irrigation schedule that provides a record of quantities of irrigation water used, and of starting and ending dates of annual irrigation.

#### -OR-

If a center pivot system is included with the Lease, Tenant shall be responsible for all labor charges for general annual repairs and maintenance and Landlord shall be responsible for all parts charges for general annual repairs and maintenance on such system. Landlord shall be responsible for major repair costs of the pivot sprinkler, such as pump replacement and/or repair of other major components, provided there has been no negligence in performing annual repairs, maintenance, and operation of said system on the part of the Tenant.

#### 7. PROPERTY MANAGEMENT

Tenant shall manage the Leased Premises consistent with a Soil and Water Conservation Plan as prepared and approved by the \*\*Longmont OR Boulder Valley\*\* Conservation District, or their successors, in cooperation with the Natural Resource Conservation Service, hereinafter referred to as "NRCS", which Plan shall be current during each Lease period. Tenant shall file and certify acreage with the Boulder County Consolidated Farm Service Agency, and maintain and submit production, fertilizer and chemical application records as required by the federal government, or as required hereunder. Tenant shall be held responsible and accountable for any degradation to the land and/or ecological integrity of the area as a result of failure to adhere to any of the requirements under the terms of the Soil and Water Conservation Plan. Such failure by Tenant shall be grounds for termination of the Lease.

Tenant shall also assist Landlord in developing an annual, written agricultural \*\* management plan and an annual, written integrated weed management plan prior to each growing season. As the growing season progresses, the plans may be modified as conditions, such as weather, vary. Tenant agrees to implement management according to these plans, and to any modifications made to the plans by the Landlord.

Tenant shall take all measures necessary to prevent pollutants from entering storm drains of watercourses. For the purpose of eliminating stormwater pollution, Tenant shall implement effective Best Management Practices (BMPs). BMPs include general good housekeeping practices, appropriate scheduling of activities, operational practices, maintenance procedures and other measures to prevent then discharge of pollutants directly of indirectly to the storm drain system. These BMPs shall be maintained for the duration of the Tenant's lease. Tenant shall also be responsible for proper disposal of all waste materials, including wastes generated by the implementation of BMPs.

Tenant shall comply with all of the terms set forth in the current protocols for genetically modified crops to be grown on Boulder County Parks and Open Space. Current copies of the protocols will be kept on file with the County's Agricultural Operations office and are available for inspection and copying during normal business hours.

#### \*\*USE THIS PARAGRPAH ONLY IF GRAZING\*\*

The vegetation on the Leased Premises shall not be over grazed. Grazing shall occur only if adequate forage is available. Landlord will monitor grazing and the natural resources impacted by grazing. Such natural resources shall include but not be limited to soils, vegetation, water, and wildlife. Landlord has authority to require Tenant to make any adjustments with respect to grazing. Any adjustments required by Landlord shall be executed by Tenant within the time period required by Landlord. If Tenant fails to do so, Landlord may remove grazing animals and Tenant shall be responsible for any expenses incurred as a result of such removal. Tenant shall be held responsible and accountable for any damage to pasture and ecological integrity of the area as a result of failure to adhere to any of Landlord's requirements under the terms of the Management Plan. Such failure by Tenant shall be grounds for termination of the Lease.

#### 8. RENEWAL

# ( \*\*use this clause for everything except dryland crops.\*\*)

If Landlord elects to renew the Lease beyond the Tenant's second option to renew, and Tenant is in compliance with all the terms of the Lease, including all rental payments due, Landlord shall notify Tenant of the renewal terms, in writing, on or before July 31 of the year of the last option. Tenant shall have fifteen (15) calendar days from the receipt of said notice to accept or reject, in writing, a renewal of the Lease.

If Landlord and Tenant do not agree to renew this Lease for any cause, Landlord, or its agent, may enter the Leased Premises after Tenant has harvested the then-current crop, in order to begin preparatory work for future crops.

# ( \*\*use this clause for dryland crops.\*\*)

If the parties do not agree to renew this Lease for any cause on or before March 31 of the last year of the Lease term or option, Tenant shall not begin summer fallow preparations or any other work preparatory for future crops. Additionally, Landlord or any agent of the Landlord, may enter upon the Leased Premises after March 31 or after harvest of current year crop for fallowing operations and also after harvest of current year crop in order to begin preparatory work for future crops.

#### 9. REMOVAL OF PERSONAL PROPERTY

Tenant shall have the duration of the Lease term to remove all of Tenant's personal property from the Leased Premises, unless Landlord terminates this Lease as provided in Paragraph 18 of this Agreement. Tenant agrees that any personal property of Tenant remaining on the Leased Premises after the end of the Lease term, or termination of the Lease, shall be deemed abandoned by Tenant and Landlord shall have the right to dispose of any such personal property in any manner Landlord deems appropriate. Tenant will be liable for any disposal costs incurred by Landlord.

#### 10. DELIVERY OF POSSESSION

The Tenant shall be entitled to possession of the Leased Premises at 7 a.m. on the date of commencement of the Lease term.

#### 11. TERMINATION

This Lease shall terminate at the end of the Lease term or, if an option has been exercised, at the end of the option period, unless a new Lease for a new term, is executed by both parties. This Lease shall also terminate upon Tenant's death. Additionally, the Landlord may terminate this Lease pursuant to the provisions of Paragraph 18 contained herein.

\*\*USE THIS PARAGRAPH IF THERE IS A POSSIBILITY THAT THE TENANT OWNS A HOMESTEAD ON THE PROPERTY AND SELLS TENANT'S PROPERTY DURING THE TERM OF THIS LEASE\*\*

In the event Tenant owns property adjacent to the Leased Premises ("Tenant's Property"), Landlord may terminate this Lease if Tenant sells the Tenant's Property to a third party. In the event Tenant sells the Tenant's Property to a third party prior to the expiration of this Lease, Tenant shall provide written notice to Landlord of such sale no less than thirty (30) days prior to the date of sale. Landlord reserves the right to terminate the Lease and negotiate a new lease with the new owner or lease the property to a new tenant, at Landlord's sole discretion. Tenant

may remain in possession of Leased Premises after the sale for up to 30 days, but must remove all personal property within that time period.

Tenant agrees to reside within thirty miles of the borders of Boulder County. In the event Tenant moves beyond the 30 miles from any Boulder County border, County may, at its sole discretion, terminate the Lease.

#### 12. HOLDOVER

If Tenant holds over after the expiration or termination of this Lease agreement, Tenant shall occupy the Leased Premises on a month-to-month basis at a rental rate and rental terms to be specified by the Landlord unless a new Lease, for a new term, is executed by both parties within thirty (30) days of the termination of this Lease.

#### 13. INSURANCE REQUIREMENTS

Tenant shall purchase, maintain and keep current, at Tenant's own expense, the following insurance coverage:

a. A Commercial General Liability Insurance or Farmer's Liability Insurance Policy with minimum limits of \$600,000.00 combined single limit for each occurrence and for each occurrence resulting from the current agricultural operations on the Leased Premises.

(\*\*If the Leased Premises are subject to significant public contact:)

\*\*b. <u>Automobile Liability Insurance</u>. Tenant shall purchase Automobile Liability Insurance which includes coverage for all owned, non-owned, and hired vehicles with a minimum limit of \$600,000.00 combined single limit for each occurrence and for each occurrence resulting from the current agricultural operations on the Leased Premises

#### -OR-

(\*\*If the Leased Premises are subject to minimal or no public contact:)

- \*\*b. <u>Automobile Liability Insurance</u>. Tenant shall purchase Automobile Liability Insurance which includes coverage for all owned, non-owned, and hired vehicles with a statutory minimum limit, combined single limit for each occurrence and for each occurrence resulting from the current agricultural operations on the Leased Premises
- c. An umbrella liability policy (also referred to as excess umbrella liability) may be used to provide additional commercial general liability, auto liability, and employer's liability coverage to meet the County's minimum requirements. When excess umbrella liability is used, coverage should be as broad as the primary coverage.

Tenant shall provide Certificate(s) of Insurance annually to Boulder County demonstrating that the aforementioned insurance requirements have been met prior to the commencement of work under this Lease, and that such policy or policies will be in effect throughout the Lease term, and at such times before and after the Lease term as Tenant may reasonably expect to be conducting activities within the Leased Premises. COMMERCIAL GENERAL LIABILITY CERTIFICATE OF INSURANCE OR FARMER'S LIABILITY CERTIFICATE OF INSURANCE SHALL INDICATE, "THE COUNTY OF BOULDER, STATE OF COLORADO, A BODY CORPORATE AND POLITIC, AS ADDITIONAL NAMED INSURED."

These Certificates of Insurance shall also contain a valid provision or endorsement that these policies may not be canceled or terminated without 30 days written notice to the County, such notice to be transmitted by certified mail, return receipt requested.

If Tenant does make any change or modification to these policies, Tenant is required to give Landlord a 30-day written notice after such change or modification.

The Certificate Holder is "BOULDER COUNTY." Certificates of Insurance should be forwarded to:

Boulder County Attn: Lease Coordinator 5201 St. Vrain Road Longmont, Colorado 80503

It shall be Tenant's obligation to procure Workers' Compensation and Employers' Liability Insurance, if applicable in complying with the provisions of the Workers' Compensation Act of the State of Colorado, as amended.

#### 14. CONDITION OF PROPERTY

Prior to signing this Agreement, Tenant has inspected or caused to be inspected the Leased Premises and takes the Leased Premises in the condition **AS IS**. No additional representation, statement or warranty, express or implied, has been made by or on behalf of Landlord as to such condition. In no event shall the Landlord be liable for any defect in such Leased Premises or for any limitation on its use as agricultural land.

#### 15. TENANT COVENANTS AND RESPONSIBILITIES

Tenant shall abide by, and shall assure compliance by Tenant's guests and invitees with all Boulder County Parks and Open Space Rules and Regulations as those Rules and Regulations may be amended, including the following:

a. Tenant shall allow the Landlord access to the agricultural Leased Premises at all times.

- b. Tenant shall only allow odors, fumes, vibrations and noise on and from the Leased Premises which are commensurate with the normal conduct of agricultural operations.
- c. All chemical pest control employed on the Leased Premises shall be in accordance with federal, state or local statute, ordinance, resolution, rule or regulation.
- d. Tenant shall maintain all fences which confine livestock within the Leased Premises.
- e. Tenant shall prevent deterioration beyond normal wear and tear of the Leased Premises and existing structures during the term of this Lease and implement management practices, as described in Paragraph 7 herein, to maintain and conserve the soil and water.
- f. Tenant shall confer with Landlord annually on capital improvements needed for the Leased Premises as well as scheduling routine maintenance.
- g. Subject to County Rules and Regulations, Tenant shall burn, clean, dredge and generally maintain in a serviceable condition, all ditches, including wasteways, related to the Leased Premises. Any maintenance requiring hired machinery will require the prior, written consent of Landlord, and shall be paid for by Landlord.
- h. Tenant shall properly place, store, use or dispose on the Leased Premises, temporarily or permanently, only those substances legally permitted to be used on the Leased Premises, and which are approved by Landlord. Such substances shall include fuel products that are hazardous, toxic, dangerous or harmful or which are defined as a hazardous substance by the Comprehensive Environmental Response Compensation and Liability Act ("CERCLA") 42 USC 9601. These substances shall be referred to collectively as "hazardous substances". Tenant shall immediately notify Landlord by phone or facsimile and in writing, of all spills, releases, inspections, correspondence, orders, citations, notices, fines, response and/or cleanup actions, and violations of law, regulations or ordinances which affect the Leased Premises.
- i. Non-agricultural vehicular travel is restricted to existing roads.
- j. Tenant agrees there shall be no construction of any structure, building or other improvement on the Leased Premises without Landlord's prior written approval.
- k. Tenant shall indemnify and save harmless Landlord from and against any and all claims, suits, actions, damages and causes of action arising during the term of this Lease, or any period during which Tenant's personal property remains on the Leased Premises, for personal injury, loss of life, or damage to property sustained in, or upon the Leased Premises or arising out of the use of the Leased Premises,

and from and against all costs, attorneys fees, expenses and liabilities incurred in and about any such claims, the investigation thereof or the defense of any action or proceedings brought thereon, and from any judgments, orders, decrees, or liens, resultant therefrom by virtue of the use of the Leased Premises. By requiring this right to indemnification, the Landlord in no way waives or intends to waive the limitations on liability which are provided to the Landlord under the Colorado Governmental Immunity Act, C.R.S., Sections 24-10-101, et seq.

- 1. Tenant agrees that Tenant shall not permit any mechanic's lien to be perfected or remain against the Leased Premises. Tenant shall not directly or indirectly create, incur, assume or suffer to exist any mortgage, pledge, lien, charge, encumbrance or claim on or with respect to the Leased Premises.
- m. Tenant agrees that Tenant shall not assign, convey, devise, sublet, pledge or mortgage any of Tenant's interest herein without the prior written consent of the Landlord thereto, which consent shall be in the absolute discretion of the Landlord. Landlord reserves right to terminate any sub-lease at anytime at Landlord's sole discretion. This shall not preclude Tenant from using Tenant's share of the crop for collateral for an operating loan.
- n. Tenant agrees the Leased Premises shall not be used for any purposes prohibited by the laws of the United States or the State of Colorado or the ordinances or resolutions of the County of Boulder.
- o. Tenant agrees to deliver up and surrender to the Landlord, possession of said Leased Premises at the expiration or termination of this Lease, by lapse of time or otherwise.
- p. No public access or recreational use of the Property can be authorized by the Tenant.
- q. It shall be unlawful for any unauthorized person, to remove, destroy, mutilate, collect or deface any natural or man-made object on the Property.
  - r. It shall be unlawful for any person or domestic animal to feed, hunt, pursue, trap, molest, disturb or kill any wildlife at any time on the Property, except where and when such activities are permitted by action of the Board of County Commissioners or by written permission from the Director of the Parks and Open Space Department. This provision shall not apply to any county, state or federal government personnel authorized by the Board of County Commissioners to carry out a wildlife management program through law or County-approved rules and regulations.
- s. Ground fires are unlawful. Exceptions to the ground fire prohibition may be allowed only with written permission from the Board of County

Commissioners or the Director of the Parks and Open Space Department and are subject to the burning requirements for Boulder County.

- t. It shall be unlawful to dispose of trash, garbage, rubbish, litter or debris on the Property.
- u. Under no circumstance may hazardous materials be deposited on the Property.
- v. It shall be a violation of this Lease for any person, acting individually or on behalf of a business or organization, to use the Property for any commercial purpose (such as a staging area for a bicycle race; filming movies or commercials; riding activities of a commercial horse stable, riding school or livery) without first obtaining written permission from the Landlord. The only exception to this prohibition against commercial activities on the Leased Premises is that agricultural products produced by Tenant may be sold on the Leased Premises, after approval by the Boulder County Parks and Open Space Department, so long as the sale is conducted in accordance with the provisions of the Boulder County Land Use Code.
- w. It shall be unlawful to take off or land any motorized or non- motorized aircraft within the Property; aircraft includes but is not limited to: airplanes, helicopters, ultralights, gliders/sailplanes, and hot-air balloons.

#### 16. EASEMENTS AND LICENSES

Notwithstanding any other provision of this Lease agreement, Tenant accepts this Lease agreement subject to all existing easements and licenses of record held by third parties and acknowledges that Landlord retains the right, in its sole discretion, to grant easements or licenses to third parties for entry upon and or use of a portion of the Property by the third party and or its agents during the term of this Lease agreement. In the event that a third party, acting pursuant to an easement or license, damages the Property or Tenant's crops and or Tenant's personal property, Landlord will restore the Property to its prior condition and/or compensate Tenant for the fair market value of any damage to such crop and or Tenant's personal property.

#### 17. NOTICES

Any notice from one party to another, required by the terms of this Lease agreement, may be delivered in person to such party (delivery to one of two or more persons named as a party shall be effective notice to all), or shall be delivered by first class mail, postage prepaid, and shall be deemed given one (1) day after the date mailed, addressed to the respective parties as follows:

Landlord:

Boulder County Parks and Open Space Department

5201 St. Vrain Road Longmont, Colorado 80503 303-678-6226 - phone no. provided for informational purposes only.

#### Tenant:

\*\*

\*\*

- phone no. provided for informational purposes only.

#### 18. BREACH

The Tenant agrees to observe and perform the conditions and agreements herein set forth to be observed and performed by the Tenant. If Tenant defaults in the payment of rent, or any part thereof, or if the Tenant shall fail to observe or perform any conditions or agreements set forth in this Agreement, Landlord shall give Tenant written notice that Tenant has fifteen (15) days to cure such breach. If Tenant fails to commence within said fifteen-day period, a course of performance to cure such default and thereafter to diligently pursue the work required to correct it, then, and in that event, and as often as the same may happen, it shall be lawful for the Landlord, at its election, to terminate this Lease and to re-enter and repossess itself of the Leased Premises, with or without legal proceedings, using such force as may be necessary, and to remove therefrom any livestock, crops and any personal property belonging to the Tenant without prejudice to any claim for rent or for the breach of covenants hereof, or without being guilty of any manner of trespass or forcible entry or detainer. Tenant agrees to indemnify and hold harmless the Landlord from and against any costs for the removal and storing of livestock and crops elsewhere incurred by the Landlord under the provisions of this paragraph.

#### 19. JOINT AND SEVERAL LIABILITY

If this Lease is signed on behalf of Tenant by more than one person, the liability of the persons so signing shall be joint and several.

#### 20. MISCELLANEOUS PROVISIONS

Tenant's rights under this Lease are personal to Tenant and the Lease shall terminate upon the Tenant's death, unless Landlord elects, in writing, to permit assignment to a third party.

Time is of the essence of this Lease and of all provisions herein.

If any provisions of this Lease shall be declared invalid or unenforceable, the remainder of the Lease shall continue in full force and effect.

Notwithstanding anything to the contrary contained herein, Landlord's liability under this Lease shall be limited to Landlord's interest in the Leased Premises.

#### 21. PAYMENT OF ATTORNEY'S FEES AND COSTS

If the Landlord shall commence an action for collection of rent or other sums payable under this Lease, or to compel performance of any of the terms or conditions of this Lease, or for damages for failure of Tenant to perform under this Lease, the Landlord shall collect from the Tenant and Tenant shall pay to the Landlord all reasonable attorney's fees in respect thereof, unless the Landlord shall lose such action, in which case Landlord shall pay Tenant's reasonable attorney's fees and costs.

#### 22. VENUE

This Lease shall be governed by the laws of the State of Colorado. Venue for any action brought under this Lease shall be the Boulder District Court.

## 23. ENTIRE AGREEMENT

This Lease contains the entire agreement of the parties and may not be altered or amended except by mutual written agreement signed by both parties.

**IN WITNESS WHEREOF**, the parties hereto have executed this Lease on the date set forth opposite their respective signatures.

LANDLORD

	COUNTY OF BOULDER, a body corporate and politic	
	By:	Date
ATTEST:		
Clerk to the Board		
TENANT		
	Tenant's name	Date

# **Appendix 3: Bid Process**

## **Bid process for Agriculture leases**

**PURPOSE:** To select a tenant for an agricultural property on a competitive basis that complies with Boulder County's public process.

**SCOPE:** This SOP applies to POS Ag employees, Ag Lease Coordinator, Admin Division Manager, Director.

**GENERAL:** The bid process provides a consistent process and standard in awarding agricultural leases to tenants.

## **SUMMARY OF PROCEDURE**

Step	Action	Responsibility
1	Identify properties that need to go out to bid.  A. From recent acquisition.	Ag Lease Coordinator
	B. Existing Ag properties with maturing leases.	Ag Resource Specialist
2	Review existing terms (crop share or cash lease) to evaluate and make recommendation.	Ag Team
3	Set timeframes for advertising, bid closing, and selection.	Ag Team Purchasing Coordinator
4	Describe property attributes that will be advertised for bid package.	Ag Team Purchasing Coordinator
5	Advertising and notification to interested parties.	Ag Team
6	Host pre-bid meeting and site visit.	Ag Team
7	Follow up on any additional questions or comments.	Ag Team Purchasing Coordinator
8	Receive and evaluate all bid packets.	Ag Team Invited outside experts as needed
9	Schedule for BOCC awarding of bid and notify successful bidder.	Ag Lease Coordinator Ag Resource Specialist
10	Write lease and forward for signatures.	Ag Lease Coordinator Ag Resource Specialist

### **EVALUATION CRITERIA**

The following criteria will be used to evaluate proposals and award leases based on the ability of prospective tenant to provide the best stewardship of the property:

- 1. Please describe the operation you propose for this property with as much detail as possible. Please include practices that conserve soil, water, and other resources.
- **2.** Please describe your proposed Crop Production:(Crops raised, tillage, irrigation)
- 3. Please submit other details of your management not included above:
- **4.** If you are currently involved in other agricultural enterprises, briefly describe the operation(s). Include general locations.
- **5.** How will the Boulder County agricultural land you are proposing to lease, fit in with the rest of your operation?
- **<u>6.</u>** Please describe your agricultural background.
- <u>7.</u> Please list the machinery and equipment needs for your planned operation on the property and how you will meet those needs. (Own, lease, borrow, hire custom, etc.)
- **8.** Describe how you will meet the labor demands for the proposed operation. Are you involved in your agricultural enterprises on a full-time basis? If not, what percentage of your time is dedicated to agricultural pursuits?
- **9.** Please provide personal references that are familiar with your agricultural experience.
- <u>10.</u> If you plan to manage an organic operation, please describe your experience in organic production.

Proposals will be evaluated by a committee consisting of staff from the Parks and Open Space Department and the CSU Cooperative Extension Service. The committee recommendation will then be presented to the Board of County Commissioners for approval

**VERIFICATION AND RECORD KEEPING:** The agriculture lease bid process mirrors the Boulder County purchasing process. Any changes to the County purchasing process would be reflected in the Ag lease bid process.

DATE IMPLEMENTED:	BY:	
SOP REVIEW TEAM:		
		_
DATE DEVIEWED.	DV.	
DATE REVIEWED:	BY:	
DATE REVISED:	BY:	

## **Appendix 4: Education and Outreach**

# Agricultural Resources Education and Outreach Standard Operating Procedure (SOP)

(Draft)

**PURPOSE:** This SOP outlines how the Ag Resources Division will provide the citizens of Boulder County education and outreach opportunities to learn more about agriculture and its importance to the county.

**SCOPE:** This SOP applies to POS Ag employees, specifically Ag Resource Specialist in charge of education and outreach opportunities.

**GENERAL:** Agriculture has been an important piece of Boulder County, socially and economically for many years. Increasingly in today's society people are unaware of where their food comes from, who is growing it and what is being produced right down the road. The Ag Resources E&O program will help bridge this gap and give people the opportunity to get out on the BCPOS ag lands, meet the local farmers and see what the crops look like. The program may include ag tours, booth at the county fair & farmers' market and school and special interest group presentations. The Ag Resources E&O will work in collaboration with the Natural Resource Management Education and Outreach staff.

#### SUMMARY OF PROCEDURE

Step	Action	Responsibility
1	Prepare yearly E&O plan (Jan.)	Ag Team Member
2	Review and comment (Jan.)	Ag Team at a
		regularly
		scheduled team
		meeting
3	Review plan with BCPOS E&O Staff	Ag Team Member
4	Update booth and presentation (Jan./Feb.)	Ag Team Member
5	Attend/Present at Our Lands To Your Hands Event	Ag Team
	for Fourth Graders (NRCS/Conservation Districts)	_
	(Feb.)	
6	Plan and implement 2 public Ag Tours (May to Sept.)	Ag Team
7	Schedule (contact market manager) and display at	Ag Team Member
	Farmers' Markets in Boulder and Longmont. At least	(2)
	2 markets at each location.	
8	Update brochures and print material annually.	Ag Team Member
9	Continually update Ag Resources page on the	Ag Team Member
	Boulder County website. (work with Web Specialist)	

# **VERIFICATION AND RECORD KEEPING:**

SOPs will be reviewed by the SOP team in January of each year. This Team will report back to the Ag Team by the second week in February to make recommendations for revisions, removals or new SOPs.

DATE IMPLEMENTED:	BY:
SOP REVIEW TEAM:	
SOI REVIEW TEAM.	
DATE REVIEWED:	BY:
DATE REVISED:	BY:

## **Appendix 5: Boulder County POS Good Neighbor Policy**

Boulder County Parks and Open Space shall establish the Good Neighbor Policy to assist farmers of Open Space properties in resolving conflicts arising from common practices and practices specific to a lessee's operations. Parks and Open Space will provide a venue for sharing information on the standards and policies for farming on Open Space and provide a method and venue for mediating disputes arising out of the interaction among farms and with residential areas. BMPs shall Include but not be limited to:

- The policy driving any types of crops grown on Boulder County Open Space shall be based on coexistence and good neighbor policies.
- Farmers shall have the right to grow crops by any allowable county approved method of their choice. Farmers shall implement best management practices. Farmers shall minimize negative effects on the environment, and shall alleviate pests such as weeds, disease, and insects that negatively affect their crops.
- Irrigators have a right to irrigate and maintain the infrastructure required to irrigate farmland.
- Good communication among farmers and with neighbors can help avoid or minimize problems arising from farming practices.
- Farmers shall observe planting and growing protocols that preserve the identity of hybrid, organic, genetically engineered, and other types of specific crops.
- Crops and production methods used to grow crops on Boulder County Open Space should be employed with the goal of minimizing any detrimental environmental impacts.
- BCPOS shall assemble and maintain a list of qualified professionals such as those employed by the USDA Agricultural Mediation services to mediate disputes concerning farming operations on Open Space land.
- Open Space lessees must adhere to all Boulder County Parks and Open Space policies and best management practices as outlined in the lease agreement. Farmers must strictly adhere to all additional requirements for specific crops, cropping systems, or practices.

## **Appendix 6: Soil Health and Quality**

# Soil Health and Quality Standard Operating Procedure (Draft)

**PURPOSE:** Soil health and quality are vital to the long term success of farming in Boulder County and specifically on Boulder County Parks and Open Space properties. These practices and procedures outline the way in which Agricultural Resources staff will administer a soil management program.

**SCOPE:** This SOP applies to POS Ag employees.

**GENERAL:** In order to effectively manage 25,000 acres of publicly owned agricultural lands, the Agricultural Resource Division of the Boulder County Parks and Open Space Department works with qualified farmers and ranchers through our lease program. Because the protection of soil and water is so critical to the long term success of the agricultural program, strict requirements for good conservation practices are a requirement of the lease. While every property has the same requirements, no two properties or operations are the same, thus practices and actions vary depending on the situation.

#### SUMMARY OF PROCEDURE

#### **Management Practices:**

- Conservation Tillage: strip till, no till
- Leaving Crop Residue: reduces wind erosion, adds organic material to soil
- Cover Crops
- Modifying the direction of planting: reduces wind and water erosion
- Timing of plowing
- Use of Polyacrylamide (PAM): reduces seepage and minimizes soil erosion
- Use of efficient water delivery systems: gated pipe, overhead sprinklers, center pivots, drip irrigation
- Soil amendments: manures, compost, numerous other amendments
- Buffers: land buffers, grass waterways

#### **Monitoring Practices**

- While self-policing may seem rather laissez-faire, the impact of not maintaining soil and water quality directly impacts the tenant's economic viability and they are vigilant to minimize the loss of these resources.
- The NRCS performs site visits to assure that plans are being followed.
- In addition to frequent property visits for routine operation and maintenance needs, the Parks and Open Space Staff perform annual site visits to review operating plans.
- We rely upon adjacent producers and neighbors for information on practices that may cause negative water quality or soil impacts.

**Enforcement Practices.** If it is determined through one of the monitoring mechanisms that soil or water is being degraded one or more of the following actions will be taken.

- The tenant will self-correct. Typically the operator has the tools and experience to mitigate the problem.
- Staff will work with the tenant to correct the problem.
- Staff will utilize the experience of other agencies such as NRCS to help develop a plan to mitigate the problem.
- If the land in question cannot be farmed without unacceptable impacts, it may be taken out of production.
- Ultimately if a tenant is not willing to work with staff or follow the recommendations to correct the problem, the lease will be terminated.

**VERIFICATION AND RECORD KEEPING:** *Provide documentation to assure that the SOP is valid, up to date and there is accountability.* 

SOPs will be reviewed by the SOP team in January of each year. This Team will report back to the Ag Team by the second week in February to make recommendations for revisions, removals or new SOPs.

DATE IMPLEMENTED:	BY:	
SOD DEVIEW TEAM:		
SOF REVIEW TEAM.		
DATE REVIEWED:	BY:	
DATE REVISED:	BY:	

# **Appendix 7: Strategic Integrated Pest Management**

## <u>Strategic Integrated Pest Management Standard Operating Procedure</u>

#### **Boulder County Parks and Open Space**

Integrated Pest Management is a sustainable approach that combines the use of prevention, avoidance, monitoring and suppression strategies in a way that minimizes economic, health and environmental risks (CSREES/Land-Grant University 1998). Boulder County Park and Open Space Agricultural Resources Integrated Pest Management Guidelines shall consider all available tools and strategies available for effective use of managing pests in regards to their economic, environmental and social consequences. The goals of the IPM Guidelines are to:

- Establish procedures for assuring that the latest pest management research and innovative management techniques that may increase effectiveness and/or decrease environmental impacts are incorporated into pest management decisions.
- > Use the safest effective practices whenever economically feasible.
- > Establish monitoring programs and evaluated criteria to measure control success.
- > Establish and maintain pesticide use reporting and record keeping.
- Develop procedures for allowing public input without disruption of the overall program.

## **Appendix 8: Biosolids Standard Operating Procedures**

# **Biosolids Standard Operating Procedure**

(Draft)

**PURPOSE:** To maintain or improve the quality of agricultural lands while allowing for the beneficial use of biosolids.

**SCOPE:** This SOP applies to:

- 1. The review process for biosolids applications on BCPOS lands
- 2. The use of biosolids on BCPOS agricultural lands
- 3. Monitoring of biosolids practices on BCPOS lands
- 4. Corrective actions

**GENERAL:** The term "biosolids" refers to domestic sewage sludge that has been processed and can be beneficially applied to land in order to improve soil productivity. Biosolids are used on farms, reclamation sites, parks, and home gardens as a supplement to fertilizers and soil conditioners. Approximately 80-85% of the biosolids produced by Colorado municipal wastewater treatment plants are applied to land for beneficial use. There are currently more than 500 sites that have been issued permits by the Colorado Department of Public Health and Environment (CDPHE) for land application. There are approximately 32 permitted sites in Boulder County, six of which are located on Boulder County Parks and Open Space (BCPOS) agricultural lands.

Regulations governing the beneficial use of biosolids in Colorado exist at the federal and state levels. As a requirement of the Clean Water Act Amendments of 1987, the Environmental Protection Agency (EPA) developed the Federal 40 CFR Part 503 Technical Regulations for the safe use and disposal of biosolids. The goal of these regulations is to encourage beneficial use. The regulations specify ceiling concentrations and cumulative loading rates for metals in biosolids that are applied to land. The regulations also include pathogen and vector reduction requirements.

In February 1994, following publication of the federal regulations and in order to achieve consistency with the federal regulations, the State of Colorado reissued its biosolids regulation. Colorado's Regulation #64 was most recently revised in January 2008, and states: "The purpose of these regulations is to establish requirements, prohibitions, standards, and concentration limitations on the use of biosolids as a fertilizer and/or organic soil amendment in a manner so as to protect the public health and prevent the discharge of pollutants into state waters."

**SUMMARY OF PROCEDURE:** Parks and Open Space staff shall require that the land application of all biosolids on BCPOS property is performed in compliance with State and local health department policies, as well as any additional guidelines set by Parks and Open Space.

#### **INSTRUCTIONS:**

### 1. Permitting

- a) State: All applications must first be approved by the Colorado Department of Public Health and Environment.
- b) Boulder County Health Department: BCHD will review all CDPHE approved applications to evaluate the certainty of which regulation 64 will be met at the proposed site. This review will pay particular attention to the requirement for a five foot separation to groundwater based on the following:
  - i. Review of available septic system design data for depth to groundwater.
  - ii. Review of any available piezometer data.
  - iii. Review of NRCS soils maps.
  - iv. Review of concerns brought to BCPH by local residents.
- c) Boulder County Parks and Open Space
  - i. BCPOS will only consider applications that have been approved by the State and the Boulder County Health Department.
  - ii. POS staff will perform a site visit to evaluate any site prior to approval.
  - iii. If Parks and Open Space staff determines that the current available information on ground water depth does not conclusively demonstrate that the annual high groundwater table is at a depth of greater than five feet of the surface land, they shall require additional information.
  - iv. If the land is irrigated and the current groundwater information does not take this into consideration, a test well will be required and monitored during the irrigation season prior to approval.

#### 2. Monitoring

- a) Initial site visit
- b) Annual
  - i. Visit on-site a least once during the application window.
  - ii. Meet at least once with the current agricultural operator to discuss the use of biosolids.
  - iii. Properties where biosolids are applied will include this practice as part of the operating plan.
- c) Complaint based
  - i. While staff has the ability to check agricultural operations as part of their daily routine, they cannot be everywhere all the time. Because of this fact, neighbors are often an important source of information.
  - ii. BCPOS staff will respond to complaints related to the application of biosolids as an additional means of regulating compliance with all aspects of this document.

#### 3. Corrective Actions

a) If it is determined through any of the above monitoring practices that Regulation 64 is not being met, Parks and Open Space staff will suspend the application of any

- additional biosolids until it can be demonstrated that corrective action will resolve the problem.
- b) If after working with the State, BCPH and the applicator it is determined that Regulation 64 cannot be met, Boulder County Parks and Open Space will revoke the right to apply biosolids on all or a portion of the property that is not in compliance.

#### **VERIFICATION AND RECORD KEEPING:**

BCPOS will keep maps, permits and histories of all sites approved for the application of biosolids. Staff will record monitoring activities and any corrective action taken in the Operating Plans for each property. On an annual basis, the agricultural manager will verify that BCPOS employees have taken the required monitoring actions and that all corrective actions have been documented. The biosolids monitoring information will be kept as part of the Operating Plan for as long as the use of biosolids continues on the property and for five years after cessation of use.

DATE IMPLEMENTED:	_BY:
DATE REVIEWED:	BY:
DATE REVISED:	BY:

# **Appendix 9: Pesticide Application Protocols**

Boulder County has established a protocol to be applied before any spraying on public land:

- When spray operations are adjacent to public trails the trail is posted prior to spraying.
- Depending on the proximity to a public trail, staff may require that the trail be closed to the public.
- Individuals on the State's Pesticide Sensitive Registry are notified.
- Drift cards may be placed if other sensitive crops are adjacent to the spray operation.
- Currently the spraying of herbicides and insecticides by fixed wing aircraft has been banned.

## **Appendix 10: Wildlife Best Management Practices**

#### Wildlife Best Management Practices for Cropland

This document is meant to serve as general outline for inclusion into the Draft Cropland Policy. This document will be further refined to include specific recommendations and mitigations pending full acceptance and approval of the Cropland Policy by the Board of County Commissioners.

#### Overview

The following Best Management Practices (BMP) are general guidelines for the protection of wildlife found on agriculture-focused Open Space properties. These BMPs have been developed for a broad geographic area, therefore each described BMP will not always be the most applicable. However, BMPs provide a foundation for developing customized leases, operating plans, and/or management plans that benefit designated priority species at the Federal, State or County level.

## **BMP Development Process**

These wildlife BMPs for cropland will be further developed using literature review, State, Federal, and nonprofit published guidelines and technical reports. All BMPs will be developed in collaboration between Resource Management and Agricultural Resource staff. This is a living document which reflects the most current knowledge and information available and will be continuously updated.

#### **Proposed Wildlife BMPs Subjects**

- Administration
- Grazing
- Capital Improvements
- Haying
- Irrigation
- Row Crops/cropland

## **Appendix 11: Riparian and Wetland Best Management Practices**

#### **Riparian and Wetland Best Management Practices for BCPOS Croplands**

This document is a preliminary statement of direction for the development of Best Management Practices (BMPs) for agricultural operations near riparian areas and wetlands.

#### **GENERAL:**

#### Definition of Riparian Zones and Wetlands

Perennial and intermittent or ephemeral streams have a zone often referred to the as the riparian area. The riparian area is generally the vegetated area from the high water mark to upland vegetation. In Boulder County, this area is characterized by the presence of vegetation that requires a shallow groundwater table, such as plains cottonwoods (*Populous deltoides*).

Boulder County Parks and Open Space delineates or classifies wetlands using three criteria:

- Plants: dominance of hydrophytic plants
- Soils: presence of hydric soils
- Water: soil saturation or presence of shallow water for a period during the growing season

Wetlands in Boulder County are found near and along flowing water, standing water and in areas separated from observable surface water. Many of the wetlands in Boulder County are associated with perennial streams, ephemeral or intermittent streams, swales, ravines, agricultural ditches, and low lying areas with clay pans. There are also wetlands associated with springs, hillside seeps, kettle ponds, and prairie potholes. Perennial streams can have wetlands associated with the fluctuations of the stream level as well as wetlands associated with the high water table in the basin.

#### • Regulations Protecting Wetlands

The U.S. Army Corps of Engineers (USCOE) regulates the activities that impact "waters of the United States," including wetlands. This regulatory action is allowed under the Clean Water Act, Section 404. The Environmental Protection Agency (EPA) also provides guidance and administration of Section 404 of the Clean Water Act.

#### Purpose of Buffers

Riparian areas and wetlands provide improved water quality, stream bank stabilization, flood attenuation, groundwater recharge, and important wildlife habitat.

The purpose of buffers around riparian areas and wetlands is to protect the many valuable features and functions provided by these ecosystems with an ecologically sound transition area between uplands or agricultural Open Space lands.

All wetlands on or adjacent to BCPOS land shall be protected from actions that may reduce the number, size of wetlands, or degrade the physical and functional values of wetlands. The protection of wetlands will be completed using a variety of approved management actions including: wetland buffers, fencing and other management actions. Riparian areas will be protected from impacts using management processes similar to wetland protection, including riparian buffers.

#### Definition of Buffers

A riparian or wetland buffer is an area extending from the edge of the defined riparian area or wetland to upland vegetation or cropland. These buffers are vegetated areas that are undeveloped and are general free from human disturbance.

#### **BMP DEVELOPMENT PROCESS**

#### General

BCPOS will develop Riparian and Wetland Buffer BMPs that protect the ecological integrity of streams, riparian areas, and wetlands, while supporting sustainable cropland and agricultural practices.

BCPOS will review established guidelines, technical reports, and published literature from federal, state, and local governmental agencies, in addition to nonprofit organizations, to develop these BMPs.

BCPOS will generate a list of allowed uses and restricted activities within riparian and wetland buffers.

#### > Approach to Riparian and Wetland Buffers

Specific buffer widths will be established for both riparian areas and wetlands. The approach will allow the buffer widths to vary in size (greater or lesser) based on individual site characteristics, including: slope, connectivity of the wetland or riparian area, presence of federal and state threatened and endangered species, and sensitive plant communities, and presence of habitat generally associated with protected species. Variable wetland buffer widths may also be allowed based on the agricultural or cropland practices proposed for the site or sections of a property.

Examples of strategies used in the determination and implementation of buffers will include the following:

Determination of the buffer zone will require a review by qualified BCPOS staff.

- The types of agricultural or cropland practices proposed for a site may change the width of the wetland buffer. Activities such as storage of fuel and equipment, animal waste, irrigation practices, and pesticide applications may require a greater buffer width.
- Other management activities planned for sites near or adjacent to riparian areas or wetlands will require assessment by Boulder County.
- Degradation to wetlands or wetland buffers may require an increase in buffer sizes.
- Modifications to the buffer width may be reviewed by BCPOS upon request of the lessee.

#### **REFERENCES**

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# **Appendix 12: Background Information**

Appendix 12 is former background information that can be found in a <u>separate document</u>.

# Appendix 13: Transition Policy for Phasing Out Genetically-Engineered Crops and Neonicotinoids on Boulder County Parks and Open Space Properties

#### **Background**

On March 17, 2016, the Board of County Commissioners (BOCC) instructed Boulder County Parks and Open Space (BCPOS) staff to develop a plan that would phase out the use of genetically-engineered (GE) crops on the county's open space properties. The BOCC also explained their concerns about pesticide use (e.g., neonicotinoids) as well as their support for research opportunities into sustainable agriculture. Following that policy direction, BCPOS staff met with the farm tenants that would be most affected by this change. After input from tenants and other stakeholders, staff developed a draft transition policy to eliminate glyphosate-resistant corn and sugar beet crops on county property while minimizing the impact on our lessees whose livelihoods are connected with the agricultural stewardship of these lands.

Over the course of the summer, staff studied a variety of ways to make this transition. First, we looked at requiring gradual annual reductions in GE crops over three-, five-, and seven-year time frames. Part of the complication with requiring immediate reductions is that it affects the tenants differently depending on where they are in their crop rotations. And, perhaps most importantly for the lessees, fixed reduction targets—albeit gradually phased in—could have dramatic effects on income and the viability of business investments they have made to their operations. This is particularly true of sugar beets. Sugar beets, which are only available commercially as seeds in their GE form, require specialized equipment and membership in a cooperative—both significant investments. Sugar beets are one of the most dependable and profitable crops for farmers in this region and provide some tenants with as close to a guaranteed income as possible given the vagaries of agricultural commodities and markets.

In the case of corn, the situation is different. Unlike sugar beets, there is a readily available substitute non-GE crop. A tenant can more easily make a switch from GE corn to conventional corn (or transition to organic) and would likely continue to use some of the same equipment. However, staff recognizes that these switches are not without impacts and could result in added inputs, more costs, and decreased yields. With these crop differences in mind, staff worked to develop a general transition policy that addresses the situation from a broad perspective, taking advantage of the unique circumstances of each lease, each crop, and the existing rotation protocols in the Cropland Policy.

#### Adopted Policy

Boulder County's goal is to reduce, and ultimately eliminate, the current use of GE crops (Bt corn and glyphosate-resistant corn and sugar beets) on county open space in a way that is understandable and fair for affected tenants. To do so, the county will implement a dual strategy that phases out GE corn and sugar beet crops based on the differences described above between these crops:

- 1. GE corn will be allowed in rotations for the next three years (beginning in 2017), resulting in a complete phase out by the end of 2019 at the latest.
- 2. GE sugar beets will be allowed in rotations for the next five years (beginning in 2017), resulting in a complete phase out by the end of 2021 at the latest.

This dual strategy will result in a dramatic reduction in GE crop use in the near term since corn generally represents 70% of the total GE acreage, accounting for approximately 1,200 acres annually on average. Furthermore, the longer time for beet conversion gives tenants added time to utilize investments associated with them.

The other elements of the strategy to reduce and eliminate the use of GE crops on county properties focus on limiting their use to the tenants and leases that have used them in the recent past. This policy:

- confines the use of GE crops to tenants that have used them in the last two years (2015 and 2016) as these are the farmers with the added experience of their use within the context of the county's current Cropland Policy and are deriving an important function and income from them.
- caps the planting of GE corn and sugar beets on these "GE leases" at a maximum acreage-percrop based on the average acreage planted over the last four years (the planting timeframe since the Cropland Policy was approved in late 2011); and
- limits plantings of either GE crop to a maximum of two times total per field according to the existing protocols of the Cropland Policy.

Limiting GE crop use to the leased areas that have had GE crops on them within the last two years will also aid our efforts to monitor and track GE crop use and be a fair method for allocating GE crop acreage.

While these guidelines will help direct the elimination of GE crops from county open space lands, existing provisions within the Cropland Policy that permit BCPOS to review and approve/deny new GE crops remain in place. BCPOS and the BOCC remain open to consideration of GE crops (other than pesticide-resistant ones) in the future, especially pertaining to drought resistance.

Furthermore, the BOCC remains concerned about the continued use of pesticides, particularly neonicotinoids, and will continue to seek ways to reduce their use on county open space beyond the reduction accomplished by phasing out current GE crops. Consequently, the transition away from GE crops will be accompanied by a phase-out of neonicotinoid use on county property over the next 5 years.

To implement the GE transition effectively, this policy includes several additional components to protect the viability of agriculture in Boulder County during and after its implementation:

- 1. Assist tenants with GE leases. While the transition policy lays out specific guidelines for curtailing GE crop planting over the next 3-5 years that will apply uniformly to all tenants, each tenant's situation is unique. Consequently, BCPOS staff will work with each tenant to determine the financial implications of this transition (e.g., farm viability, lender support, crop loss, etc.) and identify a variety of tools and incentives to help minimize the potential economic impact and make tenants whole. This effort includes, but may not be limited to, assisting in the development of new farm operating plans that are GE-free, identifying and promoting training opportunities and best management practices, and developing incentives for GE crop acreage reductions that occur before deadlines. Also, if tenants choose not to renew leases that have had GE crops within the last two years, BCPOS will work to purchase irrigation equipment that should stay on county agricultural properties.
- 2. Support agriculture in Boulder County. Another feature of this policy is to continue and expand delivery of programs that support agricultural viability in Boulder County by providing transitioning tenants with alternative agricultural opportunities. Specifically, staff will continue to research and develop value-added products and new markets, deliver county capital improvement programs for irrigation infrastructure and other facility improvements, and offer organic incentives by staffing an organic weed crew, reducing rent during organic transitions, and introducing a new staff position to assist with organic certification.
- 3. Enhance data collection and monitoring. During the hearings on this topic earlier in 2016, some of the public expressed concerns that the county wasn't capturing or sharing important agricultural land and resource information. Since the adoption of the Cropland Policy in 2011, BCPOS staff has tracked acreage in GE and organic cropping systems as well as detailed revenue and costs for crop share leases. BCPOS has also monitored key natural resource characteristics on farm properties, including soil health and fertility, water quality/quantity, and the presence of pollinators and pesticide residues. However, the department recognizes that this program can be improved upon and be more effective by engaging additional technical review and support. We are committed to thoroughly reviewing our existing data collection and monitoring efforts and adopting new metrics and protocols that will capture and deliver more relevant information to both tenants and the public.
- 4. <u>Launch a new sustainable agriculture research initiative.</u> Staff proposed creating the Boulder County Sustainable Agriculture Research and Innovation Initiative to explore key questions to help sustain Boulder County agriculture and advance our goal to be a national leader in sustainable agriculture. Research will investigate questions related to local agricultural production (including GE crops) that balances environmental sensitivity (e.g., carbon sequestration, water conservation, decreased pesticide use, etc.) with farm economics. BCPOS

and CSU Extension in Boulder County will develop and coordinate this research initiative in close cooperation with a variety of partner agencies (including Boulder County's Sustainability Office), organizations, and stakeholders in a collaborative and transparent manner. This project is envisioned to include research and demonstration plots that can be used to inform local agricultural practices to increase their sustainability metrics and economic viability, and explore new crop opportunities. While BCPOS is positioned to provide land/water resources and limited staff time to support this initiative, Boulder County will release an RFP that solicits institutional partners that can effectively collaborate with the county to launch and advance this ambitious research initiative.

5. Annual Public Hearing and Review of Transition Policy progress. Beginning in January 2018, BCPOS will produce an annual report on its progress to implement the GE Transition Policy. A public hearing will be scheduled with the BOCC for review of the report and of the progress of the transition policy to date. This review will include updates on the existing acreage totals in GE crops; any changes to leases with GE crops; most recent environmental and soil health monitoring data; progress of the Research Initiative; county, tenant, and stakeholder efforts to support agriculture; and an economic summary of the "state of agriculture" within BCPOS. Based upon each review, the BOCC may choose to make adjustments to the Transition Policy.

#### Conclusion

Staff views this policy as the starting point in the transition away from GE crops. Our immediate focus will be on implementing this policy in the most just and fair manner possible. We will work diligently with affected tenants in hopes that they remain our trusted stewards of these lands and continue our agricultural heritage in this county. BCPOS staff believes that there is broad community support for our agricultural program. Staff and our tenants understand the critical importance of conserving soil and water resources. Indeed, a number of our tenants come from families that have farmed in this area for generations and have conserved their lands permanently through conservation easements. We also appreciate the interest the citizens of Boulder County take in public land agriculture and their concern for its impacts on natural resources. This transition policy acknowledges all of these perspectives and continues our efforts to keep agriculture sustainable in Boulder County.