



APPENDIX D – SUSTAINABILITY



SUSTAINABILITY

The Sustainable Master Plan Pilot Program was introduced by the FAA in 2010. The program was initiated to enhance sustainability as a core objective to airports throughout the country. Ten airports were chosen to partake in the Pilot Program; however, airports such as EGE voluntarily implemented “sustainability” into the update of their Master Plan.

Sustainability can be defined as “*the ability to meet the needs of the present without compromising the ability of future generations to meet their own needs*”. For the purpose of this Master Plan, sustainability is the ideas, actions and processes implemented to reduce the overall impact the airport has on the local, regional, and total environment. The economic benefits and consequences of the sustainable initiatives are of most importance to the airport and will be considered. The following sections describe local sustainability initiatives and recommendations for the airport to pursue in the future.

LOCAL SUSTAINABILITY PROGRAMS

Eagle County

Eagle County actively participates and fosters sustainability through their Sustainable Communities initiative. The County defines Sustainable Community as “a community which fosters economic opportunity and social capital while protecting and restoring the natural environmental upon which people and economies depend”.¹ As part of this initiative, the County developed a vision and mission statement:

Vision

Eagle County holds the preservation and enhancement of the natural environment as a top priority to ensure the health, safety, welfare, and economic well-being of its citizens.²

Mission

Eagle County will be a leader among mountain communities through innovative sustainability initiatives. We are committed to continuously improving our environmental performance by reducing greenhouse gas emissions; preventing pollution; promoting clean, renewable energy; and by conducting periodic internal audits and management reviews of our environmental objectives and targets to assure our actions are consistent with our policies and beyond compliance with all applicable environmental regulations.

¹ Eagle County, <http://www.eaglecounty.us/Sustainable/Overview/>, Accessed March 29, 2013

² Eagle County, <http://www.eaglecounty.us/Sustainable/Overview/>, Accessed March 29, 2013



Our goal is to reduce communitywide greenhouse gases by 2020 to demonstrate cost savings, job creation, and economic development realized through energy efficiency and renewable energy.³

To ensure success of the Sustainable Communities program and complete buy-in, staff members from various departments work directly with the program. The participating departments include Environmental Health, Planning, Housing and Development, ECO Trails, ECO Transit, Solid Waste and Recycling, and Facilities Management.

The Sustainable Communities initiative has six primary areas of focus:

Natural Environment

Currently, state, federal and local governments own over 80 percent of the land in Eagle County. There are three basic categories of open space within Eagle County: public lands, privately held open space within developed areas, and open space that has been set aside through the work of a land trust or the county's open space program.⁴

Built Environment

The Built Environment component of the Sustainable Communities has four elements, Energy Smart, Eco-Build, Rebates and Incentives, and Sustainable Communities Index. The Energy Smart program was created to address barriers to making energy efficiency improvements, which includes access to information, financing and a skilled workforce. The Eco-Build program is a set of new regulations adopted by the County to promote energy and material efficient building design and construction practices. Through the Rebates and Incentives program, the County encourages the use of five programs; ECO-Build Community Grant program, Source Gas Insulation Rebates, Xcel Energy Insulation Rebate, Recharge Colorado, and Holy Cross Appliance Rebates. Finally, the County adopted the Sustainable Community Index as a tool to help review the sustainability of new development applications. Together these four programs promote sustainable development; and therefore, a sustainable future for Eagle County.⁵

Conservation

Eagle County encourages material and energy conservation as the most effective means of reducing human consumption of natural resources. For recycling, the Recycled Materials Recovery Facility (MRF) began operations in January 2010. This

³ Eagle County, <http://www.eaglecounty.us/Sustainable/Overview/>, Accessed March 29, 2013

⁴ Eagle County, http://www.eaglecounty.us/Sustainable/Natural_Environment/, Accessed March 29, 2013

⁵ Eagle County, http://www.eaglecounty.us/Sustainable/Built_Environment/, Accessed March 29, 2013



facility is designed to process for market the recycled materials collected in the county and adjoining jurisdictions. For conservation of energy, Eagle County has reduced energy use in its buildings starting with reduction measures in 2007 through performance contracting and energy efficient retrofits.⁶

Transportation

Eagle County is participating in a Transportation Collaborative, which consists of a group of forward thinking representative from throughout the county, the towns and special interest groups. Together the group is working to identify current and future transportation issues as well as propose and implement solutions.⁷

Economic Development

The Eagle County Government has partnered with the Economic Council of Eagle County to help promote long term economic health for the County. The Council focuses on countywide retention of workforce and recruitment of sustainable new business.⁸

Creating Community

Governing decisions in Eagle County reflect the core values of its citizens, utilize input from a broad cross section of the community, and involve intergovernmental cooperation wherever appropriate.⁹ The community values are:

- Eagle County epitomizes economic sustainability, and is a place where decision making balances the environmental, economic, and social needs of its residents.
- Eagle County is a place where residents and visitors can engage in active, healthy lifestyles.
- Eagle County provides abundant opportunities and locations for residents and visitors to reflect, dream, and renew.
- Eagle County is a healthy place for families to live and grow.
- Eagle County embodies the pristine natural settings and ecosystems of the Central Rocky Mountains, which its residents and visitors cherish and strive to protect.
- Eagle County is a place where natural ecosystems are preserved and maintained in order to assure the health and well-being of local wildlife populations.
- Eagle County honors the western tradition of freedom and acceptance of a diversity of people, beliefs, activities, and entrepreneurial endeavors.

⁶ Eagle County, <http://www.eaglecounty.us/Sustainable/Conservation/Overview/>, Accessed March 29, 2013

⁷ Eagle County, <http://www.eaglecounty.us/Sustainable/Transportation/Overview/>, Accessed March 29, 2013

⁸ Eagle County, http://www.eaglecounty.us/Sustainable/Economic_Development/, Accessed March 29, 2013

⁹ Eagle County, http://www.eaglecounty.us/Sustainable/Creating_Community/Overview/, Accessed March 29, 2013



- Eagle County fosters a healthy and diverse economic base that functions in accordance with the social and environmental characteristics of the valley.

Town of Eagle

The Town of Eagle promotes and participates in a variety of sustainable initiatives both on a local and state level. Sustainability efforts include rebates and incentives, recycling programs, energy conservation efforts, water conservation efforts, and the green bike project¹⁰.

Rebates and incentives are offered locally and with the state through a variety of sources. Holy Cross Energy, a Glenwood Springs based electrical company offers rebates to customers for use of renewable energy and solar thermal, the purchase of Energy Star appliances, and provides free energy audits. SourceGas, a nationwide company that provides natural gas service to the Eagle region, offers various incentives for the use of numerous energy efficient appliances to include but not limited to: furnaces, boilers, water heaters, programmable thermostats, insulations, infiltration measures, and infrared heating. SourceGas also provides, for a fee, professional energy audits. In addition to the private company incentives, Eagle County offers incentives for solar PV (photovoltaic) and solar thermal use.

The Town of Eagle offers two recycling options for the local community. Residents are offered curbside recycling pick-up services if they live in single-family or small multi-family homes. Business and large housing complex residents are offered the option to use the drop-off center at the Fairgrounds Park, or can contract pick-up with one of the local haulers.

To ensure water conservation is practiced throughout Eagle, the Town has enacted a mandatory water conservation ordinance. The ordinance includes:

- Watering allowed between April 15th and October 15th only
- Watering limited to three days per week
- Water prohibited between 10 a.m. and 5 p.m.
- Wasting water is prohibited
- Dry years will have additional restrictions.

The Green Bike project is a free bike sharing program enacted by the Town for residents and visitors of Eagle. Bikes are free to adults for day-use and are intended to reduce automobile use for short distance travel.

SUSTAINABILITY RECOMMENDATIONS

This Master Plan evaluates existing facilities and future development projects with many considerations in mind. As discussed in **Chapter 5.0**, sustainability was one of the primary factors evaluated when determining proposed projects; however, sustainability can also be incorporated

¹⁰ Town of Eagle, <http://www.townofeagle.org/index.aspx?NID=254>, June 2011



at the airport through means outside of physical development and construction. The following list highlights a few broad recommendations the airport can start to implement to improve their overall sustainability.

- As discussed previously, Eagle County and the City of Eagle are aggressively pursuing sustainable practices and programs. The Airport should, to the extent possible, participate in these programs and be actively involved in the development of local initiatives to help design programs that can include aviation and airport activity.
- The Airport should move forward with the development of a Sustainability Management Plan for the Airport. The FAA is an advocate of sustainability and promotes the development of Sustainable Management Plans for airports throughout the nation. A Sustainable Management Plan differs from a Sustainable Master Plan as it is a standalone document that uses baseline assessment of environmental resources and community outreach to identify sustainability objectives that will reduce environmental impacts, realize economic benefits, and improve community relations.¹¹
- The Airport should implement policies at EGE that encourage the use of sustainable methods and best management practices among a number of sustainability categories to include:

Energy (efficiency and renewable energy) – Pursue measures and actions that reduce energy consumption associated with building operations, airfield lighting, and equipment and vehicle use.

Greenhouse Gases and Climate Adaptation (inventory and resilience plan) – An initial inventory of greenhouse gasses will show airports where reductions may be made. Sustainability planning will include climate adaptation strategies to conserve the airports infrastructure.

Water (conservation and storm-water) – Implement methods that improve water use efficiency in airport buildings and landscaping. Establish techniques to protect water quality during airport operations and construction.

Materials (procurement and waste reduction) – Establish programs to purchase environmentally preferred materials (considering cost and composition). Airport waste should be re-purposed if possible or recycled when feasible.

Financial Self Sufficiency – Strive to achieve sustainable revenue and operational cost savings.

Air Quality, Noise and Emissions – Develop strategies to protect the air quality and reduce noise in airport influenced areas. Additionally, air quality and noise impacts should be evaluated in airport buildings and on airport grounds.

¹¹ Federal Aviation Administration, <http://www.faa.gov/airports/environmental/sustainability/>, Accessed March 29, 2013



Land and Natural Resources – Active management of land and natural resource to comply with State and Federal requirements and conservation practices.

Communities and Connectivity – Strive to be good neighbors to the local communities through continuous communication and active participation with local airport stakeholders.

Systems Performance and Reporting – Require that each sustainability category has at least one sustainability metric to allow performance review and improvement reporting.

- The Airport should encourage tenants to implement sustainable methods and best management practices on a voluntary basis.
- The Airport should regularly communicate all significant projects with potentially affected community interests and seek input on incorporating sustainable design.
- The Airport should encourage innovation in the design of projects in order to incorporate sustainable methods and energy efficient design elements.