

Land and Energy in Kentucky: Twin Conservation Challenges

Annual Meeting of the Kentucky Conservation Committee
Held October 17, 2009
The Green Building, Louisville, KY

MEETING REPORT EXECUTIVE SUMMARY



Post card, circa 1915, Lock 7, Highbridge, Kentucky

In March 2007 the site became the first Kentucky hydropower project to be certified as low impact

February 9, 2010



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PO Box 1152
Frankfort, KY 40601

Meeting Agenda

Meeting Chairs: Dr. David Wicks and Russell Barnett

Panel One: Land Stewardship and Conservation (Dr. William Martin, Chair)

Frances Brown, Kentucky PACE (Purchase of Conservation Easements)

Robert H. Marrett, Kentucky Home Builder's Association

Dr. Greg Kuhns, Kentucky Woodland Owners Association

K.A. Owens, Kentuckians for the Commonwealth

Panel Two: Pursuing a Sustainable Energy Future for Kentucky (Andy McDonald, Chair)

Pat Flowers, Kentucky Housing Corporation Weatherization Program

Robert Ukeiley, Law Office of Robert Ukeiley

Andy McDonald, Kentucky Solar Partnership/ASPI

Jason Bailey, Mountain Association for Community Economic Development

Keynote: The Kentucky Legislative Environmental Caucus

Representative Joni L. Jenkins, House District 4

Representative Mary Lou Marzian, House District 34

2010 KCC Legislative Priorities (Bruce Williams, Moderator)

Kentucky Conservation Committee Board of Directors, 2009-2010

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The mission of the KCC is to work for sustainable use of renewable natural resources, prudent use of non-renewable resources, conservation and preservation of critical and unique areas, and a healthful environment for all Kentuckians. The KCC accomplishes this mission by working with a coalition of environmental organizations and individuals to influence public environmental policy and legislation. See: <http://www.kyconservation.org>

Cover Picture: Lock 7, originally constructed in 1896-97 of timber and rockfill and covered in concrete in 1914. A hydroelectric power plant was added to the dam in 1927 and last year produced 9,100 MW hours of clean energy. The site is located in the Kentucky Palisades, a 100-mile ecological corridor that contains a high concentration of rare plant species, endangered species and six state nature preserves.

I. Introduction

The 2009 Annual Meeting of the Kentucky Conservation Committee (KCC) was held October 17th at the Green Building in Louisville, Kentucky. The meeting addressed two key issues for Kentucky: land stewardship and conservation (the theme of the 2008 KCC Annual Meeting), and sustainable energy futures.

Since the 2008 meeting, the Governor's Land Stewardship and Conservation Task Force has met several times to develop a statewide plan. Current proposals are to establish a Land Stewardship and Conservation Fund and a tentative recommendation of an increase of 1/8% sales tax increase through a constitutional amendment. Legislation to establish a Fund and the method to administer the Fund will be proposed in the 2010 legislative session with the funding mechanism proposed for 2011. In addition, Representatives Joni Jenkins and Mary Lou Marzian discussed the formation of an *Environmental Caucus*, a mechanism for legislators to coordinate and set priorities in order to address environmental issues in a single voice.

At the KCC meeting, participants reiterated many of the underlying issues affecting land use in Kentucky, including the fragmentation of land ownership and the rapid pace of land loss to development. Speakers discussed the need for funding, and the utility of a single funding source to support efforts such as PACE (Purchase of Agriculture Conservation Easements) which seeks to conserve agricultural lands. Participants discussed how other states have dealt with regulatory and funding issues (i.e. taxes, tax relief, tariffs, easements), scientific planning (i.e. forest health), and other planning issues. Some of these issues are addressed within the umbrella of the Task Force while others require separate, additional, ongoing efforts.

On the energy panel, participants addressed the critical priority for Kentucky to choose a sustainable energy path based on energy efficiency and renewable energies. On the demand side, speakers emphasized the great potential for efficiency gains in all areas including the residential, public, commercial, and industrial sectors. On the supply side, speakers specifically noted the significant potentials to employ wind and solar energy in Kentucky. Nationwide, Renewable Portfolio Standards are a popular mechanism for expanding the use of renewable energies. In recent years, Production Based Incentives (aka Feed-In Tariffs) have begun to generate great interest and have important advantages compared to other renewable energy policy options. In addition, legislation on performance standards to increase the energy efficiency of public buildings has recently been successfully developed for Kentucky.

II. Key Messages

Land Stewardship and Conservation

Background on the issue of land stewardship and conservation in Kentucky is addressed in the KCC report from the 2008 Annual Meeting. The following key themes and recommendations emerged from the meeting participants and panelists at this year's meeting:

- **This is the moment to focus on land stewardship and conservation in Kentucky.** We are at a critical point in conserving Kentucky's lands. There is a rapid conversion of lands coupled with unprecedented political momentum. This is the moment to put our energy into this important conservation effort.
- **Progress has been made since the 2008 KCC Annual Meeting.** The LRC Task Force has made progress in developing legislation for a state-wide land stewardship and conservation program.
- **Identifying and dedicating a sustained, substantial source of funding will be crucial for the success of the state-wide program.** Securing funding will determine the ability of the envisioned program to fulfill its objectives; public education and information can assist with this step. This funding should be adequate to meet objectives and sustained over long-term.
- **We should not forget about other needs or possible initiatives outside the scope of the LRC Task Force.** Some land conservation needs are ongoing or exist outside of the scope of the Task Force. We should focus on assisting woodland owners to implement sustainable management of their lands, promote equitable tax incentives and remove disincentives, assist with trespassing, arson and timber theft, address forest health threats, and conduct new education and outreach programs.

The KCC applauds the progress made on this issue during 2009 and will remain in the forefront of efforts to progress this issue. Land stewardship and conservation remains a key legislative priority of KCC. Legislation to establish and administer a dedicated

Fund will be proposed in the 2010 legislation session with the funding mechanism presented in the 2011 session.

Sustainable Energy Futures

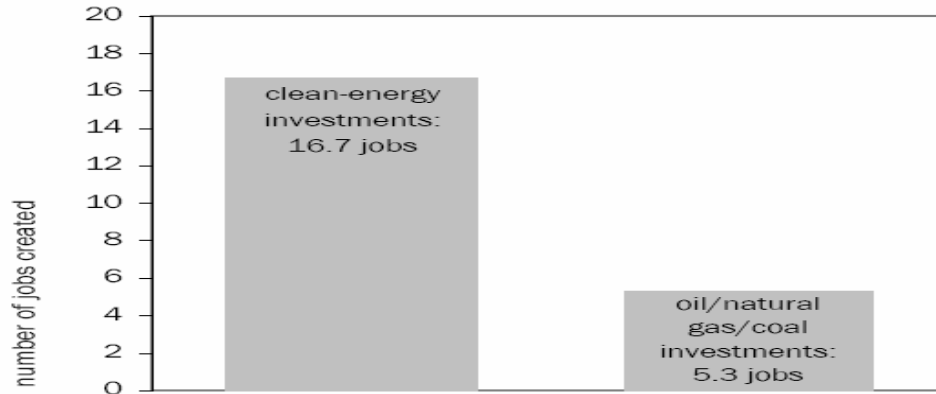
The following key themes and recommendations emerged from the energy panel at the Annual Meeting:

- **Kentucky can significantly improve energy efficiency in all sectors.** In Kentucky, “cheap” coal-fired electrical energy has resulted in low electric rates but high consumption and has served as a disincentive to improve efficiency in households and commercial and industrial facilities (Jevons Paradox). Focused investments in energy efficiency and conservation across all sectors could result in significant long-term reductions in demand. Improving efficiency is the cheapest, quickest way to meet future energy demands. Over the last 40 years, 77% of energy demand has been met through energy efficiency (and the remaining 23% met via increasing energy supply).
- **Weatherization measures can assist the neediest citizens.** Weatherization measures – including insulation, and replacement and repair of lighting and heating systems – provide critical assistance to thousands of Kentucky families and reduce energy demand in a cost-effective way. Expansion of weatherization programs could benefit thousands of Kentucky families. Such an effort would have multiple benefits, cost-effectively reducing demand while creating jobs across the state.
- **Kentucky can choose a long-term sustainable energy path that will have multiple benefits.** energy sources are mature and suitable for Kentucky and can form an increasing part of our energy supply portfolio. Renewable energy will diversify Kentucky’s energy supply, create investment incentives, promote local job creation, increase energy security and reduce pollutants both locally and globally.
- **There are a host of mature renewable energy technologies that are ready for deployment in Kentucky, with the potential to contribute significantly to our energy supply.** Thousands of megawatts of power could be developed over the next decade from low-impact biomass, solar (solar PV and solar thermal), low-impact hydroelectric, and wind. Over the long term the potential is even greater. Many technologies are currently available and are being deployed in other states. The KCC estimates that renewable energies could represent 15-20% of Kentucky’s electricity

generation by 2025 given the right policies and incentives. Wind has been thought of as a marginal resource for Kentucky, but due to improved technologies, wind potential may be significantly greater than previously thought.

- **Renewable technologies require policy interventions in the short-term to become financially feasible.** Over time, renewable energy will become less costly due to expansion of the renewable sector, advances in technology, and economies of scale.
- **Kentucky would benefit from mandated portfolio standard measures and market incentives for renewable energy resources.** The Kentucky Conservation Committee endorses the policy agenda of the Kentucky Sustainable Energy Alliance (KySEA) which includes a Renewable and Efficiency Portfolio Standard, and a Production-Based Incentive (aka Feed-In Tariff). The KCC has taken the lead on the Production-Based Incentive with the development of a white paper.
- **Current legislative efforts are focused on coal liquefaction and gasification by 2025 as well as exploration of nuclear potentials, but these would take investment away from renewable technologies and are not beneficial to health or the environment.** The Governor's energy plan has a strong focus on coal to liquid and gas conversion for meeting future energy demands. However, this perpetuates environmental problems and takes money away from other investments. The additional mining would further environmental degradation of the state, short circuit long-term economic viability of Kentucky's non-renewable coal resources, and increase our greenhouse gas emissions. In a time of limited financial resources, pursuing coal to gas or nuclear power would deny resources to renewable energy and energy efficiency.

FIGURE 1. JOB CREATION THROUGH \$1 MILLION IN SPENDING:
CLEAN-ENERGY INVESTMENTS VERSUS FOSSIL FUELS



Source: U.S. Commerce Department input-output tables and IMPLAN
Note: Employment estimates include direct, indirect and induced jobs. Details of calculations presented in the technical appendix.

III. Next Steps

In November 2008, Governor Beshear unveiled an energy plan for Kentucky that outlined strategies for Kentucky’s energy future. This included important measures for increasing energy efficiency and conservation and expanding the renewable energy industries. However, the centerpiece of the plan is for the state government to help create a new industry that would convert coal into liquid fuels for vehicles. The plan calls for a coal-to-liquid (CTL) industry to replace all of the gasoline and diesel fuel that Kentucky uses. To feed these new CTL plants, the amount of coal mined would need to increase by about 45%.

The plan also relies heavily on expansion of nuclear energy, which requires enormous investments to implement, complex technology to sustain, and public acceptance, esthetic and health-related, including the possibility, albeit remote, of regional catastrophe.

There is a far better strategy that builds on the tremendous economic potential of improving energy efficiency and developing renewable energy resources. We can put thousands of people to work weatherizing homes, designing and building super-efficient new structures, retrofitting commercial and public buildings, retooling industrial processes, installing renewable energy generators across the state, and engineering new technology designs.

The Kentucky Conservation Committee envisions an energy path for Kentucky that focuses on energy efficiency and conservation and ambitions development of renewable energy technologies. This would place Kentucky on a technological path competitive with other state and national leaders. The entire population would benefit from energy security and environmental preservation. Studies are showing that more job creation will come from clean energy investments than from any coal investments. Furthermore, there are better options than following the nuclear route, options that are clean, safe and abundant.

These investment decisions can't wait. Our financial resource base is too limited to venture in directions that won't have true long term social, economic, health, and environmental benefits to the people of this state. Kentucky needs to re-prioritize its energy strategies today.



The Green Building, Louisville, Kentucky

The award winning Green Building opened in the Fall of 2008 in the East Market District, the heart of NuLu, Louisville's arts district.

Renovation of the 110 year old masonry structure, a former dry goods store, was commenced by owners Augusta and Gill Holland in spring 2007 when they decided to become the first commercial building in Louisville KY to go for LEED platinum certification (the US Green Building Council's designation of a sustainable building). Intent upon rescuing the building from decades of misuse, the project included resuscitating the structural masonry shell and infusing it with a modern core, including a 40 foot high lobby, expansive natural lighting, eco-friendly materials, and renewable energy systems, as well as extensive solar power, geothermal wells, and recycled denim insulation. The 15,000 square foot mixed use facility houses a street facing café called 732 Social from James Beard nominated Ton Brothers, The Green Building Gallery, event spaces, and an indoor-outdoor courtyard at the rear complete with a green wall vertical garden. The second and third floors house office studios for SonaBLAST! Records, Holland Brown Books and The Group Entertainment.
(<http://www.thegreenbuilding.net/>)

KCC would like to recognize the generosity of Gill and Augusta Holland and their staff, for contributing this venue for our Annual Meeting