

DRAFT

Meeting Highlights: Agri Energy Committee

Tod Griffin, Chair

Capitol Annex, Frankfort Kentucky

3/30/09

The Chair welcomed committee members and guests:

Frank Moore, Director of Biofuels Development, KY Energy & Environment Cabinet

Tom Keene, Hay Specialist, UK College of Agriculture Plant & Soil Sciences

Scott Shearer – Chair, Biosystems and Agricultural Engineering, UK College of Agriculture

Mr. Griffin provided a brief overview of the KAC Strategic Plan and its six goal areas. With respect to the Agri Energy Committee, he suggested that the KAC could potentially play a clearinghouse role related to Agri Energy opportunities across the state. There is a perception of a lot of investment being made in this field, but people don't know what each other is doing. For this reason, Mr. Griffin had invited the guest presenters to provide background information on a range of current agri-energy initiatives underway.

Mr. Moore reviewed a Powerpoint presentation, "Kentucky's 7 Point Strategy for Energy Independence". Access to the presentation can be obtained through the Cabinet's website and a link will be provided for KAC members. Mr. Moore has 30 years experience working in the bio fuels industry, including involvement with one of the first ethanol projects in the U.S. that was initiated by Ashland Oil, Chevron and the Ky Farm Bureau. He stated that because Kentucky is 90% coal-dependent, the goal of reducing our carbon footprint is essential in all initiatives. This has been made more imperative because of the need to address the causes of climate change.

The original thought behind the development of ethanol was that that we would have \$100 / barrel oil by 1990, but that did not occur. However, today the elimination of our dependence on imported oil remains an overarching goal. The "25 x 25" initiative has goals of efficiency gains as well as renewable resources (solar, wind, hydro and biofuels).

Some \$52 million in energy efficiency funding is coming to Kentucky, and oversight of these funds is through his office.

Considerable progress is being made in the production of new sources of bio mass in non-agricultural areas, e.g., miscanathus and switch grass. The assumption that bio mass will all go toward production of liquid fuels is being reevaluated: the ability to use to in production of electricity exists. Control of Stimulus funding for bio mass projects is still based in Washington; this is not the same as the funding mentioned above that is coming to the State. It is in the form of loan guarantees, discretionary projects, demonstration projects. His office is helping to coordinate proposals that would be submitted from Kentucky.

Mr. Moore believes that within official energy circles one does not hear the word "agriculture" enough. There needs to be more focus on moving forward agriculturally-based initiatives within the alternative energy field. In summary, while there is a lot of activity and talk, he is disappointed that more projects are not being initiated and brought forward from within the agricultural sector itself. The projects that have

come forward are being developed by entrepreneurs, not by farmers. Mr. Moore recommends that the KAC should work to get "agriculture" more involved. There is a need to promote direct involvement by farmers, investment by farmers. Cooperative structures should be developed, resources could be pooled, to help bring on line farmer-owned plans with fixed contracts. This is happening in other states, notably the Upper Midwest. He feels Kentucky is missing opportunities to develop "closed co-operatives" (value-added coops).

Mr. Moore briefed the committee on a recent meeting held in Murray, with representatives of a Mississippi Delta initiative that is looking to agriculture as the basis for developing an alternative feedstock for specialty chemicals production. It will require very decentralized logistics and production capabilities. Eight Kentucky Counties have been invited to join this to make it a 5-state initiative, being led by Memphis Ag BioWorks and the Battelle Technology Partnership Practice.

Mr. Griffin asked what is needed from the Kentucky legislature to advance agri-initiatives? Mr. Moore would like to see more emphasis on incentives that "work on the front end" to encourage more projects, probably in the form of some type of equity; this also would help release more federal dollars that are available to fund projects. The current tax credit tools don't do the job because they only provide benefits on the "back end" after a project is operational.

Mr. Griffin asked Mr. Moore to summarize the opportunities for Kentucky. Mr. Moore stated that advanced bio-fuels is a "level playing field"; Kentucky got burned on ethanol, and so lost out to other states. However, Kentucky has such much underutilized pasture land, plus reclaimed coal areas and extensive forests, that can provide the basis for a cellulosic strategy. A goal would be to take 25 % of Kentucky agricultural land and grow bio mass, aim to produce 15 tons per acre. At that level, it could make Kentucky a leader.

Mr. Tom Keene shared a Powerpoint presentation and short video on switchgrass production efforts in Eastern Kentucky, which has blended switchgrass with coal to create a cleaner fuel. They are two years into a 4-year project funded by the Ag Development Board that has involved 20 farmers producing switchgrass. In order to expand beyond experimental plots, the ROI for farmers must be increased compared with growing other crops such as hay, corn, soybeans or alfalfa. It would require \$60 / ton to break even. There remain significant logistics, distance and transportation cost issues.

Scott Maas of the USDA stated that the Crop Assistance Programs from the 2008 Farm Bill would include new provisions that should help promote these kinds of initiatives, but he did not know when they would go into effect.

Dr. Shearer addressed his remarks to "things we can do right now", and addressed directly the goals as stated in the KAC Strategic Plan.

While cellulosic bio mass sources are getting a lot of attention, we have not yet done enough with other sugar-based products, such as sorghum, which may be suitable for Eastern Kentucky. Sorghum requires less fertilizer and water than corn. Also, we must start to address the logistics issues. Bringing enough bio mass (e.g. the switchgrass example) to some production locations would mean "a lot of trucks" going through small rural roads and towns. We need to find ways to reduce the bulk. Put together a business model so that everyone gets their share of the profits, e.g. through steps in the process like contract cutting.

Dr. Shearer also provided information about demonstration projects aimed at improving the energy efficiency of agricultural equipment and processes, e.g. grain drying. USDA funding is available to upgrade dryers.

Ms. Riley asked how the KAC can help to get the word out to more farmers to get them to participate in “energy efficiency investments”? This led to further discussion of educational approaches such as workshops to promote on-farm energy efficiency. Scott Maas noted that a hurdle currently is the need to conduct an “energy audit” in order to apply for federal assistance.

Committee member Tim Huges of the GOAP briefed the Committee on the “On-farm energy efficiency and production program” that has been approved by the Ag Development Board. GOAP is trying to use Stimulus funding as bonus funds matched to existing grants through the County-funded programs. They also are helping address the technical aspect of needing energy audits, and help with grant writing.

Following a break, in part II of the meeting Chairman Griffin reviewed the 3 major agri-energy goals from the KAC plan, in terms of their timelines, what has already been accomplished, and trying to narrow the focus on things that the Committee can most directly affect.

Goal #1: “Develop a successful renewable energy industry in Kentucky, utilizing Kentucky’s agricultural resources”.

Some of the designated Actions have been completed: the “Kentucky 25 x 25 Roadmap”, and initial investments by the Ag Development Board to support agri-energy initiatives. However, it was suggested that the Committee rally around the Action to “Encourage farmer investment in renewable energy production facilities”. At issue may be the need for a “champion” for this issue. Mr. Moore pointed out the lack of a person being devoted full time to focusing on agricultural bio fuels development, based within the agricultural community. There is a lot of activity, but the challenge is coordination.

Committee members agreed that the route to address such issues must be through the Governor’s Policy for Energy Independence, as this is the platform that will go to the General Assembly. Kentucky’s “25 x 25 Roadmap” could be included in the Governor’s 7-point plan. A letter of support from the KAC could be sent to the Governor encouraging the establishment of a position similar (a counterpart) to Mr. Moore’s within the Kentucky Department of Agriculture.

There was discussion of how to get the right message out to farmers: people remember the failures of previous biofuels efforts, and the recent drop in gas prices suggests the investment climate for such initiatives could be weak.

Significant tax credits (incentives) exist that can flow through cooperatives, and this mechanism is being used in other states. But people in Kentucky don’t understand how this works. Scott Maas noted the lack of communication and working together to get the word out to Agricultural producers: he suggested pulling people together so everyone would know what is available. Todd Griffin suggested this may be a role for the Committee, to act as a clearinghouse. Mr. Moore suggested there is a need to “rebrand” the concept of coops.

At the same time, Mr. Keene cautioned that there is no real market yet for bio masses like switchgrass. The issue today is not just a matter of encouraging production; we can't put the cart before the horse.

The Committee discussed Goal #2: "Improve the utilization of byproducts generated through various agricultural and renewable energy production practices. Additional energy saving efficiencies should also be identified at the farm level." There was agreement that the energy audit process could be a focus of the committee's work. For example, the KAC could seek to identify all technical assistance providers in this area.

Considerable progress already is being made through the Ag Development Board to encourage projects that lead to more efficient agricultural byproduct utilization. Note was made of a number of initiatives to address byproduct utilization and energy efficiency, including efforts by U of K, Western Ky University, and USDA. The Committee will need to focus more attention on the Benchmarks in the Strategic Plan to determine further actions that need to be taken and information to be collected.

Goal #3: "Increase access for farmers, consumers and institutional users to a supply of affordable renewable energy throughout the Commonwealth. Farmers should set the example by using biofuels in agricultural production and promoting the use of biofuels".

Committee members noted considerable progress made toward implementation of goal #3, but also a significant unfinished agenda and a need for better data and information to benchmark current efforts.

Mr. Moore noted that "if you don't know where you are and what you're using, you don't know what to promote". He also pointed out that if we promote more bio fuel use in Kentucky today, we are probably promoting the use of another state's product because the production capacity of Kentucky is so low. Better data is critical and we need a baseline to start from: we may be selling more bio fuels and don't know it. We need to know week-to-week and month-to-month market penetration.

Melissa Howell stated a need to focus on transportation fuels, and to involve the Kentucky Petroleum Marketers Association in our work. She also suggested the need to include a representative of the Soybean Producers Association on this committee. Overall, she thinks there is a need for more leadership by State government.

Kentucky is part of the nation's first "Bio Fuels Corridor"; and a listing of the location for biofuel supply exists on the web site of Melissa Howell's group. A Governor's Executive Order exists to encourage bio fuel use in the State fleet, however it is not a mandate.