



Checking in With CenUSA

Sustainable Production and Distribution of Bioenergy for the Central US

CenUSA Bioenergy is a multidisciplinary project funded by the U.S. Department of Agriculture-National Institute of Food and Agriculture (USDA-NIFA Initiative Competitive Grant No. 2011-68005-30411). CenUSA's goal is to research the production and use of perennial grasses on marginal lands for use as alternative biofuels and bioproducts. More information is available at www.cenusa.iastate.edu.

In June 2019, **Tom Shannon**¹, Research Technical Leader at Kimberly-Clark Corps. and a CenUSA Advisory Board member, spoke about his advisory role with CenUSA Communications Intern Tyler Worsham. One of the primary ways in which he advised the project was to point out the need for alternative sources of revenue in addition to bioenergy fuels so that companies can adequately cater to the needs and interests of those who are invested in the success of bioproducts.²

How and why did you join the CenUSA advisory board?

"We came to it by a recommendation from Tom Binder at ADM. Tom was on the advisory board. Tom and I had worked on a couple projects over the years. Tom thought that Kimberly-Clark would be a good addition to it (the advisory board) from the standpoint of our interest in sustainability and bio-based materials."

Could you give a brief description of your professional background?

"I was with General Electric out of grad school. I worked with General Electric at their corporate R&D center in New York. I spent four years there and eight years in operations. Now I've been with Kimberly-Clark for about 20 years."

Have you advised for any other research projects, and if so, what did you do?



Read our White Paper https://cenusa.iastate.edu/files/cenusa_2019_075.pdf

¹ Learn more about Tom Shannon at <https://www.linkedin.com/in/tom-shannon-b522ba23/>

² All of the words and ideas expressed in this interview fairly and accurately represent the speaker. Some quotes may be paraphrased for brevity and clarity. The opinions expressed in herein do not necessarily reflect those of Iowa State University, USDA-NIFA, Purdue University, Ohio State University, USDA-ARS, the University of Minnesota, the University of Nebraska, Lincoln, the University of Vermont, or the University of Wisconsin.

“I’ve advised for a lot of internal research projects, both at General Electric and at Kimberly-Clark, as well as for a number of academic endeavors and joint-development agreements that we may have had with different organizations. I think the challenge is trying to get your stakeholders to understand your point of view and what would be in it for them. I am a strong believer that there are three questions that your stakeholders have that you should be ready to answer. What’s in it for me (the stakeholder)? Why should I care? How much is it going to cost?”

How did your background and previous advisory experience inform your approach on the CenUSA advisory board?

“I think that it all comes back to the number of years of experience learning how to talk with your customers, understanding what’s in it for them, and why it’s important. Coming in to CenUSA, I tried to help people understand that even though everything has been circulating around energy and fuel, a lot of these crops have fiber that is probably more valuable than the fuel.”

How did the project challenge and broaden your professional knowledge and skill set?

“This was totally new for me. It’s the first time I had ever worked with the agricultural industry, so I think there was just a difference in how we approach our stakeholders, how we influence them to see our point of view and how to help it make sense to them. It was a totally different situation, especially when you look at the cooperatives and working with some of those organizations. I worked with the academic side quite a lot, so I’d say that I have quite a bit of experience with that. I would say that working with the agricultural side of things was something with which I did not have any previous experience.”

What specific project objectives do you think directly benefited most from your knowledge and experience?

“They’re talking a lot about looking at platform chemicals outside of their focus on energy, so as you start reading some of the CenUSA material, it’s starting to look outside of cellulosic ethanol to how else we can use some of these products for things that might be more profitable. I think that’s a big part of it, getting them to look in different directions outside of energy.”

How was the advisory board as a whole able to influence the direction of the project? Put another way, what do you think came out of CenUSA because of the advisory board that otherwise might not have happened had the advisory board not existed?

“It all comes back to commercialization in my mind. That’s the success of these efforts, when you get something that actually goes commercial and produces products of value. I think that’s the advisory board representing customers. I think it clearly directed the researchers to not only answer the academic and scientific questions, but the questions about the supply chain, how you create value and how you get people interested in that so farmers will want to grow this. I think a big part of the advisory role was to ask honestly about the interest of the customer and how we address issues surrounding cost and risk. Those are big questions that often get overlooked in academic exercises for the sake of the science.”

If you could distill it down to one thing, what do you think was the most important contribution that the CenUSA advisory board made to the overall project?

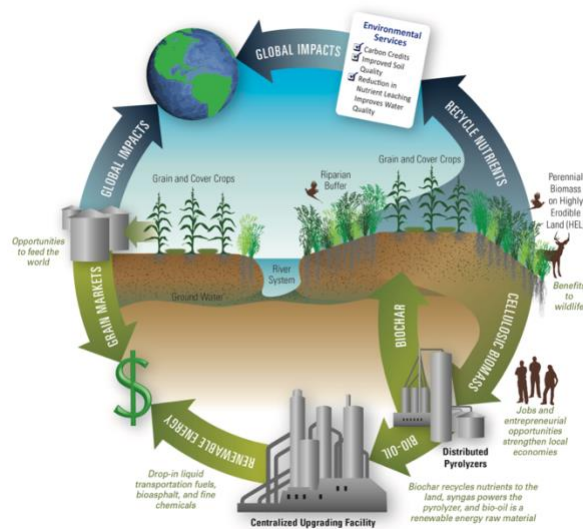
“I would say it’s providing the voice of the customer, the commercialization and making it a reality.”

What do you hope will come of CenUSA?

“I would hope that what comes out of this is that we do start to see a conversion of a lot of this biomass that is grown in the United States and throughout the world into useful products so that we can reduce our dependence on petroleum. We are going to eventually run out of petroleum. I don’t think anyone disagrees with that. The question is when. That’s the bigger question. I hope we start to see some actual commercial operations using biomass to create products that are successful from an economic standpoint.”

“We need to understand how to work with different people, people from agriculture, for example. We had no experience with that. Kimberly-Clark is constantly looking for new sources of raw materials, and perhaps those raw materials could come from agricultural resources. I think we will find many more material solutions in agriculture as we start to shift towards a bio-based economy. From my own personal perspective, I think it really helped to learn how to interact with agricultural interests that are necessary to develop supply chains for bio-based products.”

How might you take your experience with CenUSA and apply it to future work?



CenUSA Bioenergy Vision

Learn more about CenUSA at www.cenusa.iastate.edu

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