

## MY WAY OF THINKING

by Richard Keller,  
editor

# Nitrogen fertilizer products and equipment

Companies have used every opportunity to talk about nitrogen fertilizer supply and grower use in recent weeks. Additionally, rail shipping of anhydrous ammonia as a hazardous material has received considerable attention (see Jim Ruen's article on page 20).

Agrotain International, LLC and parent company Lange-Stegmann held a grand opening celebration for the new, already in operation, St. Louis Urea Center and the separate Stabilized Nitrogen Center. Volume was the key word for both facilities as Lange-Stegmann established the largest intercontinental shipping point for urea and its modern manufacturing plant for Super U stabilized agricultural nitrogen fertilizer.

A total of 125,000 tons of stabilized nitrogen products can be produced each year, and approximately 1 million tons of urea fertilizers can be shipped through the center annually, most of it going out on unit trains. An 80-car unit train can be loaded in 24 hours, and this quick turnaround amounts to rail cars being routed in and out faster, which can translate into rail cost savings of about \$10 per ton.

Dow AgroSciences announced its new Instinct nitrogen stabilizer product designed for use with urea ammonium nitrate (UAN) as a stable mate to N-Serve nitrogen stabilizer. Instinct is yet to receive full registration, but it is anticipated before the end of the year. The main point of emphasis with Instinct is that UAN, with or without pesticides included, can be surface applied and remain stable for up to 10 days waiting for rain or mechanical incorporation.

Then there has been Mosaic USA Inc. explaining that N alone doesn't make a crop. "The temptation is to cut back on P and K and keep the N up, but there are risks," Dan Froehlich, Ph.D., Mosaic USA agronomy manager, has told audiences. Crop production will be "more efficient by keeping nutrients in

balance," he said at the Farm Progress Show. He said ag retailers should recommend a grower cut back equally or in balance to keep as much yield potential as possible if a grower is in a pinch to afford applying optimal fertilizer applications.

During the only remaining U.S. outdoor equipment show specifically targeting ag retailers—the MAGIE show—equipment manufacturers showed off their best and newest, especially in fertilizer application equipment. John Deere conducted a special media event to introduce a full line-up of nutrient management and nitrogen application equipment. The new line of 2510 nutrient applicators, and specifically the 2510H for high-speed (10 miles per hour) anhydrous ammonia application, has a fit for ag retailers.

"These field speeds enable productivity rates approaching 40 acres per hour," explained Dave Wendt, John Deere product manager. "This level of productivity translates to 20 to 50 percent more revenue generated per hour than a similarly sized conventional applicator."

And since the retailer is going to have that tractor for pulling the ammonia applicator, John Deere suggested hitching it to the new DN345 Drawn Dry Box Spinner Spreader that can be equipped with a two compartment bin with total fertilizer load-carrying capacity of more than 14 tons.

Also thrown at us has been all the university and liquid fertilizer company data suggesting advantages to split applications of N coupled with optical reflectance sensors. The measuring of crop light reflectance in-season allows estimating the N needs of crops. Variable rate application is now common place with high-clearance retailer equipment, and the equipment earns additional return on costs when paired with optical sensor technology.

All in all, nitrogen supply, nutrient management and fertilizer application have been the hot topics and will continue to be for the foreseeable future. **AG**

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