

Slipping Rita's Punch

New Harpin technology helps avert crop losses



Fred Uhiren, Carlisle, Ark.

Last summer, when Fred Uhiren, his neighbors and even his banker, looked out over his 157 acres of beautiful CL131 seed rice, they saw an exciting difference and looked forward to how it would cut and mill. Little did they know that two “ladies” named Katrina and Rita would have their own plans for Arkansas rice, and it wouldn’t be pretty.

Uhiren, who farms near Carlisle, Ark., produces high-end seed rice like CL 131 and CL 161 as well as wheat and soybean seed for Stratton Seed Co.

Uhiren likes to try new technologies, and late last winter he saw a report about the registration of ProAct plant health regulator with Harp-N-Tek (Harpin protein) technology. The Harpin protein in ProAct links to receptors that rice plants have developed as a kind of early warning system that disease pathogens are attacking. The plant turns on its self-defense and growth systems and the result is improved vigor, stamina, nutrient uptake and reproductive growth.

Field matured earlier

The report said that commercial trials had shown an investment of about \$3 per acre at the 1/2-ounce rate returned an average six bushels in increased yield. Uhiren thought that seemed worth looking into.

“Spring was cold and dry, so I waited and put the ProAct on with my last herbicide spray,” Uhiren says. “This has always been a pretty good field, but I felt it could do more and maybe ProAct would make that happen. And it did.”

“The plants were healthier overall, the root systems were stronger, they stood up more leaves, the fill came on faster and better, the panicle weight was heavier. We all marveled at how good that field looked. Even my banker was excited.”

While all the farmers in that area planted their rice about the same time, Uhiren says he could see that the ProAct field was maturing a couple of weeks earlier than expected. And just those few days made a big difference in the season’s outcome.

“We’d been in drought conditions, and the rice withstood the stress, so I drained the fields earlier,” he says. “When I cut some samples, the rice was soon ready. I was able to get my rice harvested a couple of weeks earlier than usual – right before the backlash from Rita came through here and laid everybody else’s rice down and flooded the fields. There was a tremendous amount of crop loss around here.”

Yield and milling results

Getting his rice out ahead of the storms was one good break for Uhiren. But not the only one.

“When I saw the yield and milling results, I was really tickled it did so well – about 10 to 15 bushels/acre better than last year and much better than most other farms around here were able to produce because of the storms,” Uhiren says. “I even had a better than average stand on the levies. The dry weight yield of the ProAct-treated CL 131 was 169 bushels/acre. Milling around here was way down, but mine on the 131 was

60/70 (% head rice/% total rice) on one lot and 56/70 on another.”

After harvesting the CL 131, Uhiren was able to quickly move on to cut the CL 161, which was not treated with ProAct. It yielded 157 bu/acre with milling of 61/69 on one lot and 60/69 on another. Both yields are above the 2005 state average for Arkansas, which was 147 bu/acre, according to the University of Arkansas.

But “next year” is what farming is all about when last year was rough. After all, how often can Mid-South rice growers hit the Tri-fecta of Trouble – hurricanes, soaring diesel costs, and sagging rice market prices. With no relief in sight on stubbornly high fuel costs, growers will again look to technology for the edge they need to make it through. ♡

Eden Bioscience contributed information for this article. Visit www.edenbio.com.

All About ProAct

- Plants are better able to withstand stresses, both caused by nature and sometimes by necessary crop management practices.
- May be tankmixed with a wide variety of post-emergence herbicides and with most crop inputs, including insecticides.
- Added to the tank first.
- Not a restricted pesticide: Easy to use, excellent safety profile.