

Rice, February 15, 2002

CLEARFIELD RICE: WATER MANAGEMENT AND ROTATION

Andy Kendig

Extension Weed Specialist

Commercial Agriculture Program

MU Delta Center

Growers need to be aware that there are two important "however"s with respect to the Clearfield/Newpath rice system. The final export approvals came through and growers will be able to use the system this coming year. And the big headline of the system is it's ability to selectively control red rice in your rice.

But, growers should not use this system unless they are willing to practice optimal water management and to rotate away from rice for at least a year. In experiments where we relied on natural rainfall, we have had numerous failures with the Newpath/Clearfield system. We have also had failures when we flushed rice one and two times after planting. Three or four flushings may be needed. The soil doesn't have to be soupy- but don't let it get dry.

Flushing is less popular in Missouri as Murphy's law sometimes sends a 3" rain and a powerful cold front two days after we've flushed with cold well water. If you wish to use the Clearfield system, you need to have optimal water management and flush several times.

It is also best to incorporate the soil application as opposed to applying it after planting. Most research, including ours, gives an edge to incorporation, and this technology needs to be treated right!

After you use the Clearfield rice system, you need to rotate to soybeans. The issue is that Clearfield rice can cross breed and generate Clearfield Red Rice. Monitor the Clearfield rice closely and be sure that your control is as close to 100% as possible- including roguing of red rice escapes. But in any case, the field should not be planted back to Clearfield rice as that will give any Clearfield red rice a chance to spread. Rotation is more important to Clearfield rice than it is to conventional rice. You cannot rotate to conventional rice as Newpath carryover will injure non-Clearfield hybrids while allowing Clearfield-Red Rice hybrids to grow.

Newpath (which is a new name for Pursuit) has poor activity on legume weeds (Hemp sesbania/coffeebean and Jointvetch/Indigo) and you will need to use a broadleaf herbicide somewhere in the program. Oddly, BASF has not pushed for Blazer or Storm to be the coffeebean herbicide. Arkansas folks have suggested propanil tank mixtures. As with all broadleaf and aquatic issues, you have a number of choices to match to your particular problems.

This system has a tremendous potential to improve our red rice situation, but it also has the potential to fail and be ruined if we cut corners. BASF folks would agree- if you won't manage Clearfield properly, you should not use it. Give it a try and give it your best shot. Keep it moist, watch it closely and then bit the bullet and rotate out to beans. Then Clearfield can be an outstanding Red Rice control tool.