

716 SW 2<sup>nd</sup> Street • Corning, AR, 72422 • 870-857-6875 • www.uaex.uada.edu/clay

April 15th, 2021

To: Those involved in Rice Production

**2021 Rice DD50** – This program is designed to assist rice producers, consultants, and Extension personnel with rice crop management in Arkansas. For more details on the DD50 program and how it works, please see the "About DD50" section at <u>dd50.uada.edu</u>. This product was developed by the University of Arkansas System Division of Agriculture and the Arkansas Rice Research and Promotion Board. Today the DD50 program assists growers with 26 management decisions based on growth stage, including herbicide application, critical times to scout and spray for insects and diseases, and N application. Information and predicted dates provided through this program should be used as a guide and do not replace the need for inperson inspection of the crop.

**2021 Rice Management Guide -** The 2021 Rice Management Guide contains the most requested production recommendations for rice in a single, easy-to-reference PDF. This information will also be posted to the Extension rice page (<u>http://uaex.uada.edu/rice</u>). A copy of the guide can be picked up at the Extension office.

**Row Corp Radio Podcasts -** Check out the new podcast episodes by subscribing to Arkansas Row Crops Radio wherever you listen to podcasts.

**Rice Residual Herbicides – Tommy Butts and Tom Barber -** A lot of our focus in rice residual herbicide programs is placed on grass control, especially as barnyardgrass is consistently listed as the most problematic weed across Arkansas rice acres. However, other troublesome weeds like certain broadleaves (dayflower, smartweeds, hemp sesbania, etc.) and sedges can cause headaches for rice growers and consultants. As a result, there have been several questions about moving up some herbicides with residual activity that are typically used POST into our PRE programs.

Herbicides such as Permit, Permit Plus, Gambit, Grasp, Facet, and Sharpen have residual activity, will control broadleaves and sedges, and can be applied both PRE or POST in rice. Based on university research, we tend to recommend saving Permit, Permit Plus, Gambit, and Grasp for POST applications and using Facet and Sharpen in PRE applications. This is for several reasons.

Facet provides us broad-spectrum control of broadleaves, annual sedges, and barnyardgrass, so it acts as a "catch-all" type herbicide which is very important at the beginning of the season in our PRE programs. Additionally, although there are increasing instances of barnyardgrass resistance to Facet POST, it still provides residual PRE activity in most cases.

Sharpen is often recommended as a PRE due to its residual activity on broadleaves (especially Palmer amaranth in row rice) and annual sedges. From a residual standpoint, it may be slightly weaker on broadleaves such as smartweeds, dayflower, or hemp sesbania (coffeebean) than the ALS-inhibitors, but the ability to use 3 fl oz/A PRE versus 1 fl oz/A POST makes it more effective as a PRE to manage these weed species. ALS-inhibitors are much more effective POST on these weed species, and if we move these herbicides into our PRE programs, we may lose them as an option POST due to season-use limitations. For

University of Arkansas, United States Department of Agriculture and County Governments Cooperating

The University of Arkansas System Division of Agriculture offers all its Extension and Research programs and services without regard to race, color, sex, gender identity, sexual orientation, national origin, religion, age, disability, marital or veteran status, genetic information, or any other legally protected status, and is an Affirmative Action/Equal Opportunity Employer.



example, the season limit for Gambit is 2 oz/A. If we use that rate PRE, we no longer can spray Gambit POST for any escapes. Also, from a herbicide resistance standpoint, it is NOT recommended to solely rely on a single herbicide group, so having Sharpen (PPO-inhibitor) PRE followed by an ALS-inhibitor POST gives us sequential levels of control, while also aiding in resistance management.

Sedges continue to climb the list of most problematic weed species in Arkansas rice. Across the state, most populations of annual sedges are now ALS-inhibitor-resistant so having Sharpen or Facet (or Bolero) PRE provides more control than the ALS-inhibitors. With yellow nutsedge, the best options for control are solely the ALS-inhibitors, but again due to season use limitations, it is our recommendation in areas with a heavy infestation to use

League as the PRE residual, and save Permit, Permit Plus, and Gambit for the POST applications to eliminate any escapes.

Overall, there are several options available to successfully manage broadleaves and sedges in rice. For herbicide resistance management and to maximize the effectiveness of each individual herbicide, we recommend using Facet and Sharpen as PRE's, and saving the ALS-inhibiting chemistries for overlapping residual/POST applications.

For most of you, the 2021 season is off to a great start. If you need any information of assistance throughout the season, don't hesitate to give me a call at 870-631-1066.

Sincerely,

Hewart Runsick

Stewart Runsick, County Extension Agent-Staff Chair