Field Notes
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I do not have any pictures this week. The only things we saw worth photographing last week were a couple of repeat subjects that just presented an opportunity to take some better photographs for the files.

We have started harvesting our verification fields while still checking a couple which makes for an interesting schedule. One of the things we do in our verification fields is to take paired moisture samples. One of the samples is a simple grab sample taken from the combine as it unloads. A second sample is taken by hand from standing rice. We simple cut several handfuls of plants, beat the heads into a bucket, remove the largest pieces of debris then measure the moisture. This sample is compared to the grab sample from the combine and represents a common area of the field. Most of the time the sample taken by hand is about 3% lower in moisture than the grab sample taken from the combine. Medium grain rice may run about 3.5%, but we do not have much data on medium grain varieties. Although this is not replicated research we have accumulated enough data to feel fairly confident in the 3% figure. It is not exact by any means; however it does offer a means of estimating whether a field is ready for harvest without having to move a combine.

After doing it in your operation the difference between the hand sample and combine sample may be different from our number. The difference is not as important as the consistency of the difference. In other words, if your hand samples are nearly always 2.5% lower than your combine samples then use that number. If your hand samples range from 2% to 5% lower then that is too inconsistent to trust. Contact your county agent who is turn will contact us if need be to work with you to help you obtain more consistent results.

To express yields among all of the verification fields we adjust all green weights to 12% moisture. We use a simple formula (you can also use charts that do the same thing) to calculate weight loss based on moisture alone. The formula follows:

$$\frac{100 - \text{measured moisture}}{100 - 12} \times \text{green weight} = \text{dry weight}$$

For example: If a load of rice weighs 35,000 lbs green and a moisture test shows 18% moisture, then 100 – 18 = 82. 82 divided by 88 = .93. .93 X 35,000 = 32,614 lbs.

This is **NOT** the same as calculating shrinkage because we do not take into account damaged kernels or foreign matter. Mills and elevators clean a small sample and have to adjust for this in addition to moisture. This means our yields are slightly inflated, but not much unless we have a disaster in a field resulting in high amounts of damaged kernels or foreign matter. So far it has not happened. It does provide a better comparison of fields harvested at different moisture levels.

A lot of interest has been shown in producing a ratoon or second crop this year. This is especially true where a hybrid variety was planted because in general the hybrids have excellent second crop potential which helps to offset the high initial costs associated with planting them. Most of the recommended varieties for Louisiana also have good second crop potential when harvested prior to August 15th. Certainly land and water rental arrangements can influence the return on second crop investment, but most of the time it is worthwhile in the southern part of the state.

Rain associated with the last tropical depression has literally put a damper on second crop prospects. Even if the first crop did not lodge (fall) the wet field surface means harvesting in mud which means rutting up the field. Normally, I would advise a farmer to avoid second crop production in rutted fields. This year the price of rice might make that a different decision. In one of our verification fields I would like to have rolled it as an experiment in smoothing our ruts. Unfortunately, the farmer does not have that capability. I still think we should attempt a second crop. I would not drag a pipe across the field under any circumstances. Rolling or mowing is the only option I would explore with second crop.

Dr. Dustin Harrell continues to investigate the benefits of mowing or rolling first crop stubble to second crop production. So far everyone agrees the crop produced following these practices is more uniform and later than a second crop made with no other modifications following harvest. Yield response has been less consistent with some years realizing a clear benefit and other years no benefit or a decrease in yield.

A few years ago we raised the maximum recommended nitrogen rate as second crop potential in new varieties improved. Research by Dr. Pat Bollich at that time indicated we could improve economic as well as grain yields at higher nitrogen levels if certain criteria were met. Even at the current exorbitant nitrogen prices those recommendations stand.

In our publication, Rice Varieties and Management Tips, it states the following: “Ratoon or second crop should be fertilized with 75-90 pounds of nitrogen per acre when first crop harvest is before August 15. When first crop harvest is after August 15, fertilize with 30-45 pounds of nitrogen per acre. When conditions appear favorable for good second crop production (minimal field rutting, little or no red rice, healthy stubble), apply the higher rate of nitrogen.” More detail continues in that publication. Given the high price of nitrogen I would lean toward the low side of the rates. I would make the decision and fertilize and flood within 5 days of the first crop harvest.

In some areas of Texas they have experimented with phosphorus and potassium fertilization of second crop. We have not been able to demonstrate enough response to recommend this practice at this time. Again, fertilizer prices would suggest this is not the time to experiment.

We continue to try to get our verification fields harvested. We’ll let you know how the yields turn out.