

This season, growers and industry representatives are asked to participate in state-wide wheat trials. Participants are asked to use conventional equipment to establish and harvest the trials, and to record their observations and results. Growers are encouraged to partner with an agribusiness representative, consultant or MSU Extension Educator.

The hope is that several folks will be willing to establish a field trial to measure the effect of fungicide use or increased fertilizer nitrogen rates, or both (see example diagrams on page 2). However, cooperators could also elect to create their own trial to look at one of any number of production inputs or practices.

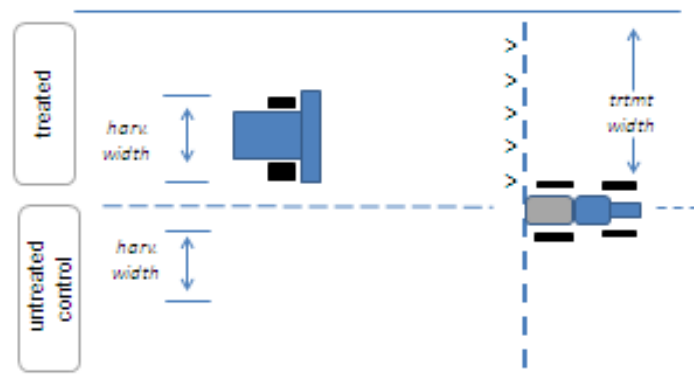
The emphasis needs to be on minimizing the effect of field variability in order to have confidence in the final results. The following are some guidelines to consider when planning your trial:

- 1) the strips should run perpendicular to field tile and, if possible, to usual traffic patterns; avoid field edges and other areas of irregularity;
- 2) the trial length should be at least 500 feet;
- 3) plot (treatment) width is usually defined by the width of the application equipment, whereas the harvest width might simply be defined by the width of the combine head (see illustration below);
- 4) there should be at least three replications (see designs on page 2) and the treatments should be randomized within each replication;
- 5) each strip to be harvested should have the same number of tire tracks (if any);
- 6) often it is best to harvest using a single pass in each strip using a full width of grain head, staying several feet away from the treatment border;
- 7) preferably, the yields should be taken using a weigh wagon or truck scales rather than a yield monitor.

A record-keeping form is provided. It has an area for recording field background, trial details, and harvest results, and a place for drawing the trial's layout.

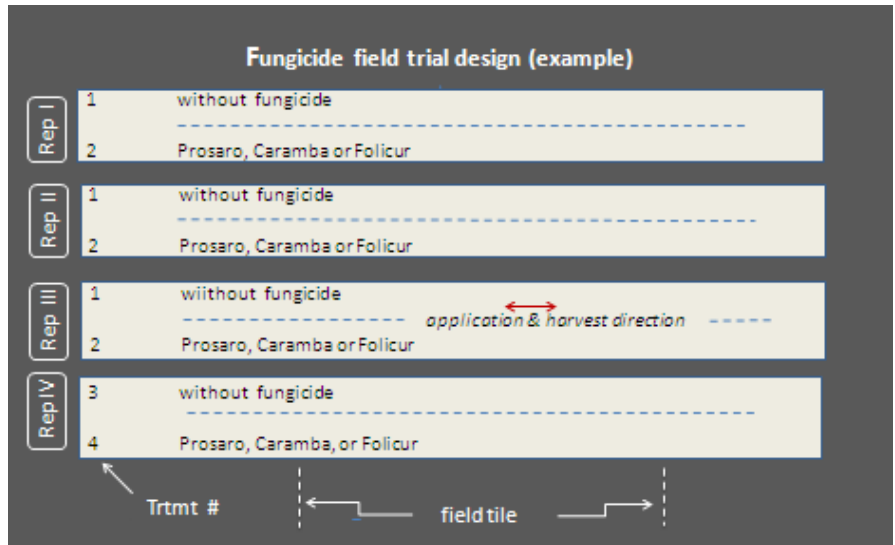
To indicate interest in participating or for more information, contact:

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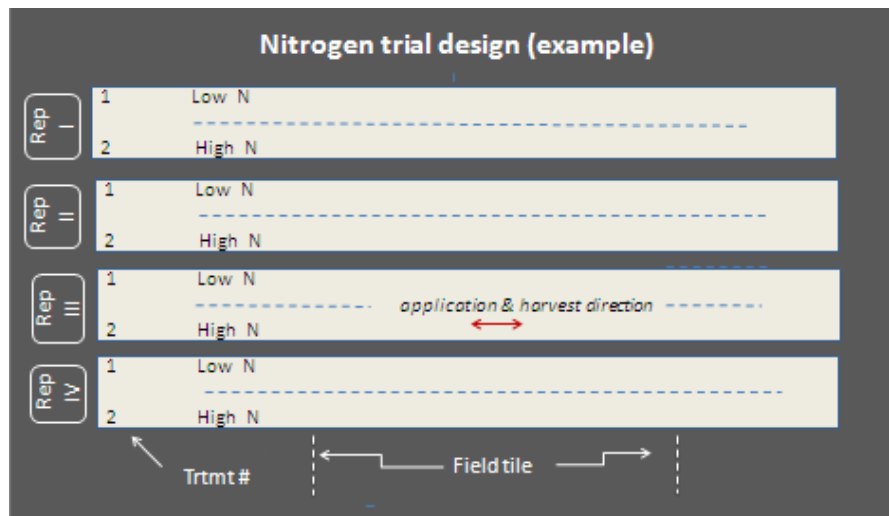
**Fungicide trial** to measure the effect of fungicide use. The treatment strips would be:

- 1) untreated control
- 2) Prosaro, Caramba or Folicur applied at early heading  
*(those choosing to do more could include #3)*
- 3) fungicide applied at tillering followed by the early heading treatment (same as #2).



**Nitrogen rate trial** to measure the effect of increased N rates. It would compare a typical N rate to a rate that provides an additional 20 to 30 lbs/ac. The treatment strips would be:

- 1) low N (typical N rate or 80 to 100 lbs/ac)
- 2) high N (110 to 130 lbs)



**Fungicide & nitrogen rate trial** to measure both nitrogen and fungicide variables in a split-plot design. Treatments:

- 1) low N, w/o fungicide
- 2) low N, Pros., Cara. ....
- 3) high N, w/o fungicide
- 4) high N, Pros., Cara. ....

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