0203-GR-007 Fusarium head blight uniform fungicide trial in Maryland.

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PROJECT ABSTRACT
(1 Page Limit)

Uniform fungicide treatment trials for Fusarium head blight (FHB) management will be established in spring wheat/barley regions and in winter wheat regions of the United States. The Maryland component of the multi-state uniform trial will be conducted on the soft red winter wheat class. A core set of treatments will be tested by a number of cooperators throughout the wheat and barley producing states to allow evaluation of product efficacy and consistency in performance over a wide range of environments and across grain classes. Also because FHB is difficult to ensure in experimental plots, it does not occur every year in every location. Thus having a uniform trial across multiple sites increases the chance of discovery of an effective disease management tool. The core set of treatments will be based on results from previous years, availability of new and existing materials and decided upon by participants at the USWBSI annual meeting. Promising biological control materials have been tested in past trials and may be included individually and in combination with chemical control agents. Additional treatments are included in the Maryland trial, when space permits, to help separate the effects the materials may also have on other diseases and to examine other treatment options. Assessment of efficacy includes: reduction in disease incidence and severity, effect on yield, test weight, average kernel weight and DON toxin contamination of grain. The experimental protocol will include: inoculation with the disease-causal agent, mist irrigation to provide a disease-conducive environment, and use of twin-angled nozzles on a spray boom to improve application of control agents on wheat heads.