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Project ID: FY08-DA-012

FY08 ARS Agreement #: 59-0790-8-071

Research Category: BAR-CP/GDER

Duration of Award: 1 Year

Project Title: Transformation and Field Testing of Transgenic Barley Lines.

PROJECT 3 ABSTRACT

Testing transgenic barley lines for FHB in the greenhouse does not necessarily give the same results as field tests. Programs led by Abebe, Dahleen and Manoharan have developed barley lines expressing anti-fungal and/or anti-toxin genes. Field FHB testing of these lines is necessary to determine if the transgenes have the ability to reduce FHB and DON in a natural environment as good effectiveness in the greenhouse has not always translated into good effectiveness in the field. With Dr Lynn Dahleen we will establish trials at the Langdon Research Extension Center ND to test for resistance to FHB and DON the set of lines including Conlon with Chi+FvGlu, Chi+tlp, Npr1, or FvGlu, Conlon BC lines with more than one of the genes, Lacey with DogT1 and Golden Promise with gastrodianin.