Dry Wheat In 2-3 Foot Deep Layers, With Plenty Air

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The first step is sanitation with the bins thoroughly cleaned and treated for insect pests. Natural air can be used to dry wheat but the moisture must be 18 percent or less. A very small amount of heat resulting in a temperature rise of just 3 to 5 degrees Fahrenheit is typically necessary when moisture contents are as high as 20 percent. Drying to 14 percent moisture content should be completed within one day.

The wheat should be dried in shallow layers of 2-3 feet deep with plenty of air. Airflow rates should be in the order of 2 to 5 cfm per bushel. The fans should run continuously until the wheat is dry. Running the fans day and night can help prevent heating. The reason is three-fold. The bottom layer can over-dry and will act as a desiccant at night to dry the moist air some and allow drying of the upper layers to continue. The cool night time temperatures keep the wheat relatively cool. The last wheat to go into the bin should already be dry.

Monitor stored wheat on a regular basis, at least weekly until wheat is cooled to 50 F and then at least monthly until the grain is sold. Good monitoring practices require checking the moisture content and temperature of the wheat throughout the grain mass. Aeration fans should be run immediately if musty smells or crusted grain are detected. Continue running fans until the problem is solved or until the wheat is sold.

Also, monitor for insect activity closely. Since it is almost impossible to cool wheat in the summer and early fall months, the only protection will come from insecticides.

The University of Missouri Extension has an excellent publication on Management of Soft Red Winter Wheat and includes a section on Wheat harvest, drying and storage. You can go to the web site and print off the sections of interest or order the publication from the web site or contact your county extension office. Δ

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