

California Wheat

Made with the Golden Touch!

Weekly Wheat Bulletin

Date: April 5, 2007 Issue# 12

*The Weekly Wheat Bulletin is designed to share quick, informal and reliable information about the state's wheat crop and disease conditions. Comments forwarded by Thursday morning of each week will be posted in the Bulletin for distribution Thursday evening. Archived copies of the 2007 Wheat Bulletin may be accessed on the California Wheat Commission website:
www.californiawheat.org*

Crop Comments

"The wheat crop has been nearly disease-free so far this season. The extremely dry conditions, however, are stressing the crop. Growers able to irrigate should do so to avoid losses due to moisture stress. See Part 5 of the Small Grains Production Manual "Irrigation and Water Relations" at <http://agric.ucdavis.edu/crops/cereals/ce-real.htm> (the UC small grains website) or at <http://anrcatalog.ucdavis.edu/pdf/8208.pdf> for information on the effects of moisture stress at different stages of plant development, patterns of water consumption by the wheat crop, and desirable irrigation frequency and irrigation cut-off." *Lee Jackson Extension Specialist, Small Grains*

USDA Prospective Plantings

California farmers have planted 22% more Winter wheat for harvest in 2007 than in 2006 and 43% more acres of Durum wheat. USDA published the Prospective Plantings report last Friday, March 29, reporting all wheat plantings in the US were up 5% from 2006.

	Area Planted (1,000 acres)
2007 CA Winter Wheat	550
2007 CA Durum Wheat	100
2007 US Winter Wheat	44,505

Full details of the USDA Planting report may be obtained at the following web address:

<http://usda.mannlib.cornell.edu/usda/current/ProsPlan/ProsPlan-03-30-2007.pdf>

Resource - Diseases

Fact Sheets (Series 1/3)

Stripe Rust Fact Sheet Available

Attached to this bulletin or can be found at the following web address:

<http://maswheat.ucdavis.edu/Education/PDF/facts/stripefacts.pdf>

A Solution – Marker Assisted Selection

The molecular technique that uses markers to track genes is called marker assisted selection (MAS). In MAS,

markers are used as flags to help breeders select the best gene combinations. A consortium of 20 public breeding laboratories (WheatCap) led by UC Davis wheat breeder Jorge Dubcovsky, have identified markers located very close to race-specific and durable stripe rust resistance genes. Breeders are now using these markers to pyramid genes into the new varieties. Since it is more difficult for the pathogen to overcome all these barriers simultaneously, the new varieties are expected to have a more durable resistance. With the use of markers, varieties are selected faster without infecting lines and without the confounding influence of the environment.

Provided by:



Coordinated Agricultural Project (CAP) for Wheat is a multi-state, multi-institution project, funded by USDA/CSREES

dedicated to the genetic improvement of US wheat through research, education and extension. For more about this program please visit the following website:

<http://maswheat.ucdavis.edu/Education/index.htm>

Jorge Dubcovsky is the lead scientist on this national project. For more information about the WheatCAP program you may reach Jorge at the following address:

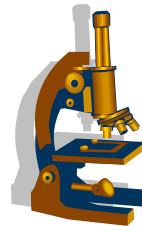
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On-going Wheat Research

Series (5/5) –This is the last of a five part series about the wheat research at the USDA Agriculture Research Service, Western Regional Research Center, Albany, CA. There are more projects than have been highlighted over the past few weeks. For a summary of the projects there is an attachment to this e-mail.



Processing and Biotechnological Improvement of Foods to Prevent Obesity Related and Degenerative Diseases. Dr. Wally Yokoyama, email:

wally@pw.usda.gov

Objectives: The goal of this project is to assess the potential of dietary components, particularly soluble dietary fibers, to reduce insulin resistance in an animal model. In the next five years we will determine the physico-chemical properties of fiber necessary to reduce insulin resistance and to process food ingredients in order to concentrate or to improve the bioavailability of fiber and other phytochemicals that reduce risk factors associated with cardiovascular disease, diabetes and certain cancers.

Save the Date...see next page

Save the Date

UC Davis Small Grains and Alfalfa Field Day, Wednesday, April 25, 2007



Photo from 2006 Small Grains Field Day

The annual UC Davis Small Grains and Alfalfa Field Day (Grain Handlers Field Day), sponsored by the California Crop Improvement Association (CCIA) and the Department of Plant Sciences, UC Davis, is scheduled for Wednesday, April 25, 2007. Registration and refreshments begin at 8:30 am at the Agronomy Field Headquarters on Hutchison Drive, ½ mile west of HW 113. The Field Day is designed primarily for grain and alfalfa growers, PCA's, seed companies, handlers of certified seed, Campus-based faculty and students, farm advisors, and others interested in small grain and alfalfa production and research. The Small Grain portion of the Field Day, from 8:30 a.m. until noon, will emphasize and highlight progress in field research on common wheat (hard red and hard white), durum wheat, triticale, barley, and oat and on efforts to improve small grain production in California. A BBQ lunch, hosted by the CCIA, will follow the small grain field tour. The UC Davis Alfalfa/Forage Field Day, organized by

Dan Putnam, Extension Alfalfa/Forage Specialist, will follow the BBQ lunch.

Question? Please contact Lee Jackson at the address below.

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