WHEAT PERFORMANCE IN ILLINOIS TRIALS - 2012 Crop Sciences Special Report 2012-01, July 2012

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The 2011-12 wheat season was a good one in Illinois, with above-average yields and outstanding grain quality in most areas of Illinois. Planted acres dropped by 16%, from 765,000 acres in 2011 to 640,000 acres in 2012, but yields increased from 61 to 64 bushels per acre, and production dropped by only 12 percent. The 2012 yield is tied for the third-highest on record, and is about 5 bushels per acre above the average of the past decade.

The dry fall in 2011 allowed early harvest of the summer crops and the wheat crop to be planted on time. Soils were somewhat dry at planting but stands were generally good, and there was good rainfall after planting to produce good growth before dormancy. The winter of 2011-12 was relatively dry and warm, and there was virtually no damage from standing water or from cold temperatures. The crop greened up very early and grew rapidly in March, with a very early start to heading: 8 percent of the crop was headed by April 8, and 80 percent was headed by April 30, compared to 6 percent normally headed by the end of April. Temperatures over much of the state dropped below 32 degrees on April 11 and 12, causing some freeze injury. The weather remained drier than normal throughout the spring, including during flowering. As a result, there was almost no Fusarium head scab in Illinois in 2012. Warm, dry weather continued into June, and the 2012 crop was harvested earlier than ever before: 6 percent of the crop was harvested by June 3 and 96 percent by July 1. Though planting of doublecrop soybeans was much earlier than normal, dry soil conditions delayed or prevented emergence in many fields.

The 2012 wheat variety trials were planted on time, under good soil conditions. The only factors that negatively affected yields were the below-freezing temperatures the second week of April, when much of the crop was either headed or in boot, and stripe rust in some areas. We discarded some data at Urbana from early varieties, which appeared to have suffered more damage from the frost than most of the other entries. Even without much visible damage in other locations, these early varieties tended to yield less than expected, probably due to their early growth and more advanced stage when the frost occurred. Yields were generally good at all locations.

Plots in these trials were seeded at the rate of 36 seeds per square foot, and consisted of six, 7.5-inch rows trimmed to about 17 feet long before harvest. There were three replications. Yields were corrected to 13.5% moisture. The final table of the report includes Fusarium head scab ratings from Dr. Fred Kolb's misted, inoculated scab trial at Urbana. Seed companies were allowed to include entries treated with seed-applied insecticide, with the insecticide treatment identified by product name. We also entered both treated and untreated seed of several varieties at each location as a test of yield response to this input. Averages from those comparisons were used to generate the statement at the bottom of each table.

<u>Location</u>	<u>Cooperators</u>	Soil type	<u>Planted</u>	N fertilizer	<u>Harvest</u>
Dixon Springs	Steve Ebelhar	Grantsburg silt loam	Oct. 17	30 Fall 120 Spring	June 5
Belleville	Ron Krausz	Ebbert silt loam	Oct. 14	30 Fall 85 Spring	June 6
Brownstown	Lindell Deal	Cisne silt loam	Oct. 5	0 Fall 120 Spring	June 8
Orr Center	Mike Vose	Clarksdale silt loam	Oct. 3	45 Fall 80 Spring	June 13
Urbana	Bob Dunker Jeff Warren	Flanagan silt loam	Oct. 4	40 Fall 40 Spring	June 15
DeKalb	Dave Lindgren	Drummer silty clay loam	Sept. 24	30 Fall 40 Spring	June 27

Participating companies are listed on Page 2, regional data in Tables 1 and 2, individual location data in Tables 3 to 8, wheat variety characteristics in Table 9, and the Fusarium head scab ratings in Table 10.

Participating Companies

We thank these companies for their support of this program in 2012.

AgriMAXX Wheat Co				
7167 Highbanks Rd				
Mascoutah, IL 62258				
618-566-7022				

Agrinetics, Inc. 8664 Howison Hinkley, IL 60520 (630) 417-4265

Beck's Hybrids 6767 E 276th St Atlanta, IN 46031 (317) 984-3508

BioTown Seeds Box 299 Reynolds, IN 47980 (219) 984-5247

Cappel Certified Seed 12629 HWY 38 W Rochelle, IL 61068 (815) 562-8978

DeRaedt Seed Corp. 10 N 971 Tower Road Hampshire, IL 60140 (847) 514-8844

Direct Enterprises PO Box 978 Westfield, IN 46074 (888) 895-7333

Dyna-Gro Seed 6221 Riverside Drive, Suite 1 Dublin, OH 43017 (614) 761-4110, ext 3

Green Valley Seed, LLC P O Box 35 Kahoka, MO 63445 (660) 727-3341 GROWMARK, Inc. 1701 Towanda Ave., PO 2500 Bloomington, IL 61701 (309) 557-6399

Hartke Seed Farms 22679 Sunset Rd Litchfield, IL 62059 (217) 324-2680

Hoffman Seed House PO Box 66, 200 E 4th St Hoffman, IL 62250 (618) 495-2617

Kitchen Seed Company PO Box 286 Arthur, IL 61911 (217) 543-3476

Lewis Hybrids, Inc 530 West Maple Ave. Ursa, IL 62376 (217) 964-2131

Limagrain Cereal Seeds LLC 257 East Hail Street Bushnell, IL 61422 (309) 772-2070

Merschman Seeds, Inc 103 Ave D, PO Box 67 West Point, IA 52656 (800) 848-7333

Miller Bros. Farm & Fertilizer 2001 Niemansville Trail Walshville, IL 62091 (217) 456-9311

Monier Seed + Service 846 Yankee Lane Sparland, IL 61565 (309) 469-2511 Pioneer Hi-Bred International 421 Detroit Drive Bloomington, IL 61704 (800) 950-3489

Pro Harvest Seeds, Inc. 2737 N 700 E Rd Ashkum, IL 60911 (815) 698-2204

Pro Seed Genetics N 4297 City Hwy E Kewaunee, WI 54216 (920) 988-2824

Steyer Seeds 6154 N Co Rd 33 Tiffin, OH 44883 (800) 231-4274

Sunstar Hybrids 14993 State Road 17 Culver, IN 46511-9642 (574) 842-2775

Synergy Seeds, Inc. PO Box 508 Herscher, IL 60941 (815) 426-9885

Syngenta 520 E 1050 S Brookston, IN 47923 (765) 563-3111

Virginia Crop Improvement 9225 Atlee Branch Lane Mechanicsville, VA 23116 (804) 746-4884

Westbred 6025 W 3005 Lafayette, IN 47909 (765) 572-2627