2011 WSU Variety Testing Hard Winter Wheat Trial, Pullman

Variety Name *Hard White Italized	5 YEAR AVERAGE (BU/A)	3 YEAR AVERAGE (BU/A)	2 YEAR AVERAGE (BU/A)	2011				
				YIELD (BU/A)	TEST WT (LBS/BU)	PROTEIN (%)	PLANT HT	HEAD DATE
ML9W05-2501				190	63.5	12.6	45	173
WA 8119			156	186	57.9	12.2	48	177
WA 8120			148	177	59.3	12.1	48	177
IDO656				174	62.9	12.5	51	175
Altigo				169	59.8	12.0	37	171
Norwest 553	135	140	145	167	63.7	12.2	38	172
MDM	135	138	131	167	61.2	11.7	45	176
UI Silver		143	149	167	63.8	10.9	48	176
WA 8118			132	167	63.7	13.7	49	168
OR2080156H			144	165	63.0	12.3	43	175
OR2080111H				163	61.5	12.0	41	172
Eltan (SWW Ched	:k) 138	136	130	161	60.5	11.1	46	182
Whetstone	125	129	136	161	63.7	12.3	43	171
Genesi				161	62.7	12.2	39	170
Azimut				157	58.6	12.2	36	170
Peregrine		123	129	156	64.2	11.4	54	173
Boundary	132	134	138	155	62.8	11.7	44	174
WA 8096		127	123	155	60.4	12.0	45	180
Bauermeister	134	128	123	153	60.7	12.2	47	179
Finley	120	122	126	152	64.9	12.6	54	175
WA 8070		128	126	150	63.0	12.1	54	181
WB-Tucson		132		143	64.0	11.8	44	174
Eddy	110	114	114	137	63.6	11.8	43	173
UICF-Grace		123	122	137	63.3	12.3	57	175
AgriPro Paladin	111	106	109	135	62.6	12.4	40	173
IDO835				135	61.9	10.3	48	177
Accipiter		121	118	130	63.2	11.5	45	175
Farnum	103	113	109	129	61.5	13.4	56	183
Esperia		123	132	129	63.0	12.8	36	168
Hatton	102	94	92	118	65.0	11.7	53	177
C.V.	14	12	12	9	0.6	2.8	4	1
LSD	10	13	18	29	0.7	0.7	3	2
Average	122	125	129	155	62.3	12.1	46	175
Highest	138	143	156	190	65.0	13.7	57	183
Lowest	102	94	92	118	57.9	10.3	36	168

Pullman Hard Winter Wheat – Preliminary Data

1. Grain yield in the Pullman hard winter wheat trial averaged 155 bushels/acre, 33 bushels/acre higher than the 5-year average. The Pullman nursery was located about nine miles west of Pullman, WA (N. Druffel, cooperator).

This nursery was seeded on 20 October, 2010 following chickpeas. Seed was placed at an 85#/acre seeding rate using a double disc plot drill set on 6-inch spacing. Fall seeding conditions were favorable and emergence and stand establishment were good. Base fertilizer was 120#N/acre. A spring soil test showed 279#N/acre available and an additional 24#N/acre was applied for hard wheat protein based on expected yields.

Yields ranged from 118 bu/ac to 190 bu/ac. Altigo was the highest yielding named entry in this trial. All yield values within the 10% LSD range of the highest yield are shown in bold and this included 14 of the 30 entries. The hard white MDM and Norwest 553 were the top yielding hard entries across five years of results at this location. Stripe rust potential was very high at this location and fungicide was applied three times: mid-April, May 30, and early June. Fungicide applications were effective, but there was some stripe rust impact at this location with up to an estimated 20% yield loss by susceptible varieties. The Lattice design was 115% efficient compared to an RCBD.

4. Test weights were good with an average of 62.3 lb/bu and ranged from 57.9 to 65.0 lb/bu. Grain protein averaged 12.1% with a range of 10.3 to 13.7%. Plant height averaged 46 inches with no lodging.