2011 WSU Variety Testing Hard Winter Wheat Trial, Connell

| | | 5 YEAR | 3 YEAR | 2 YEAR | 2011 | | | | | |
|--------------------------------------|---------|-------------------|-------------------|-------------------|-----------------|---------------------|----------------|----------------|-------------|--------------|
| Variety Name *Hard White Italized | | AVERAGE (BU/A) | AVERAGE (BU/A) | AVERAGE (BU/A) | YIELD (BU/A) | TEST WT (LBS/BU) | PROTEIN (%) | LODGING (%) | PLANT HT | HEAD DATE |
| Norwest 553 | | | 50 | 55 | 76 | 62.6 | 12.6 | 0 | 33 | 141 |
| WA 8119 | | | | 68 | 76 | 61.3 | 12.2 | 0 | 40 | 146 |
| WA 8120 | | | | 70 | 76 | 61.0 | 12.1 | 0 | 40 | 146 |
| OR2080111H | | | | | 73 | 61.4 | 11.7 | 0 | 37 | 140 |
| Azimut | | | | | 68 | 60.7 | 11.8 | 0 | 34 | 140 |
| ML9W05-2501 | | | | | 66 | 61.7 | 13.9 | 0 | 38 | 143 |
| WA 8118 | | | | 49 | 65 | 60.5 | 13.6 | 0 | 39 | 140 |
| Genesi | | | | | 65 | 61.3 | 13.3 | 0 | 33 | 140 |
| IDO656 | | | | | 61 | 60.4 | 13.2 | 0 | 42 | 145 |
| Finley | | | 51 | 56 | 60 | 63.4 | 12.4 | 0 | 41 | 145 |
| Eltan (S | WW Chec | ck) | 55 | 58 | 59 | 61.1 | 11.6 | 0 | 37 | 147 |
| UI Silver | | | 47 | 55 | 59 | 62.2 | 12.2 | 0 | 39 | 145 |
| Whetstone | | | 44 | 49 | 58 | 62.6 | 12.4 | 0 | 35 | 140 |
| Bauermeister | | | 54 | 57 | 57 | 60.9 | 12.6 | 0 | 38 | 148 |
| WB-Tucson | | | 49 | | 57 | 63.9 | 12.1 | 0 | 36 | 144 |
| WA 8070 | | | 51 | 57 | 57 | 61.2 | 12.5 | 0 | 41 | 147 |
| WA 8096 | | | 54 | 59 | 57 | 60.5 | 11.5 | 0 | 40 | 148 |
| Farnum | | | 51 | 57 | 56 | 60.2 | 12.9 | 0 | 40 | 148 |
| MDM | | | 55 | 59 | 56 | 61.3 | 11.5 | 0 | 39 | 147 |
| UICF-Grace | | | 44 | 47 | 54 | 60.2 | 12.8 | 0 | 43 | 142 |
| Peregrine | | | 45 | 48 | 51 | 62.6 | 11.0 | 0 | 41 | 144 |
| OR2080156H | | | | 44 | 51 | 61.6 | 12.7 | 0 | 34 | 146 |
| Esperia | | | 38 | 34 | 49 | 61.8 | 12.9 | 0 | 33 | 140 |
| Boundary | | | 48 | 52 | 46 | 61.7 | 12.9 | 0 | 37 | 145 |
| Eddy | | | 43 | 45 | 46 | 63.8 | 12.1 | 0 | 36 | 141 |
| Accipiter | | | 45 | 48 | 46 | 63.1 | 12.0 | 0 | 38 | 147 |
| AgriPro Palad | in | | 29 | 25 | 45 | 63.1 | 12.7 | 0 | 36 | 143 |
| IDO835 | | | | | 44 | 62.6 | 12.4 | 0 | 37 | 146 |
| Altigo | | | | | 42 | 59.4 | 11.7 | 0 | 32 | 144 |
| Hatton | | | 44 | 41 | 36 | 64.8 | 12.0 | 0 | 40 | 146 |
| C.V. | | | 11 | 9 | 7 | 0.7 | 3.5 | 0 | 5 | 0 |
| LSD | | | 5 | 5 | 8 | 0.9 | 8.0 | 0 | 3 | 1 |
| Average | | | 47 | 52 | 57 | 61.8 | 12.4 | 0 | 38 | 144 |
| Highest | | | 55 | 70 | 76 | 64.8 | 13.9 | 0 | 43 | 148 |
| Lowest | | | 29 | 25 | 36 | 59.4 | 11.0 | 0 | 32 | 140 |

Connell Hard Winter Wheat - Preliminary Data

- 1. Grain yield in the Connell hard winter wheat trial averaged 57 bushels/acre, 10 bushels/acre higher than the 3-year average. Higher yields were enabled by favorable spring precipitation and temperatures. The Connell nursery was located about six miles east of Connell, WA (D. Bauermeister farm).
- 2. This nursery was seeded on 30 August, 2010 following summer fallow. Seed was placed at a 45#/acre seeding rate using a deep furrow plot drill set on 15-inch spacing. Base fertilizer was 60#N and a spring soil test analysis showed a greater than needed N supply for hard protein levels at projected yield levels. Fall seeding conditions were favorable and emergence and stand establishment were good.
- 3. Yields ranged from 36 bu/ac to 76 bu/ac. Norwest 553 was the highest yielding entry in this trial. All yield values within the 10% LSD range of the highest yield are shown in bold and this included 5 of the 30 entries. The cool and wet spring conditions along with local inoculum sources created early, high levels of stripe rust at this location. A fungicide was applied June 1 and stopped stripe rust across the trial. However, there is an estimated 30% or more yield loss by stripe rust susceptible entries in this trial.
- 4. Test weights were very good with an average of 61.8 lb/bu. Despite early stripe rust, the June 1 fungicide provided protection during grain filling and helped maintain test weight.
- 5. Grain protein averaged 12.4% with a range of 11.0 to 13.9%. Protein overall was lower than predicted because of high yield levels. Protein was not higher in the lower yield levels in this trial because stripe rust lowered yield potential early and did not occur during grain filling when plants were protected by fungicide. Plant height averaged 38 inches with no lodging.