

2017-2018 Guide for No-Till Winter Wheat Production after Soybeans in Dodge & Washington Counties

Step 1: Variety selection and seed treatment

Table 1. Recommended varieties for Dodge and Washington counties based on trial data in Eastern Nebraska ordered by heading date. Data shown below is from the 2017 Washington County trial.

Variety (year of release)	2017 Heading Date (days diff)	2017 Relative Height (inches)	2017 Lodging % June 19	2017 Stripe Rust Ratings (1-Resistant, 9 Suscept.)	Fusarium Head Blight (FHB) Rating†	Notes
WB Cedar (2010)	-6	-3	7	3	S-MS	Earliest maturity
WB 4458 (2011)	-4	+1	5	4	S	High yield potential
Zenda (2016)	-2	+1	23	2	MR	Best scab or FHB resistance
WB 4303 (2015)	-2	-2	0	6	S-MS	Responds to high inputs
SY Wolf (2011) Reference	0	0 (40)	29	2	MS	Great yield & protein record
HG Ruth (2016)	+2	+5	54	3	MS	Tall, straw production

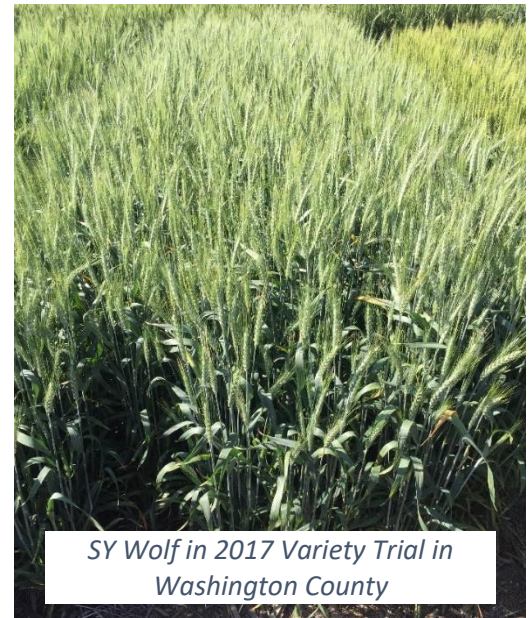
† S = susceptible, MS = moderately susceptible, MR = moderately resistant, R = resistant. More info at CropWatch Wheat Varieties Virtual Tour (<http://cropwatch.unl.edu/wheat/virtual>) & Winter Wheat Variety Test Results (<http://cropwatch.unl.edu/winter-wheat-variety-test-results>).

Local seed suppliers (*not an endorsement*):

- Kaup Seed in West Point, 402-844-3304 (WestBred varieties, Wolf)
- Seed Enterprises in West Point, 402-372-3238 (Wolf)
- Rezac Seed in Valparaiso, 402-784-3875 (Wolf, Ruth)
- Knobel Seeds in Fairbury, 402-446-7394 (Zenda)
- List of all certified seed suppliers in 2017-18 NE Crop Improvement Association Seed Book: <http://www.necrop.org/SEED%20BOOKS/2017Small.pdf>

Seed orders and seed treatments:

- Contact in late August or early September to place orders.
- Local suppliers offer seed in 50 lbs bags, unless bulk requested
- How much to order? Ask for germination %, purity %, and seed size (seeds/lbs) from supplier and use new Excel-based Crop Tech Cafe Seeding Rate Calculator at <http://croptechcafe.org/winterwheat> to determine total bags/units needed.
- Fungicide seed treatment recommended. Ask seed provider for seed treatment fungicide options, typically \$3 per bag/unit.



Step 2: Planting practices

- Recommended seeding dates of Sept 25 to Oct. 15, w/late planting until Oct. 30
- Final planting date for 100% crop insurance coverage is Oct. 15. Delayed planting coverage until Oct. 30. (Map by county at https://www.rma.usda.gov/fields/ks_rso/2018/final/newheat.pdf).

- Recommended seeding rates of 1.2 million pure live (PLS) seeds per acre or 28 PLS per square foot. Increase seeding rates by 150,000 PLS/acre per week after October 1 up to a maximum of 1.8 million PLS/acre or 40 PLS per square foot at the end of October.
 - Mid-September – Oct. 6 = 1.2 million PLS/acre
 - Oct. 7 – Oct. 14 = 1.35 million PLS/acre
 - Oct. 15 – Oct 21 = 1.5 million PLS/acre
 - Oct. 22 – Oct 29 = 1.65 million PLS/acre
 - Oct. 30 or later = 1.8 million PLS/acre
- Use new Excel-based Crop Tech Cafe Seeding Rate Calculator at <http://croptechcafe.org/winterwheat>. Can calculate seeding rate by hand to (lbs/acre) = (1,200,000 pure live seeds per acre) / (% pure seed/100) / (% germ/100) / (seeds per pound).
- Recommended planting depth of 1.0 to 1.5 inches.
- Since planting no-till into soybean stubble, add 40 lbs of MAP starter fertilizer in-furrow for increased winter hardiness. Can be mixed with the seed in the hopper, but manually calibration needed.

Step 3: Nitrogen (N) fertilizer

- Based on regional N recommendations and local grower experience: 90 – 100 lbs N/acre.
- Apply MAP (11-52-0) fertilizer for phosphorus and low rate of nitrogen in the fall.
- Apply most your nitrogen as wheat begins to green up in March and prior to jointing.
- Grain protein is improved with sufficient N. N applications at flag leaf (Feekes 9) can still improve protein.

Step 4: Diseases and foliar fungicide

- Most common fungal diseases in our area that can cause significant yield or grain value loss:
 - Fusarium head blight: <http://extensionpublications.unl.edu/assets/pdf/ec1896.pdf>
 - Stripe and leaf rust: <http://extensionpublications.unl.edu/assets/pdf/g2180.pdf>
- Use variety selection, field scouting, and fungicides to help manage these diseases.
- Foliar fungicide application at flowering (Feekes 10.51) will help reduce scab and vomitoxin (DON) that may cause dockage or rejection at local elevators.
 - Caramba 14 oz/ac or Prosaro 6.5 oz/ac are to examples of fungicides & rates to use for controlling scab.
- Get a copy of the 2017 Guide for Weed, Disease, and Insect Management in Nebraska for more information on fungicide use in winter wheat. Available at the Dodge or Washington County Extension office.

Step 5: Local elevators in Fremont

- Call Scoular Grain at 402-721-9767 or ADM at 402-721-1468
- Protein above 12.0% and less than 13.5% moisture

Nathan Mueller, PhD, CCA

Agronomist – Extension Educator for Dodge & Washington counties

nathan.mueller@unl.edu or 402-727-2775