

South Dakota State University Extension South Dakota Agricultural Experiment Station at SDSU

2021 South Dakota Spring Wheat Variety Trial Results Frankfort

Jonathan Kleinjan | SDSU Extension Agronomist
Karl Glover | SDSU Spring Wheat Breeder
Kevin Kirby | Agricultural Research Manager
Shawn Hawks | Agricultural Research Manager
Christopher Nelson | Agricultural Research Assistant

Cooperator: Brian and Jamie Johnson **Location:** 44.850425°, -98.305573°

Soil Type: Harmony-Aberdeen silty clay loams, 0-2% slopes

Previous crop: soybeans
Tillage: conventional

Row spacing: 7"

Seeding Rate: 1.8 million PLS/acre

Fertilizer:

-Starter: 90 lb/acre 30-10-10

-Other: 30-100-150-2.5S-.25Z preplant broadcast

Herbicide:

-Burndown: NR

-Post: 1 pt/acre PerfectMatch + 10 oz/acre NIS

Fungicide: none

Date seeded: 4/22/2021

Date harvested: 8/10/2021



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Table 1. 2021 spring wheat variety performance trial results (average of four replications) at Frankfort, South Dakota. Entries are sorted by overall two-year yield. Varieties yielding in the top third of the trial are shaded light blue.

Variety	Height (in)	Lodging* (1-5)	Test Wt (lbs)	Protein %	2019 (bu/a)#	2020 (bu/a)	2021 (bu/a)	2-year (bu/a)	3-year (bu/a)
LCS Trigger	27	not	63.6	13.2	not	83.6	73.9	78.7	not
LCS Buster	25	reported	61.9	13.6	harvested	74.9	68.9	71.9	available
CP3099A	30	-	60.6	13.2	_	68.9	69.3	69.1	-
Driver	27	-	64.0	15.5	-	68.2	69.2	68.7	-
CP3530	28	_	62.0	15.4	_	72.8	64.4	68.6	_
WB9606	26	-	63.2	14.0	-	67.6	69.5	68.5	_
Shelly	24	-	62.6	14.3	-	73.3	61.5	67.4	-
SY Valda	24	-	62.8	14.8	_	67.4	63.7	65.6	_
MN-Torgy	26	-	63.6	15.5	-	70.0	59.0	64.5	-
WB9719	24	-	64.4	15.9	-	71.0	57.4	64.2	-
CP3915	26	-	64.2	15.6	-	65.8	60.3	63.0	-
MN-Washburn	24	-	62.9	15.1	-	67.7	57.6	62.7	-
AP Murdock	22	-	61.2	15.4	-	69.9	55.2	62.5	-
Lang-MN	27	-	62.4	15.5	-	63.3	61.4	62.3	-
WB9590	23	-	62.5	16.3	-	65.9	58.7	62.3	-
LCS Cannon	23	-	64.2	15.5	-	62.4	61.3	61.9	-
ND Frohberg	28	-	62.3	15.4	-	61.1	61.5	61.3	_
Boost	28	-	62.5	15.5	-	62.6	59.4	61.0	-
LCS Rebel	27	-	63.5	15.9	-	61.7	56.5	59.1	-
Bolles	27	-	61.6	17.4	-	62.2	55.7	58.9	-
SY Rustler	22	-	60.6	14.9	-	62.2	55.3	58.7	-
MS Ranchero	25	-	61.2	14.6	-	58.7	57.9	58.3	-
SY Ingmar	24	-	63.4	15.8	-	64.2	52.1	58.1	-
Prevail	25	-	62.0	14.7	-	60.9	54.9	57.9	-
Surpass	23	-	62.4	15.7	-	60.1	53.5	56.8	-
MS Barracuda	24	-	62.2	15.7	-	62.0	51.5	56.7	-
Focus	26	-	63.5	17.3	-	57.6	51.3	54.5	-
CP3119A	28	-	59.5	13.4	-	-	67.3	-	-
PFS Buns	26	-	61.4	14.2	-	-	65.5	-	-
AP Gunsmoke CL2	24	-	61.9	16.4	-	-	65.0	-	-
CP3188	28	-	60.9	14.5	-	-	60.8	-	-
MS Cobra	25	-	62.5	15.9	-	-	57.4	-	-
AP Revolution	23	-	61.0	14.7	-	-	54.0	_	-
Trial Average#	25	-	62.4	15.3	-	65.5	60.7	63.1	-
LSD (0.05)+	_	-	0.9	0.6	-	3	6.5	-	-
C.V. %‡	-	-	1.0	2.9	-	3.3	7.6	-	-

^{*} Lodging score: 1, perfectly standing; to 5, completely flat.

[#] Trial averages may include values from experimental lines that are not reported, yield is reported @13%M, protein is @12%M.

[†] Value required (≥LSD) to determine if varieties are significantly different from one another.

[‡] C.V. is a measure of variability or experimental error, 15% or less is considered acceptable.