

Table 1. Performance of winter wheat varieties, with and without fungicide at Lisbon, ND in 2009¹.

Variety	Winter				Test Wt.		Protein		Yield	
	Survival	Heading	Height	Lodging	Untrt†	Trt	Untrt	Trt	Untrt	Trt
	--(0-9)--	--(date)--	--(cm)--	--(0-9)--	----- (lb/bu) -----		----- (%) -----		----- (bu/a) -----	
Alice	7.2	6/12	85.2	0.2	55.9	58.2	13.4	13.8	41.1	55.4
Art	8.7	6/11	87.7	1.8	58.2	59.3	14.2	14.7	44.2	62.3
Boomer	7.5	6/16	94.5	0.8	54.7	57.3	13.0	13.6	48.6	75.5
CDC Accipiter	7.8	6/16	92.2	0.8	51.6	59.0	12.5	12.9	60.8	72.4
CDC Buteo	7.7	6/15	99.7	4.7	59.0	60.1	12.8	13.4	51.0	62.8
CDC Falcon	8.0	6/15	85.7	0.5	57.3	59.3	13.0	13.0	50.3	60.9
CDC Peregrine	7.7	6/16	108.8	4.8	58.1	58.5	12.9	12.8	57.0	68.9
Darrell	7.7	6/14	94.7	4.5	54.9	58.4	13.3	13.3	56.3	70.1
Expedition	8.2	6/12	93.8	3.5	56.7	58.0	13.5	14.1	44.2	82.5
Hawken	8.2	6/13	83.3	0.5	57.2	59.1	14.9	14.9	48.7	65.9
Jagalene	7.8	6/13	91.7	0.5	53.0	59.5	13.4	13.7	61.0	69.0
Jerry	8.0	6/16	104.3	4.3	55.9	56.6	13.4	14.2	51.5	60.9
Lyman	8.2	6/13	96.2	8.2	60.2	59.7	15.4	14.7	49.3	67.3
Mace	7.7	6/12	83.5	0.3	55.4	57.4	12.9	13.8	52.3	64.6
Millenium	8.5	6/14	97.5	4.3	57.5	59.2	13.5	14.1	59.8	66.1
Overland	8.2	6/14	93.3	4.5	57.2	58.2	13.7	13.3	64.6	72.2
Striker	7.3	6/15	85.5	0.2	55.0	53.3	13.9	14.8	41.0	54.2
Wesley	8.7	6/12	83.5	1.2	54.6	55.3	14.6	14.4	47.1	59.2
Yellowstone	7.8	6/16	93.5	0.0	50.5	53.2	13.2	13.3	44.0	64.2
Mean	7.9	6/14	92.4	2.3	56	57.9	13.5	13.9	50.8	65.8
CV (%)	8.6		4.5	1.6	4.3		2.3		9.9	
LSD 0.05	0.8		2.4	1.9	1.9		0.6		9.6	

¹Fungicide treatment consisted of 4.0 fl. oz. of Stratego™ at the 4 to 5 leaf stage and 6.5 fl. oz. of Prosario™ at flowering.

† Untrt = Untreated, Trt = Treated with fungicide.

Planting date: 9/19/2008

Harvest date: 8/12/2009

Seeding rate: 1.2 million viable seeds.

This trial was partially funded by Ducks Unlimited, Bismarck, ND.

**Table 2. Disease development on winter wheat varieties, with and without fungicide at Lisbon, ND in 2009¹.
(Data compiled by Marcia McMullen). Average of 2 replications.**

Variety	Leaf rust		Leaf spot		FHB Intensity‡		FHB Head Severity		FHB Field Severity	
	Untrt†	Trt	Untrt	Trt	Untrt	Trt	Untrt	Trt	Untrt	Trt
	------(%)-----									
Alice	0.7	0	31.7	1.2	0.4	0.2	78	14	0.35	0.03
Art	0.0	0	53.3	2.0	0.4	0.4	52	3	0.21	0.01
Boomer	0.0	0	29.2	1.7	0.4	0.2	14	3	0.03	0.01
CDC Accipiter	2.8	0	28.4	4.0	0.2	0.2	100	3	0.20	0.01
CDC Buteo	1.6	0	33.3	3.5	0.4	0.2	14	3	0.06	0.01
CDC Falcon	0.0	0	56.7	3.0	0.8	0.2	71	3	0.57	0.01
CDC Peregrine	0.3	0	26.7	2.3	0.4	0.2	43	7	0.17	0.01
Darrell	13.3	0	19.3	1.2	1.2	0.2	30	15	0.36	0.03
Expedition	0.7	0	38.3	1.5	0.8	0.4	29	4	0.23	0.02
Hawken	2.3	0	13.3	1.2	1.2	0.8	30	15	0.36	0.12
Jagalene	28.3	0	24.5	1.8	1.0	0.2	42	13	0.42	0.03
Jerry	0.4	0	13.8	2.4	0.6	0.4	4	3	0.02	0.01
Lyman	0.0	0	33.3	1.2	0.6	0.2	4	3	0.02	0.01
Mace	4.6	0	27.5	2.0	1.0	0.2	23	7	0.23	0.01
Millenium	0.0	0	23.3	3.2	0.8	0.6	6	3	0.05	0.02
Overland	0.0	0	18.3	2.5	1.0	0.2	6	3	0.06	0.01
Striker	8.4	0	29.2	3.2	0.8	0.4	29	3	0.15	0.01
Wesley	7.7	0	30.0	1.7	1.4	0.6	41	24	0.60	0.04
Yellowstone	3.0	0	42.5	1.4	0.8	0.4	43	2	0.35	0.01
Mean	3.7*	0	30.7*	2.20	0.7*	0.3	37*	7	0.24*	0.02
CV (%)	2.59		49.4		40.3		89.1		93.2	

¹Fungicide treatment consisted of 4.0 fl. oz. of Stratego™ at the 4 to 5 leaf stage and 6.5 fl. oz. of Prosario™ at flowering.

† Untrt = Untreated, Trt = Treated with fungicide.

‡ FHB = Fusarium Head Blight (Head Scab).

*Indicated that the fungicide treatment differed significantly from the untreated check at the 5% level.

Planting date: 9/19/2008

Harvest date: 8/12/2009

Seeding rate: 1.2 million viable seeds.

This trial was partially funded by Ducks Unlimited, Bismarck, ND.

Table 3. Performance of winter wheat varieties, with and without fungicide at Prosper, ND in 2009 ¹.

Variety	Winter		Height	Leaf Disease§		FHB Intensity		FHB Severity		Test Weight		Protein		Yield					
	Survival	Heading		Untrt†	Trt	Untrt	Trt	Untrt	Trt	Untrt	Trt	Untrt	Trt	Untrt	Trt				
	--(0-9)--	--(date)--	--(cm)--	-----(%)------												-----(%)------		-----(%)------	
Alice	6.8	6/15	71.1	19.8	23.3	0.0	0.0	0.0	0.0	59.2	59.8	11.4	12.4	56.7	59.6				
Art	6.6	6/14	73.0	34.5	39.6	0.0	2.5	0.0	0.4	54.8	58.9	12.6	11.5	48.3	53.6				
Boomer	6.8	6/18	78.3	10.8	4.3	2.5	0.0	1.3	0.0	59.1	58.9	12.3	12.1	58.0	64.6				
CDC Accipiter	6.3	6/19	76.3	23.0	8.9	2.5	0.0	0.6	0.0	55.9	58.6	11.4	11.3	52.1	50.8				
CDC Buteo	6.6	6/18	87.4	22.1	11.6	0.0	0.0	0.0	0.0	60.2	60.2	11.7	12.3	48.7	59.0				
CDC Falcon	6.5	6/18	75.4	16.6	7.4	0.0	0.0	0.0	0.0	58.7	59.0	12.1	12.2	52.9	59.7				
CDC Peregrine	7.0	6/19	92.4	5.4	3.5	0.0	0.0	0.0	0.0	59.8	58.8	10.3	12.5	55.0	62.4				
Darrel	6.4	6/16	80.8	15.1	16.3	0.0	2.5	0.0	0.6	55.2	58.7	12.4	12.3	47.8	49.1				
Expedition	6.3	6/14	77.4	19.0	19.1	2.5	0.0	0.6	0.0	60.1	57.0	11.5	12.6	56.0	65.5				
Hawken	6.7	6/13	66.9	27.1	42.0	2.5	5.0	2.5	1.0	58.0	54.5	12.5	14.2	43.8	46.4				
Jagalene	7.6	6/15	74.1	36.3	54.8	2.5	0.0	2.5	0.0	57.7	57.9	12.4	11.8	45.8	54.3				
Jerry	6.5	6/19	84.4	8.4	4.9	0.0	0.0	0.0	0.0	58.1	59.3	12.7	11.4	52.2	55.5				
Lyman	7.1	6/15	83.6	11.0	11.3	0.0	2.5	0.0	0.6	60.6	56.7	13.1	12.8	61.4	56.5				
Mace	6.6	6/17	70.4	30.5	21.3	0.0	0.0	0.0	0.0	54.1	57.2	12.8	13.6	39.2	40.4				
Millenium	5.9	6/17	86.3	13.8	12.3	0.0	0.0	0.0	0.0	59.3	59.8	11.3	11.9	61.1	53.5				
Overland	6.8	6/16	79.8	22.5	14.0	0.0	0.0	0.0	0.0	60.3	60.1	11.7	12.9	62.8	65.9				
Radiant	6.4	6/18	85.8	7.5	8.3	0.0	0.0	0.0	0.0	54.2	57.8	11.5	11.1	44.7	53.4				
Striker	6.6	6/17	70.1	23.8	8.4	0.0	10.0	0.0	3.5	57.0	60.3	11.5	11.4	45.9	51.7				
Wesley	6.4	6/13	69.4	40.0	66.5	0.0	2.5	0.0	0.0	58.2	55.3	12.4	12.9	42.5	38.0				
Yellowstone	6.9	6/18	75.1	28.0	13.8	0.0	0.0	0.0	0.0	55.6	57.3	11.2	12.0	47.3	58.1				
Mean	6.6	6/17	77.9	20.7	19.5	0.6	1.3	0.4	0.3	57.8	58.3	11.9	12.2	51.1	54.9				
CV (%)	16	--	6.9	80.9		385		487		5.2		5.5		11.3					
LSD 0.05	1.1	--	5.4	16.4		N.S.		N.S.		4.2		1.3		8.7					

¹Fungicide treatment consisted of 6.5 fl. oz. of Prosario™ at flowering.

† Untrt = Untreated, Trt = Treated with fungicide.

‡ FHB = Fusarium Head Blight (Head Scab).

§ Some of the leaf disease noted here was due to Bacterial Stripe, which is not controlled by fungicides.

*Indicated that the fungicide treatment differed significantly from the untreated check at the 5% level.

Planting date: 9/19/2008 Harvest date: 8/12/2009 Seeding rate: 1.2 million viable seeds.

This trial was partially funded by the US Wheat and Barley Scab Initiative.