

agronomy



OCTOBER 2018

SOUTH DAKOTA STATE UNIVERSITY® AGRONOMY, HORTICULTURE & PLANT SCIENCE DEPARTMENT

2018 South Dakota Oat Variety Trial Results South Shore

Jonathan Kleinjan | SDSU Extension Crop Production Associate Kevin Kirby | Agricultural Research Manager Shawn Hawks | Agricultural Research Manager

Cooperator:	SDSU Northeast Research Farm, Al Heuer, manager
Location:	45.105569°, -97.086978°
Soil Type:	Kranzburg-Brookings silty clay loams, 0-2% slopes
Previous crop:	soybeans
Tillage:	Conventional
Row spacing:	8"
Seeding Rate:	1.8 million PLS/acre
Fertilizer:	
-Starter:	90 lb/acre 30-10-10
-Other:	425 lb/acre 46-0-0; 20 lb/acre 21-0-0-24S; 10 lb/acre Zinc preplant broadcast
Herbicide:	
-Burndown:	NR
-Post:	1 pt Bronate
Fungicide:	none
Date seeded:	5/14/2018
Date harvested:	8/16/2018
Notes:	Trial was severely lodged.

SDSU Extension is an equal opportunity provider and employer in accordance with the nondiscrimination policies of South Dakota State University, the South Dakota Board of Regents and the United States Department of Agriculture.

Learn more at iGrow.org.



2018 South Dakota Oat Variety Trial Results South Shore

Table 1. 2018 oat variety performance trial results (average of 4 replications) at South Shore, SD. Entries are sorted by overall 3-year yield. Varieties yielding in the top 1/3 of the trial are shaded light blue.

Variety	Height (in)	Lodging* (1-5)	Test Wt (Ibs)	2016 (bu/a)	2017 (bu/a)	2018 (bu/a)	2-year (bu/a)	3-year (bu/a)
Saddle	40	4.3	33.3	94.0	162.5	146.0	154.2	134.2
Hayden	44	3.0	35.1	91.7	162.1	145.0	153.6	132.9
Natty	45	4.5	34.9	90.8	152.0	148.8	150.4	130.5
Goliath	48	3.8	35.7	79.8	153.5	151.9	152.7	128.4
Newburg	46	4.3	34.3	86.1	160.1	134.5	147.3	126.9
Horsepower	39	5.0	34.2	88.9	143.2	143.2	143.2	125.1
CS Camden	42	3.5	32.0	78.7	131.7	160.6	146.1	123.7
Deon	42	3.3	34.7	82.4	147.8	140.8	144.3	123.7
Jury	46	3.3	35.7	80.2	142.9	136.7	139.8	119.9
Shelby427	42	4.5	35.2	86.6	140.5	130.1	135.3	119.0
Jerry	43	5.0	36.1	88.2	143.3	123.5	133.4	118.3
Souris	41	4.3	34.1	82.6	144.0	128.2	136.1	118.3
Sumo	43	5.0	36.4	81.1	142.3	129.3	135.8	117.6
Rockford	46	3.8	36.6	82.7	148.4	121.0	134.7	117.4
Antigo	40	4.5	35.7	-	117.2	138.1	127.6	-
Trial Average#	43	4.0	35.2	83.6	145.4	141.5	142.3	124.0
LSD(0.05)†	3	0.7	1.1	6.9	9.2	9.0	-	-
C.V.%‡	4.6	-	2.3	5.9	4.5	4.6	-	-

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

Trial averages may include values from experimental lines that are not reported.

† 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.