



on-farm network
PARTICIPATORY • PRECISE • PROACTIVE

Soybean Row Spacing Trial

Trial ID: 2024-SRS01 – R.M. of Morris

Objective: Quantify the agronomic and economic impacts of different row spacings on soybean production.

Summary: There was no significant yield difference between 7.5" and 15" row spacing. At V2 and R5, plant stand counts were similar between spacings. Canopy closure, disease pressure and weed density were also similar between row spacings.

Trial Information

Treatment	7.5" vs 15"
Soil Texture	Clay
Previous Crop	Millet
Tillage	Conventional Till
Seeding Equipment	60ft Planter
Seeding Date	May 12
Variety	S007-A2XS
Seeding rate	154,000 pl/acre
Germination	93%
Harvest Date	October 5

Precipitation (mm)

	May	June	July	Aug	Total
Rainfall	122	90.6	60.4	60.6	333.6
Normal	53.6	86.4	71.9	65.4	277.3
% Norm	228%	105%	84%	93%	120%

Plant Stand (plants/ac) †

	V2	R5
7.5"	145,000 A	143,000 A
15"	140,000 A	140,000 A

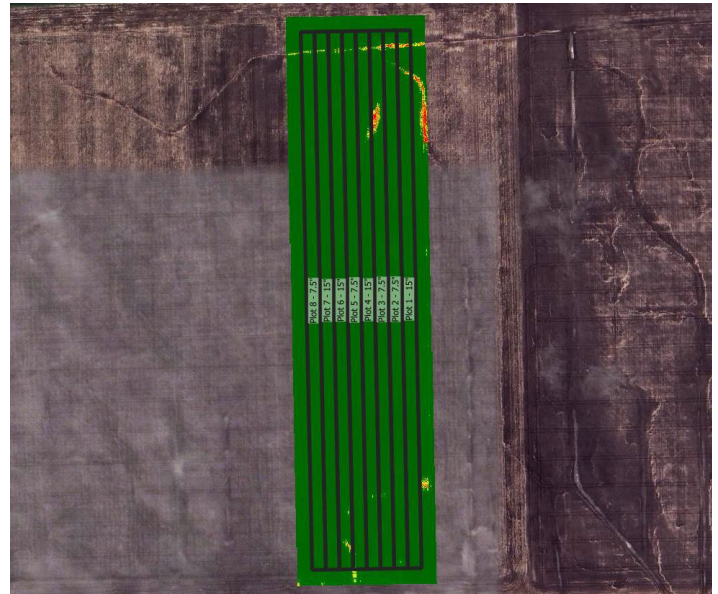
† Columns followed by different letters are significantly different from one another

% Canopy Closure †

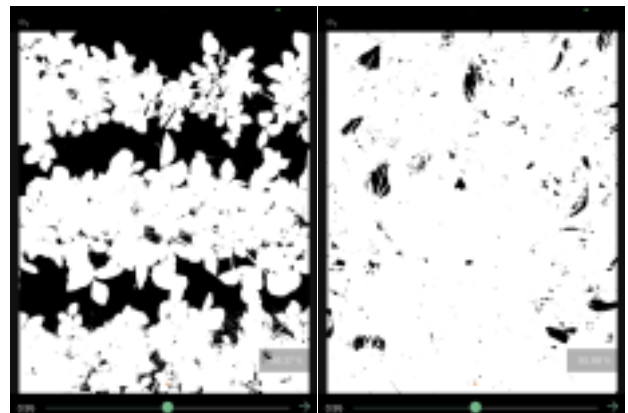
	R1	R3	R5
7.5"	68% A	98% A	99% A
15"	65% A	98% A	99% A

† Closure percentages in columns followed by different letters are significantly different from one another

NDVI Field Image August 8



Canopy Closure Images

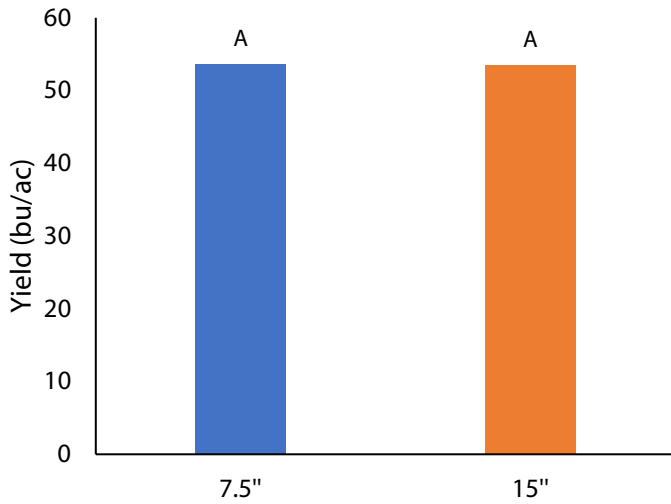


Canopeo app measurements of 15" row spacing canopy closure at R1 (left) and R5 (right).



Soybean Row Spacing Trial

Yield by Treatment



Overall Yield & Economics[†]

	Mean (bu/ac)	Change in Profit/ac [†]
7.5"	53.6	n/a
15"	53.5	n/a
Difference	0.1	
P-Value	0.959	
CV	3.3%	
Significance	No	Economic N/A

[†] Economics of how different row widths are achieved in the field are very farm and equipment specific. As a result, they are not estimated here.

Summary of Disease Rating (R4)[†]

	Incidence (% plants infected)				
	Septoria	Frog Eye	Stem Canker	White Mould	Bacterial Blight
7.5"	93% (1)	0%	0%	0%	100%
15"	95% (0.8)	0%	0%	0%	80%

[†] Septoria brown spot severity, listed in brackets, was rated on a 0-5 scale.

Late Season Weed Pressure (R5)

	Average Number of Weeds/ft ²
7.5"	0.2
15"	0.1