

Competitive Soybean System Comparison

Trial ID: 19 SOY YIELD Location: Trial Year: 2019
Protocol ID: 19 SOY YIELD Investigator: Dr. Mark M. Loux
Project ID: 2019-01-B7-06 Study Director: Bryan Reeb
Sponsor Contact: Rod Stevenson, Monsanto

General Trial Information

Study Director: Bryan Reeb
Investigator: Dr. Mark M. Loux

Trial Status: E established
ARM Trial Created On: Apr-25-2019

Trial Location

City: South Charleston Country: USA United States
State/Prov.: Ohio
Postal Code: 45368 Climate Zone: USWARM US Warm Continental
Latitude of LL Corner °: 39.85935 N
Longitude of LL Corner °: 83.67391 W
Altitude of LL Corner: 1109.00 ft

Conducted Under GLP: No
Conducted Under GEP: No

Contacts

Study Director: Bryan Reeb

Investigator: Dr. Mark M. Loux

Crop Description

Crop 1: C GLXMA Glycine max Soybean BBCH Scale: BSOY
Entry Date: May-21-2019
Variety: AG30X8
Attributes: Roundup Ready/xtend
Planting Date: May-16-2019 Planting Rate: 165000 S/A
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN
Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good
Soil Temperature: 63 F
Emergence Date: May-29-2019
Harvested Width: 6.25 FT
Harvested Length: 235 FT
% Standard Moisture: 13

Crop 2: C GLXMA Glycine max Soybean BBCH Scale: BSOY
Entry Date: May-21-2019
Variety: AG33X8
Attributes: Roundup Ready/xtend
Planting Date: May-16-2019 Planting Rate: 165000 S/A
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN
Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good
Soil Temperature: 63 F
Emergence Date: May-29-2019

Crop 3: C GLXMA Glycine max Soybean BBCH Scale: BSOY
Entry Date: May-21-2019
Variety: AG38X8
Attributes: Roundup Ready/xtend
Planting Date: May-16-2019 Planting Rate: 165000 S/A
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN
Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good
Soil Temperature: 63 F
Emergence Date: May-29-2019

Crop 4: C GLXMA Glycine max Soybean BBCH Scale: BSOY
Entry Date: May-21-2019
Variety: 30XF0
Attributes: XTENDFLEX
Planting Date: May-16-2019 Planting Rate: 165000 S/A
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN
Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good
Soil Temperature: 63 F
Emergence Date: May-29-2019

The Ohio State University

Crop 5: C GLXMA Glycine max
Entry Date: May-21-2019
Variety: 32XF0
Attributes: XTENDFLEX
Planting Date: May-16-2019
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN

Soil Temperature: 63 F
Emergence Date: May-29-2019

Soybean **BBCH Scale:** BSOY

Planting Rate: 165000 S/A

Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good

Crop 6: C GLXMA Glycine max
Entry Date: May-21-2019
Variety: 36XF0
Attributes: XTENDFLEX
Planting Date: May-16-2019
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN

Soil Temperature: 63 F
Emergence Date: May-29-2019

Soybean **BBCH Scale:** BSOY

Planting Rate: 165000 S/A

Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good

Crop 7: C GLXMA Glycine max
Entry Date: May-21-2019
Variety: Credenz 2889 GTLL
Attributes: Roundup/Liberty Link/
 HPPD
Planting Date: May-16-2019
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN

Soil Temperature: 63 F
Emergence Date: May-29-2019

Soybean **BBCH Scale:** BSOY

Planting Rate: 165000 S/A

Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good

Crop 8: C GLXMA Glycine max
Entry Date: May-21-2019
Variety: Credenz 3309 GTLL
Attributes: Roundup/Liberty Link/
 HPPD
Planting Date: May-16-2019
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN

Soil Temperature: 63 F
Emergence Date: May-29-2019

Soybean **BBCH Scale:** BSOY

Planting Rate: 165000 S/A

Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good

Crop 9: C GLXMA Glycine max
Entry Date: May-21-2019
Variety: Credenz 3929 GTLL
Attributes: Roundup/Liberty Link/
 HPPD
Planting Date: May-16-2019
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN

Soil Temperature: 63 F
Emergence Date: May-29-2019

Soybean **BBCH Scale:** BSOY

Planting Rate: 165000 S/A

Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good

Crop 10: C GLXMA Glycine max
Entry Date: May-21-2019
Variety: SC E x932E
Attributes: ENLIST E3
Planting Date: May-16-2019
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN

Soil Temperature: 63 F
Emergence Date: May-29-2019

Soybean **BBCH Scale:** BSOY

Planting Rate: 165000 S/A

Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good

Crop 11: C GLXMA Glycine max
Entry Date: May-21-2019
Variety: E351
Attributes: ENLIST E3

Soybean **BBCH Scale:** BSOY

The Ohio State University

Planting Date: May-16-2019
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN
Soil Temperature: 63 F
Emergence Date: May-29-2019

Planting Rate: 165000 S/A
Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good

Crop 12: C GLXMA Glycine max
Entry Date: May-21-2019
Variety: STINE 36EA02
Attributes: ENLIST E3
Planting Date: May-16-2019
Depth: 1.5 IN
Rows per Plot: 8
Row Spacing: 15 IN
Soil Temperature: 63 F
Emergence Date: May-29-2019

Soybean

BBCH Scale: BSOY

Planting Rate: 165000 S/A

Planting Method: SEEDED seeded
Planting Equipment: PP plot planter
Seed Bed: CLODDY cloddy
Soil Moisture: GOOD good

Pest Description

Pest 1 Type: W **Code:** SETFA *Setaria faberi*
Common Name: Giant foxtail **Entry Date:** Jun-21-2019

Pest 2 Type: W **Code:** AMBTR *Ambrosia trifida*
Common Name: Giant ragweed **Entry Date:** Jun-21-2019

Pest 3 Type: W **Code:** ECHCG *Echinochloa crus-galli*
Common Name: Common barnyard grass **Entry Date:** Jul-11-2019

Pest 4 Type: W **Code:** CHEAL *Chenopodium album*
Common Name: common lambsquarters **Entry Date:** Jul-15-2019

Pest 5 Type: W **Code:** AMARE *Amaranthus retroflexus*
Common Name: Redroot pigweed **Entry Date:** Aug-1-2019

Pest 6 Type: W **Code:** ABUTH *Abutilon theophrasti*
Common Name: velvetleaf **Entry Date:** Aug-1-2019

Site and Design

Treated Plot Width: 10 FT
Treated Plot Length: 250 FT
Treated Plot Area: 2500 FT2 **Treatments:** 12
Replications: 1

Site Type: FIELD field
Experimental Unit: 1 PLOT plot
Tillage Type: CONTIL conventional-till
Study Design: RACOB� Randomized Complete Block (RCB)

Previous

No. Crop Year
1. CORN 2018

Soil Description

Description Name: G-6
% Sand: 33 **% OM:** 2.2 **Texture:** SIL silt loam
% Silt: 53 **pH:** 5.9 **Soil Name:** Kokomo
% Clay: 15 **CEC:** 11.2 **Fert. Level:** G good
Soil Drainage: G good

Application Description

	A	B	C
Application Date	May-16-2019	Jun-21-2019	Jul-11-2019
Appl. Start Time	9:00 PM	9:00 AM	8:30 AM
Appl. Stop Time	10:00 PM	10:00 AM	8:50 AM
Interval to Prev. Appl.		36 DAYS	20 DAYS
Application Method	BROADC	Spray	spray
Application Timing	PRE	POST	LPO
Application Placement	BROFOL	BROFOL	BROFOL
Applied By	LAMB	ACKLEY	DOBBELS
Appl. Entry Date	May-17-2019	Jun-21-2019	Jul-11-2019
Air Temperature Start, Stop	74 74 F	65 68 F	73 73 F
% Relative Humidity Start, Stop	43 43	73 63	88 88
Wind Velocity+Dir. Start	11 MPH SW	8 MPH NNW	4 MPH WNW
Wind Velocity+Dir. Stop	11 MPH SW	6 MPH NNW	4 MPH WNW
Wind Velocity+Dir. Max	11 MPH S	8 MPH NNW	4 MPH WNW
Wet Leaves (Y/N)	N no	N no	N no
Soil Temperature	63 F	63 F	70 F
Soil Moisture	DRY	DAMP	DRY
Soil Surface Condition	TRASHY	SMOOTH	TRASHY
% Cloud Cover	70	0	90
Next Moisture Occurred On	May-17-2019	Jun-21-2019	Jul-11-2019
Time to Next Moisture	3 HR	2 HR	6 HR
Moisture 6 Hours after Appl.	1.32 IN	0.01 IN	0.10 IN
Moisture 1 Week after Appl.	2.54 IN	1.21 IN	0.43 IN

Crop Stage At Each Application

	A		B		C	
Crop 1 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop 2 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop 3 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop 4 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop 5 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop 6 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop 7 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop 8 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop 9 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop10 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop11 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16
Crop12 Code, BBCH Scale	GLXMA	BSOY	GLXMA	BSOY	GLXMA	BSOY
Days after Emergence	-13		23		43	
Stage Majority, Percent			V3	100	R1	100
Height Average			6	IN	14	IN
Height Minimum, Maximum			4	6	14	16

Pest Stage At Each Application

	A	B	C
Pest 1 Code, Type, Scale	SETFA W	SETFA W	SETFA W
Stage Majority, Percent	15	100	13 100
Height Average	12	in	2 IN
Height Minimum, Maximum	12	14	2 3
Density Average	226	PLA/m2	226 PLA/m2
Density Min, Max	160	540	160 540
Pest 2 Code, Type, Scale	AMBTR W	AMBTR W	AMBTR W
Stage Majority, Percent	19	80	16 80
Stage Minimum, Percent	18	20	14 20
Stage Maximum, Percent	19	80	16 80
Height Average	12	IN	3 IN
Height Minimum, Maximum	12	18	2 3
Density Average	28	PLA/m2	28 PLA/m2
Density Min, Max	14	34	14 34
Pest 3 Code, Type, Scale	ECHCG W	ECHCG W	ECHCG W
Stage Majority, Percent			13 100
Height Average			2 IN
Height Minimum, Maximum			2 3
Density Average			35 PLA/m2
Density Min, Max			25 60
Pest 4 Code, Type, Scale	CHEAL W	CHEAL W	CHEAL W
Density Average			10.6 PLA/m2
Density Min, Max			20 12
Pest 5 Code, Type, Scale	AMARE W	AMARE W	AMARE W
Density Average			5 PLA/m2
Density Min, Max			0 10
Pest 6 Code, Type, Scale	ABUTH W	ABUTH W	ABUTH W
Density Average			0.25 PLA/m2
Density Min, Max			0 2

Application Equipment

	A	B	C
Appl. Equipment	10' TTI	10' TTI	10' TTI
Equipment Type	SPRBAC	SPRBAC	SPRBAC
Operation Pressure	40 PSI	40 PSI	40 PSI
Nozzle Type	TTI	TTI	TTI
Nozzle Size	110015	110015	110015
Nozzle Spacing	18 IN	18 IN	18 IN
Boom Length	10 FT	10 FT	10 FT
Boom Height	20 IN	20 IN	20 IN
Ground Speed	3 MPH	3 MPH	3 MPH
Carrier	WATER	WATER	WATER
Application Amount	15 GPA	15 GPA	15 GPA
Mix Size	3 GAL	3 GAL	3 GAL
Propellant	CO2	CO2	CO2

Context	Date	By	Notes
STATUS	Apr-25-2019	Dr. Mark M. Loux	Automatically added by ARM: Trial Status updated to 'S' during trial creation.
STATUS	Jun-6-2019	Dr. Mark M. Loux	Automatically added by ARM: Trial Status updated to 'E' when Rating Date entered.

SE Definitions

1.	Crop Type, Code C
Pest Type	
Pest Code	
Pest Scientific Name	
Pest Name	
Crop Type, Code	C GLXMA C GLXMA C GLXMA C GLXMA
Crop Name	Soybean Soybean Soybean Soybean
Rating Date	Oct-2-2019 Oct-2-2019 Oct-2-2019 Oct-2-2019
Rating Type	WEIGHT MOICON YIELD WEITES
Rating Unit	LBS % BU LBS
Number of Subsamples	1 1 1 1
Data Entry Date	Oct-4-2019 Oct-4-2019 Oct-4-2019 Oct-4-2019
Rating Timing	
Days After First/Last Applic.	139 83 139 83 139 83 139 83
Trt-Eval Interval	
Plant-Eval Interval	139 DP-1 139 DP-1 139 DP-1 139 DP-1
Days After Emergence	126 DE-1 126 DE-1 126 DE-1 126 DE-1
ARM Action Codes	TY1
Number of Decimals	2 2 1 2
Trt Treatment	Rate Other Other Appl
No. Name	Rate Unit Rate Rate Unit Code 21 22 23 24

Pest Type				
Pest Code				
Pest Scientific Name				
Pest Name				
Crop Type, Code	C	GLXMA	C	GLXMA
Crop Name	Soybean	Soybean	Soybean	Soybean
Rating Date	Oct-2-2019	Oct-2-2019	Oct-2-2019	Oct-2-2019
Rating Type	WEIGHT	MOICON	YIELD	WEITES
Rating Unit	LBS	%	BU	LBS
Number of Subsamples	1	1	1	1
Data Entry Date	Oct-4-2019	Oct-4-2019	Oct-4-2019	Oct-4-2019
Rating Timing				
Days After First/Last Applic.	139 83	139 83	139 83	139 83
Trt-Eval Interval				
Plant-Eval Interval	139 DP-1	139 DP-1	139 DP-1	139 DP-1
Days After Emergence	126 DE-1	126 DE-1	126 DE-1	126 DE-1
ARM Action Codes			TY1	
Number of Decimals	2	2	1	2

Trt No.	Treatment Name	Rate	Unit	Other Rate	Other Unit	Appl Code	21	22	23	24
1	AG30X8						155.88	11.19	78.7	57.04
1	Xtendimax	0.5 lb	ae/a	22 oz/a		A				
1	Warrant	1.13 lb	ai/a	48 oz/a		A				
1	Mauler	0.25 lb	ai/a	8 oz/a		A				
1	Xtendimax	0.5 lb	ae/a	22 oz/a		B				
1	Roundup Power Max	1.13 lb	ae/a	32 oz/a		B				
1	Warrant	1.13 lb	ai/a	48 oz/a		B				
1	Intact	0.5 %	v/v	0.3 qt/a		B				
1	Class Act Ridion	1 %	v/v	0.6 qt/a		B				
2	AG33X8						148.49	10.73	75.3	56.44
2	Xtendimax	0.5 lb	ae/a	22 oz/a		A				
2	Warrant	1.13 lb	ai/a	48 oz/a		A				
2	Mauler	0.25 lb	ai/a	8 oz/a		A				
2	Xtendimax	0.5 lb	ae/a	22 oz/a		B				
2	Roundup Power Max	1.13 lb	ae/a	32 oz/a		B				
2	Warrant	1.13 lb	ai/a	48 oz/a		B				
2	Intact	0.5 %	v/v	0.3 qt/a		B				
2	Class Act Ridion	1 %	v/v	0.6 qt/a		B				
3	AG38X8						137.92	10.92	69.8	56.42
3	Xtendimax	0.5 lb	ae/a	22 oz/a		A				
3	Warrant	1.13 lb	ai/a	48 oz/a		A				
3	Mauler	0.25 lb	ai/a	8 oz/a		A				
3	Xtendimax	0.5 lb	ae/a	22 oz/a		B				
3	Roundup Power Max	1.13 lb	ae/a	32 oz/a		B				
3	Warrant	1.13 lb	ai/a	48 oz/a		B				
3	Intact	0.5 %	v/v	0.3 qt/a		B				
3	Class Act Ridion	1 %	v/v	0.6 qt/a		B				
4	30XF0						144.40	10.64	73.3	55.26
4	Xtendimax	0.5 lb	ae/a	22 oz/a		A				
4	Warrant Ultra	1.36 lb	ai/a	50 oz/a		A				
4	Mauler	0.25 lb	ai/a	8 oz/a		A				
4	Xtendimax	0.5 lb	ae/a	22 oz/a		B				
4	Roundup Power Max	1.13 lb	ae/a	32 oz/a		B				
4	Warrant	1.13 lb	ai/a	48 oz/a		B				
4	Intact	0.5 %	v/v	0.3 qt/a		B				
4	Class Act Ridion	1 %	v/v	0.6 qt/a		B				
4	Liberty	0.585 lb	ai/a	32 oz/a		C				
4	N-pak ams	3 %	v/v	1.8 qt/a		C				
5	32XF0						129.10	10.47	65.7	56.38
5	Xtendimax	0.5 lb	ae/a	22 oz/a		A				
5	Warrant Ultra	1.36 lb	ai/a	50 oz/a		A				
5	Mauler	0.25 lb	ai/a	8 oz/a		A				
5	Xtendimax	0.5 lb	ae/a	22 oz/a		B				
5	Roundup Power Max	1.13 lb	ae/a	32 oz/a		B				
5	Warrant	1.13 lb	ai/a	48 oz/a		B				
5	Intact	0.5 %	v/v	0.3 qt/a		B				
5	Class Act Ridion	1 %	v/v	0.6 qt/a		B				
5	Liberty	0.585 lb	ai/a	32 oz/a		C				
5	N-pak ams	3 %	v/v	1.8 qt/a		C				

Pest Type				
Pest Code				
Pest Scientific Name				
Pest Name				
Crop Type, Code	C	GLXMA	C	GLXMA
Crop Name	Soybean	Soybean	Soybean	Soybean
Rating Date	Oct-2-2019	Oct-2-2019	Oct-2-2019	Oct-2-2019
Rating Type	WEIGHT	MOICON	YIELD	WEITES
Rating Unit	LBS	%	BU	LBS
Number of Subsamples	1	1	1	1
Data Entry Date	Oct-4-2019	Oct-4-2019	Oct-4-2019	Oct-4-2019
Rating Timing				
Days After First/Last Applic.	139 83	139 83	139 83	139 83
Trt-Eval Interval				
Plant-Eval Interval	139 DP-1	139 DP-1	139 DP-1	139 DP-1
Days After Emergence	126 DE-1	126 DE-1	126 DE-1	126 DE-1
ARM Action Codes			TY1	
Number of Decimals		2	2	1

Trt No.	Treatment Name	Rate	Other Rate	Other Rate	Appl Unit Code	21	22	23	24
6	36XF0					137.41	10.44	69.9	57.02
6	Xtendimax	0.5 lb ae/a	22 oz/a		A				
6	Warrant Ultra	1.36 lb ai/a	50 oz/a		A				
6	Mauler	0.25 lb ai/a	8 oz/a		A				
6	Xtendimax	0.5 lb ae/a	22 oz/a		B				
6	Roundup Power Max	1.13 lb ae/a	32 oz/a		B				
6	Warrant	1.13 lb ai/a	48 oz/a		B				
6	Intact	0.5 % v/v	0.3 qt/a		B				
6	Class Act Ridion	1 % v/v	0.6 qt/a		B				
6	Liberty	0.585 lb ai/a	32 oz/a		C				
6	N-pak ams	3 % v/v	1.8 qt/a		C				
7	CREDEZNE 2889					146.29	11.91	73.2	52.87
7	Verdict	0.218 lb ai/a	5 oz/a		A				
7	Liberty	0.585 lb ai/a	32 oz/a		B				
7	Durango DMA	1.13 lb ae/a	36 oz/a		B				
7	Outlook	0.56 lb ai/a	12 oz/a		B				
7	N-pak ams	3 % v/v	1.8 qt/a		B				
8	CREDENZE 3309					139.87	11.89	70.0	53.69
8	Verdict	0.218 lb ai/a	5 oz/a		A				
8	Liberty	0.585 lb ai/a	32 oz/a		B				
8	Durango DMA	1.13 lb ae/a	36 oz/a		B				
8	Outlook	0.56 lb ai/a	12 oz/a		B				
8	N-pak ams	3 % v/v	1.8 qt/a		B				
9	CREDENZE 3929					139.36	15.74	66.7	51.92
9	Verdict	0.218 lb ai/a	5 oz/a		A				
9	Liberty	0.585 lb ai/a	32 oz/a		B				
9	Durango DMA	1.13 lb ae/a	36 oz/a		B				
9	Outlook	0.56 lb ai/a	12 oz/a		B				
9	N-pak ams	3 % v/v	1.8 qt/a		B				
10	SC EX932E					132.75	10.30	67.7	55.94
10	Enlist One	0.71 lb ai/a	24 oz/a		A				
10	Sonic	0.175 lb ai/a	4 oz/a		A				
10	Enlist Duo	1.46 lb ai/a	56 oz/a		B				
10	Dual II Magnum	0.95 lb ai/a	16 oz/a		B				
10	Liberty	0.585 lb ai/a	32 oz/a		C				
10	N-pak ams	3 % v/v	1.8 qt/a		C				
11	POND E351					146.64	10.86	74.3	56.60
11	Enlist One	0.71 lb ai/a	24 oz/a		A				
11	Sonic	0.175 lb ai/a	4 oz/a		A				
11	Enlist Duo	1.46 lb ai/a	56 oz/a		B				
11	Dual II Magnum	0.95 lb ai/a	16 oz/a		B				
11	Liberty	0.585 lb ai/a	32 oz/a		C				
11	N-pak ams	3 % v/v	1.8 qt/a		C				

Pest Type				
Pest Code				
Pest Scientific Name				
Pest Name				
Crop Type, Code	C	GLXMA	C	GLXMA
Crop Name	Soybean	Soybean	Soybean	Soybean
Rating Date	Oct-2-2019	Oct-2-2019	Oct-2-2019	Oct-2-2019
Rating Type	WEIGHT	MOICON	YIELD	WEITES
Rating Unit	LBS	%	BU	LBS
Number of Subsamples	1	1	1	1
Data Entry Date	Oct-4-2019	Oct-4-2019	Oct-4-2019	Oct-4-2019
Rating Timing				
Days After First/Last Applic.	139 83	139 83	139 83	139 83
Trt-Eval Interval				
Plant-Eval Interval	139 DP-1	139 DP-1	139 DP-1	139 DP-1
Days After Emergence	126 DE-1	126 DE-1	126 DE-1	126 DE-1
ARM Action Codes			TY1	
Number of Decimals	2	2	1	2

Trt Treatment No. Name	Rate	Unit	Other Rate	Other Rate	Appl Unit Code	21	22	23	24
12 STINE 36EA02						137.34	10.58	69.8	56.01
12 Enlist One	0.71 lb ai/a		24 oz/a		A				
12 Sonic	0.175 lb ai/a		4 oz/a		A				
12 Enlist Duo	1.46 lb ai/a		56 oz/a		B				
12 Dual II Magnum	0.95 lb ai/a		16 oz/a		B				
12 Liberty	0.585 lb ai/a		32 oz/a		C				
12 N-pak ams	3 % v/v		1.8 qt/a		C				
LSD P=.05						.	.	.	.
Standard Deviation						.	.	.	.
CV						.	.	.	.
Grand Mean						141.287	11.305	71.19	55.466
Levene's F						.	.	.	.
Levene's Prob(F)						.	.	.	.
Skewness						0.325	2.7725*	0.4314	-1.2321
Kurtosis						0.1139	8.3675*	-0.3288	0.2683

Crop Type, Code

C = EPPO species (Bayer) codes
 GLXMA, BSOY, Glycine max, Soybean = US

Rating Type

WEIGHT = weight
 MOICON = moisture content
 YIELD = yield
 WEITES = weight - test

Rating Unit

% = percent
 BU = bushel

Plant-Eval Interval

139 DP-1 = 1 GLXMA May-16-2019

ARM Action Codes

TY1 = 0.4942979*[C21]*(100-[C22])/87