

Comparison of commercial weed control programs in Enlist E3 soybean

Trial ID: SOY06-23 Study Dir.: Sprague, Stiles
 Conducted: Campus, C-14 Investigator: Christy Sprague

Planting Date: May-10-2023 **Row Spacing:** 30 IN
Variety: P25A16E **No. of Reps:** 4
Population: 150000 seeds/A **% OM:** 2.6
Soil Type: CL clay loam **pH:** 6.7
Plot Size: 10 X 30 FT **Study Design:** Randomized Complete Block (RCB)

Tillage/Previous Crops: Fall chisel plowed, fall soil finished twice, spring soil finished twice.

Fertilizer:

Crop and Weed Description

Weed	Code	Common Name	Scientific Name
1	ANGR	annual grass	mainly foxtail species
2	CHEAL	common lambsquarters	Chenopodium album
3	AMBEL	common ragweed	Ambrosia artemisiifolia
4	ABUTH	velvetleaf	Abutilon theophrasti
Crop	Code	Common Name	
1	GLXMA	Soybean	

Application Description

	A	B
Application Timing:	PRE	POST
Date Treated:	May-10-2023	Jun-16-2023
Time Treated:	3:30 PM	9:00 AM
% Cloud Cover:	5	100
Air Temp., Unit:	75 F	59 F
% Relative Humidity:	30	85
Wind Speed/Unit/Dir:	5 MPH W	7.5 MPH N
Soil Temp, Unit:	76 F	64 F
Leaf Moist/Dew Presence (Y/N):	N	N
Soil Moist:	5	5

Crop Stage at Each Application

	A	B
Crop 1 Name:	GLXMA	GLXMA
Height:		6 "
Stage:		V2-V3

Weed Stage at Each Application

	A	B
Weed 1 Name:	ANGR	ANGR
Height:		3-7 " (4)
Stage:		3-7L
Weed 2 Name:	CHEAL	CHEAL
Height:		2-7 " (3)
Stage:		8-14L
Weed 3 Name:	AMBEL	AMBEL
Height:		1-5 " (4)
Stage:		6-16L
Weed 4 Name:	ABUTH	ABUTH
Height:		2-3 " (3)
Stage:		3-5L

Weed Density

	1	2	3	4
Date:	Jun-16-2023	Jun-16-2023	Jun-16-2023	Jun-16-2023
Weed Name:	ANGR	CHEAL	AMBEL	ABUTH
Density:	3 FT2	2 FT2	3 FT2	1 FT2

Application Equipment

Appl	Sprayer Type	Ground Speed	Nozzle Type	Nozzle Size	Nozzle Height	Nozzle Spacing	Boom Width	Spray Volume	Carrier	Operation Pressure
A	CUB	3.8 MPH	AIXR	11003	18.0 "	20 "	100 "	19 GAL/AC	WATER	30 PSI
B	CUB	3.8 MPH	AIXR	11003	22.0 "	20 "	100 "	19 GAL/AC	WATER	30 PSI

Comments: Common ragweed (AMBEL) at this location is resistant to the Group 2 (ALS-inhibiting) herbicides.

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Study Director: Sprague, Stiles Sponsor Contact:

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Rating Date	May-31-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023
Rating Type	injury	injury	control	control	control	control
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100
Crop Type, Code	C, GLXMA	C, GLXMA				
Pest Code			ANGR	CHEAL	AMBEL	ABUTH
Trt-Eval Interval	21 DA-A	35 DA-A	35 DA-A	35 DA-A	35 DA-A	35 DA-A
Number of Decimals	0	0	0	0	0	0

Trt No.	Treatment Name	Rate	Unit	Appl Code	Appl Timing	May-31-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023
1	Kyber	1 pt/a		A	PRE	4	0	87	74	72	96
	Enlist Duo	4.75 pt/a		B	POST						
	AMSOL	2.4 qt/a		B	POST						
2	Tendovo	1.75 qt/a		A	PRE	0	0	85	97	75	99
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
3	Authority Edge	7 fl oz/a		A	PRE	0	0	77	100	33	93
	Metribuzin	6 oz/a		A	PRE						
	Anthem MAXX	3 fl oz/a		B	POST						
	Enlist Duo	4.75 pt/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
4	Boundary	1.75 pt/a		A	PRE	0	0	85	96	57	86
	Dual Magnum	1.25 pt/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
5	Tendovo	1.75 qt/a		A	PRE	0	0	75	89	65	93
	Dual Magnum	1.25 pt/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
6	Untreated					0	0	0	0	0	0
7	Enlist Duo	4.75 pt/a		B	POST	0	0	0	0	0	0
	AMS	17 lb/100 gal		B	POST						
8	Zidua PRO	4.5 fl oz/a		A	PRE	0	0	81	91	66	95
	Liberty	32 fl oz/a		B	POST						
	AMS	1.5 lb/a		B	POST						
9	Valor EZ	2 fl oz/a		A	PRE	2	0	82	85	66	88
	Mauler	8 fl oz/a		A	PRE						
	Warrant	48 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
10	Zidua PRO	4.5 fl oz/a		A	PRE	0	0	88	92	74	100
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	32 fl oz/a		B	POST						
	AMS	1.5 lb/a		B	POST						
11	Fierce MTZ	1 pt/a		A	PRE	4	0	90	95	65	95
	Warrant	48 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
12	Fierce EZ	6 fl oz/a		A	PRE	4	0	88	89	65	87
	Perpetuo	6 fl oz/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Surfactant	0.25 % v/v		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
13	Authority Edge	8 fl oz/a		A	PRE	0	0	74	100	49	76
	Metribuzin	6 oz/a		A	PRE						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						

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Investigator: Christy Sprague

Rating Date	May-31-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023	Jun-14-2023				
Rating Type	injury	injury	control	control	control	control				
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100				
Crop Type, Code	C, GLXMA	C, GLXMA								
Pest Code			ANGR	CHEAL	AMBEL	ABUTH				
Trt-Eval Interval	21 DA-A	35 DA-A	35 DA-A	35 DA-A	35 DA-A	35 DA-A				
Number of Decimals	0	0	0	0	0	0				
Trt No.	Treatment Name	Rate	Appl Code	Appl Timing						
14	Kyber	1 pt/a	A	PRE	2	0	80	96	57	88
	Enlist One	32 fl oz/a	B	POST						
	Liberty	32 fl oz/a	B	POST						
	Crop oil concentrate	1 % v/v	B	POST						
	AMSOL	3 qt/a	B	POST						
15	Fierce MTZ	16 fl oz/a	A	PRE	2	0	78	84	53	100
	Perpetuo	6 fl oz/a	B	POST						
	Enlist One	2 pt/a	B	POST						
	Liberty	32 fl oz/a	B	POST						
	Surfactant	0.25 % v/v	B	POST						
	AMS	8.5 lb/100 gal	B	POST						
16	Fierce XLT	4 oz/a	A	PRE	4	0	77	100	50	100
	Perpetuo	6 fl oz/a	B	POST						
	Enlist One	2 pt/a	B	POST						
	Liberty	32 fl oz/a	B	POST						
	Surfactant	0.25 % v/v	B	POST						
	AMS	8.5 lb/100 gal	B	POST						
17	Enlist One	2 pt/a	B	POST	0	0	0	0	0	0
	Liberty	32 fl oz/a	B	POST						
	AMS	17 lb/100 gal	B	POST						
	LSD P=.05				2.6	.	10.8	11.4	14.4	13.6
	Standard Deviation				1.8	0.0	7.6	8.0	10.2	9.6
	CV				150.73	0.0	11.23	10.63	20.42	12.55

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Rating Date	Jun-23-2023	Jun-23-2023	Jun-23-2023	Jun-23-2023	Jun-23-2023	Jun-30-2023
Rating Type	injury	control	control	control	control	injury
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100
Crop Type, Code	C, GLXMA					C, GLXMA
Pest Code		ANGR	CHEAL	AMBEL	ABUTH	
Trt-Eval Interval	7 DA-B	7 DA-B	7 DA-B	7 DA-B	7 DA-B	14 DA-B
Number of Decimals	0	0	0	0	0	0

Trt No.	Treatment Name	Rate	Unit	Appl Code	Appl Timing	1	2	3	4	5	6
1	Kyber	1 pt/a		A	PRE	1	100	100	97	100	0
	Enlist Duo	4.75 pt/a		B	POST						
	AMSOL	2.4 qt/a		B	POST						
2	Tendovo	1.75 qt/a		A	PRE	2	100	100	96	100	0
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
3	Authority Edge	7 fl oz/a		A	PRE	16	100	100	85	100	8
	Metribuzin	6 oz/a		A	PRE						
	Anthem MAXX	3 fl oz/a		B	POST						
	Enlist Duo	4.75 pt/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
4	Boundary	1.75 pt/a		A	PRE	11	100	100	98	100	15
	Dual Magnum	1.25 pt/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
5	Tendovo	1.75 qt/a		A	PRE	8	100	100	97	100	16
	Dual Magnum	1.25 pt/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
6	Untreated					0	0	0	0	0	0
7	Enlist Duo	4.75 pt/a		B	POST	0	100	99	90	100	1
	AMS	17 lb/100 gal		B	POST						
8	Zidua PRO	4.5 fl oz/a		A	PRE	2	100	100	100	100	1
	Liberty	32 fl oz/a		B	POST						
	AMS	1.5 lb/a		B	POST						
9	Valor EZ	2 fl oz/a		A	PRE	2	100	99	99	100	2
	Mauler	8 fl oz/a		A	PRE						
	Warrant	48 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
10	Zidua PRO	4.5 fl oz/a		A	PRE	2	100	100	99	100	1
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	32 fl oz/a		B	POST						
	AMS	1.5 lb/a		B	POST						
11	Fierce MTZ	1 pt/a		A	PRE	2	100	100	98	100	4
	Warrant	48 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
12	Fierce EZ	6 fl oz/a		A	PRE	16	100	100	99	100	10
	Perpetuo	6 fl oz/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Surfactant	0.25 % v/v		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
13	Authority Edge	8 fl oz/a		A	PRE	4	100	100	98	99	0
	Metribuzin	6 oz/a		A	PRE						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						

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Study Director: Sprague, Stiles Sponsor Contact:

Investigator: Christy Sprague

Rating Date	Jun-23-2023	Jun-23-2023	Jun-23-2023	Jun-23-2023	Jun-23-2023	Jun-30-2023				
Rating Type	injury	control	control	control	control	injury				
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100				
Crop Type, Code	C, GLXMA					C, GLXMA				
Pest Code		ANGR	CHEAL	AMBEL	ABUTH					
Trt-Eval Interval	7 DA-B	7 DA-B	7 DA-B	7 DA-B	7 DA-B	14 DA-B				
Number of Decimals	0	0	0	0	0	0				
Trt No.	Treatment Name	Rate	Appl Code	Appl Timing						
14	Kyber	1 pt/a	A	PRE	5	100	100	99	99	2
	Enlist One	32 fl oz/a	B	POST						
	Liberty	32 fl oz/a	B	POST						
	Crop oil concentrate	1 % v/v	B	POST						
	AMSOL	3 qt/a	B	POST						
15	Fierce MTZ	16 fl oz/a	A	PRE	16	100	100	98	100	9
	Perpetuo	6 fl oz/a	B	POST						
	Enlist One	2 pt/a	B	POST						
	Liberty	32 fl oz/a	B	POST						
	Surfactant	0.25 % v/v	B	POST						
	AMS	8.5 lb/100 gal	B	POST						
16	Fierce XLT	4 oz/a	A	PRE	14	100	100	98	100	10
	Perpetuo	6 fl oz/a	B	POST						
	Enlist One	2 pt/a	B	POST						
	Liberty	32 fl oz/a	B	POST						
	Surfactant	0.25 % v/v	B	POST						
	AMS	8.5 lb/100 gal	B	POST						
17	Enlist One	2 pt/a	B	POST	2	98	100	94	100	0
	Liberty	32 fl oz/a	B	POST						
	AMS	17 lb/100 gal	B	POST						
	LSD P=.05				2.8	1.0	1.2	5.3	1.0	2.8
	Standard Deviation				2.0	0.7	0.9	3.7	0.7	1.9
	CV				33.48	0.73	0.92	4.07	0.76	43.02

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Study Director: Sprague, Stiles Sponsor Contact:

Investigator: Christy Sprague

Rating Date	Jun-30-2023	Jun-30-2023	Jun-30-2023	Jun-30-2023	Jul-14-2023	Jul-14-2023
Rating Type	control	control	control	control	injury	control
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100
Crop Type, Code					C, GLXMA	
Pest Code	ANGR	CHEAL	AMBEL	ABUTH		ANGR
Trt-Eval Interval	14 DA-B	14 DA-B	14 DA-B	14 DA-B	28 DA-B	28 DA-B
Number of Decimals	0	0	0	0	0	0

Trt No.	Treatment Name	Rate	Unit	Appl Code	Appl Timing	Jun-30-2023 control	Jun-30-2023 control	Jun-30-2023 control	Jun-30-2023 control	Jul-14-2023 injury	Jul-14-2023 control
1	Kyber	1 pt/a		A	PRE	100	100	100	100	0	100
	Enlist Duo	4.75 pt/a		B	POST						
	AMSOL	2.4 qt/a		B	POST						
2	Tendovo	1.75 qt/a		A	PRE	100	100	99	100	0	100
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
3	Authority Edge	7 fl oz/a		A	PRE	100	100	99	100	0	100
	Metribuzin	6 oz/a		A	PRE						
	Anthem MAXX	3 fl oz/a		B	POST						
	Enlist Duo	4.75 pt/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
4	Boundary	1.75 pt/a		A	PRE	100	100	100	100	0	100
	Dual Magnum	1.25 pt/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
5	Tendovo	1.75 qt/a		A	PRE	100	100	100	100	0	100
	Dual Magnum	1.25 pt/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
6	Untreated					0	0	0	0	0	0
7	Enlist Duo	4.75 pt/a		B	POST	100	100	100	100	0	96
	AMS	17 lb/100 gal		B	POST						
8	Zidua PRO	4.5 fl oz/a		A	PRE	100	100	100	100	0	99
	Liberty	32 fl oz/a		B	POST						
	AMS	1.5 lb/a		B	POST						
9	Valor EZ	2 fl oz/a		A	PRE	100	100	100	100	0	100
	Mauler	8 fl oz/a		A	PRE						
	Warrant	48 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
10	Zidua PRO	4.5 fl oz/a		A	PRE	100	100	100	100	0	100
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	32 fl oz/a		B	POST						
	AMS	1.5 lb/a		B	POST						
11	Fierce MTZ	1 pt/a		A	PRE	100	100	99	100	0	100
	Warrant	48 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
12	Fierce EZ	6 fl oz/a		A	PRE	100	100	100	100	0	100
	Perpetuo	6 fl oz/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Surfactant	0.25 % v/v		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
13	Authority Edge	8 fl oz/a		A	PRE	99	100	99	100	0	100
	Metribuzin	6 oz/a		A	PRE						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						

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Protocol ID: SOY06-23 Location: Campus, C-14 Trial Year: 2023

Study Director: Sprague, Stiles Sponsor Contact:

Investigator: Christy Sprague

Rating Date	Jun-30-2023	Jun-30-2023	Jun-30-2023	Jun-30-2023	Jul-14-2023	Jul-14-2023
Rating Type	control	control	control	control	injury	control
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100
Crop Type, Code					C, GLXMA	
Pest Code	ANGR	CHEAL	AMBEL	ABUTH		ANGR
Trt-Eval Interval	14 DA-B	14 DA-B	14 DA-B	14 DA-B	28 DA-B	28 DA-B
Number of Decimals	0	0	0	0	0	0
Trt No.	Treatment Name	Rate	Appl Code	Appl Timing		
14	Kyber	1 pt/a	A	PRE	100	100
	Enlist One	32 fl oz/a	B	POST		
	Liberty	32 fl oz/a	B	POST		
	Crop oil concentrate	1 % v/v	B	POST		
	AMSOL	3 qt/a	B	POST		
15	Fierce MTZ	16 fl oz/a	A	PRE	99	100
	Perpetuo	6 fl oz/a	B	POST		
	Enlist One	2 pt/a	B	POST		
	Liberty	32 fl oz/a	B	POST		
	Surfactant	0.25 % v/v	B	POST		
	AMS	8.5 lb/100 gal	B	POST		
16	Fierce XLT	4 oz/a	A	PRE	99	100
	Perpetuo	6 fl oz/a	B	POST		
	Enlist One	2 pt/a	B	POST		
	Liberty	32 fl oz/a	B	POST		
	Surfactant	0.25 % v/v	B	POST		
	AMS	8.5 lb/100 gal	B	POST		
17	Enlist One	2 pt/a	B	POST	97	100
	Liberty	32 fl oz/a	B	POST		
	AMS	17 lb/100 gal	B	POST		
	LSD P=.05				2.3	0.3
	Standard Deviation				1.6	0.2
	CV				1.73	0.26
					2.84	0.13
					0.0	0.0
					3.1	2.2
					2.33	

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Investigator: Christy Sprague

Rating Date	Jul-14-2023	Jul-14-2023	Jul-14-2023	Oct-23-2023	Oct-23-2023	Oct-23-2023					
Rating Type	control	control	control	control	control	control					
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100					
Crop Type, Code											
Pest Code	CHEAL	AMBEL	ABUTH	ANGR	CHEAL	AMBEL					
Trt-Eval Interval	28 DA-B	28 DA-B	28 DA-B	@ harvest	@ harvest	@ harvest					
Number of Decimals	0	0	0	0	0	0					
Trt No.	Treatment Name	Rate	Unit	Appl Code	Appl Timing						
1	Kyber	1 pt/a		A	PRE	100	100	100	100	100	100
	Enlist Duo	4.75 pt/a		B	POST						
	AMSOL	2.4 qt/a		B	POST						
2	Tendovo	1.75 qt/a		A	PRE	100	99	100	100	100	98
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
3	Authority Edge	7 fl oz/a		A	PRE	100	99	99	100	100	98
	Metribuzin	6 oz/a		A	PRE						
	Anthem MAXX	3 fl oz/a		B	POST						
	Enlist Duo	4.75 pt/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
4	Boundary	1.75 pt/a		A	PRE	100	99	100	100	100	97
	Dual Magnum	1.25 pt/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
5	Tendovo	1.75 qt/a		A	PRE	100	99	100	100	100	98
	Dual Magnum	1.25 pt/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
6	Untreated					0	0	0	0	0	0
7	Enlist Duo	4.75 pt/a		B	POST	98	97	99	94	94	97
	AMS	17 lb/100 gal		B	POST						
8	Zidua PRO	4.5 fl oz/a		A	PRE	100	99	100	100	100	99
	Liberty	32 fl oz/a		B	POST						
	AMS	1.5 lb/a		B	POST						
9	Valor EZ	2 fl oz/a		A	PRE	99	100	100	100	100	100
	Mauler	8 fl oz/a		A	PRE						
	Warrant	48 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
10	Zidua PRO	4.5 fl oz/a		A	PRE	100	99	100	100	100	100
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	32 fl oz/a		B	POST						
	AMS	1.5 lb/a		B	POST						
11	Fierce MTZ	1 pt/a		A	PRE	100	100	100	100	100	100
	Warrant	48 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Roundup PowerMax 3	30 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
12	Fierce EZ	6 fl oz/a		A	PRE	100	100	100	100	100	100
	Perpetuo	6 fl oz/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Surfactant	0.25 % v/v		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
13	Authority Edge	8 fl oz/a		A	PRE	100	98	100	98	100	99
	Metribuzin	6 oz/a		A	PRE						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						

Could not calculate LSD (% mean diff) for columns 2,17 because error mean square = 0.

Michigan State University

Comparison of commercial weed control programs in Enlist E3 soybean

Trial ID: SOY06-23

Protocol ID: SOY06-23 Location: Campus, C-14 Trial Year: 2023

Study Director: Sprague, Stiles Sponsor Contact:

Investigator: Christy Sprague

Rating Date	Jul-14-2023	Jul-14-2023	Jul-14-2023	Oct-23-2023	Oct-23-2023	Oct-23-2023					
Rating Type	control	control	control	control	control	control					
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100	%, 0, 100					
Crop Type, Code											
Pest Code	CHEAL	AMBEL	ABUTH	ANGR	CHEAL	AMBEL					
Trt-Eval Interval	28 DA-B	28 DA-B	28 DA-B	@ harvest	@ harvest	@ harvest					
Number of Decimals	0	0	0	0	0	0					
Trt No.	Treatment Name	Rate	Unit	Appl Code	Appl Timing						
14	Kyber	1 pt/a		A	PRE	100	100	100	100	100	100
	Enlist One	32 fl oz/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Crop oil concentrate	1 % v/v		B	POST						
	AMSOL	3 qt/a		B	POST						
15	Fierce MTZ	16 fl oz/a		A	PRE	100	99	100	99	100	98
	Perpetuo	6 fl oz/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Surfactant	0.25 % v/v		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
16	Fierce XLT	4 oz/a		A	PRE	100	100	100	99	100	99
	Perpetuo	6 fl oz/a		B	POST						
	Enlist One	2 pt/a		B	POST						
	Liberty	32 fl oz/a		B	POST						
	Surfactant	0.25 % v/v		B	POST						
	AMS	8.5 lb/100 gal		B	POST						
17	Enlist One	2 pt/a		B	POST	97	89	98	88	96	89
	Liberty	32 fl oz/a		B	POST						
	AMS	17 lb/100 gal		B	POST						
	LSD P=.05					2.5	3.3	2.0	2.8	2.5	4.7
	Standard Deviation					1.8	2.3	1.4	2.0	1.8	3.3
	CV					1.91	2.51	1.47	2.12	1.92	3.59

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Michigan State University

Comparison of commercial weed control programs in Enlist E3 soybean

Trial ID: SOY06-23

Protocol ID: SOY06-23 Location: Campus, C-14 Trial Year: 2023

Study Director: Sprague, Stiles Sponsor Contact:

Investigator: Christy Sprague

Rating Date	Oct-23-2023	Oct-23-2023	Oct-23-2023
Rating Type	control	moisture	yield
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	bu/A, -, -
Crop Type, Code		C, GLXMA	C, GLXMA
Pest Code	ABUTH		
Trt-Eval Interval	@ harvest	134 DA-C	@ 13% mois
Number of Decimals	0	1	1

Trt No.	Treatment Name	Rate Unit	Appl Code	Appl Timing			
1	Kyber	1 pt/a	A	PRE	100	17.0	70.7
	Enlist Duo	4.75 pt/a	B	POST			
	AMSOL	2.4 qt/a	B	POST			
2	Tendovo	1.75 qt/a	A	PRE	100	16.6	69.3
	Enlist One	2 pt/a	B	POST			
	Roundup PowerMax 3	30 fl oz/a	B	POST			
	AMS	8.5 lb/100 gal	B	POST			
3	Authority Edge	7 fl oz/a	A	PRE	100	17.0	68.3
	Metribuzin	6 oz/a	A	PRE			
	Anthem MAXX	3 fl oz/a	B	POST			
	Enlist Duo	4.75 pt/a	B	POST			
	AMS	17 lb/100 gal	B	POST			
4	Boundary	1.75 pt/a	A	PRE	100	16.6	69.7
	Dual Magnum	1.25 pt/a	B	POST			
	Enlist One	2 pt/a	B	POST			
	Roundup PowerMax 3	30 fl oz/a	B	POST			
	AMS	8.5 lb/100 gal	B	POST			
5	Tendovo	1.75 qt/a	A	PRE	100	16.7	67.1
	Dual Magnum	1.25 pt/a	B	POST			
	Enlist One	2 pt/a	B	POST			
	Roundup PowerMax 3	30 fl oz/a	B	POST			
	AMS	8.5 lb/100 gal	B	POST			
6	Untreated				0	16.3	20.1
7	Enlist Duo	4.75 pt/a	B	POST	99	16.2	70.4
	AMS	17 lb/100 gal	B	POST			
8	Zidua PRO	4.5 fl oz/a	A	PRE	100	16.9	69.8
	Liberty	32 fl oz/a	B	POST			
	AMS	1.5 lb/a	B	POST			
9	Valor EZ	2 fl oz/a	A	PRE	100	16.9	72.6
	Mauler	8 fl oz/a	A	PRE			
	Warrant	48 fl oz/a	B	POST			
	Liberty	32 fl oz/a	B	POST			
	Roundup PowerMax 3	30 fl oz/a	B	POST			
	AMS	17 lb/100 gal	B	POST			
10	Zidua PRO	4.5 fl oz/a	A	PRE	100	16.1	71.1
	Liberty	32 fl oz/a	B	POST			
	Roundup PowerMax 3	32 fl oz/a	B	POST			
	AMS	1.5 lb/a	B	POST			
11	Fierce MTZ	1 pt/a	A	PRE	100	16.6	68.2
	Warrant	48 fl oz/a	B	POST			
	Liberty	32 fl oz/a	B	POST			
	Roundup PowerMax 3	30 fl oz/a	B	POST			
	AMS	17 lb/100 gal	B	POST			
12	Fierce EZ	6 fl oz/a	A	PRE	100	16.4	69.4
	Perpetuo	6 fl oz/a	B	POST			
	Enlist One	2 pt/a	B	POST			
	Liberty	32 fl oz/a	B	POST			
	Surfactant	0.25 % v/v	B	POST			
	AMS	8.5 lb/100 gal	B	POST			
13	Authority Edge	8 fl oz/a	A	PRE	100	16.5	72.1
	Metribuzin	6 oz/a	A	PRE			
	Enlist One	2 pt/a	B	POST			
	Liberty	32 fl oz/a	B	POST			
	AMS	17 lb/100 gal	B	POST			

Could not calculate LSD (% mean diff) for columns 2,17 because error mean square = 0.

Michigan State University

Comparison of commercial weed control programs in Enlist E3 soybean

Trial ID: SOY06-23

Protocol ID: SOY06-23 Location: Campus, C-14 Trial Year: 2023

Study Director: Sprague, Stiles Sponsor Contact:

Investigator: Christy Sprague

Rating Date	Oct-23-2023	Oct-23-2023	Oct-23-2023					
Rating Type	control	moisture	yield					
Rating Unit/Min/Max	%, 0, 100	%, 0, 100	bu/A, -, -					
Crop Type, Code		C, GLXMA	C, GLXMA					
Pest Code	ABUTH							
Trt-Eval Interval	@ harvest	134 DA-C	@ 13% mois					
Number of Decimals	0	1	1					
Trt No.	Treatment Name	Rate	Unit	Appl Code	Appl Timing			
14	Kyber	1 pt/a		A	PRE	100	16.2	70.4
	Enlist One	32 fl oz/a		B	POST			
	Liberty	32 fl oz/a		B	POST			
	Crop oil concentrate	1 % v/v		B	POST			
	AMSOL	3 qt/a		B	POST			
15	Fierce MTZ	16 fl oz/a		A	PRE	100	17.0	65.0
	Perpetuo	6 fl oz/a		B	POST			
	Enlist One	2 pt/a		B	POST			
	Liberty	32 fl oz/a		B	POST			
	Surfactant	0.25 % v/v		B	POST			
	AMS	8.5 lb/100 gal		B	POST			
16	Fierce XLT	4 oz/a		A	PRE	100	17.7	65.9
	Perpetuo	6 fl oz/a		B	POST			
	Enlist One	2 pt/a		B	POST			
	Liberty	32 fl oz/a		B	POST			
	Surfactant	0.25 % v/v		B	POST			
	AMS	8.5 lb/100 gal		B	POST			
17	Enlist One	2 pt/a		B	POST	98	16.8	67.7
	Liberty	32 fl oz/a		B	POST			
	AMS	17 lb/100 gal		B	POST			
	LSD P=.05					1.3	1.84	6.13
	Standard Deviation					0.9	1.30	4.31
	CV					0.96	7.78	6.5

Could not calculate LSD (% mean diff) for columns 2,17 because error mean square = 0.