

Marestail Burndown in Soybean with Aim, Authority First and Authority MTZ combined with 2,4-D or Dicamba.

Trial ID: 15-FagerS-FMC-AimAuth Location: Murphysboro, IL Trial Year: 2015
Investigator: Ronald F. Krausz

Trial Status: F one-year/final
Initiation Date: 4-16-15
Completion Date: 5-16-15

Trial Location

City: Murphysboro **Country:** USA
State/Prov.: Illinois IL
Postal Code: 62966

Objectives:

Evaluate foliar activity of Aim burndown treatment concepts and their fit within current and future soybean trait systems.

Contacts

Study Director: Ronald F. Krausz **Title:** Researcher/Farm Manager
Organization: Belleville Research Center - Southern Illinois Univ Carbondale
Address: 2036 Charles Lane **Phone No.:** 618-566-4761
City+State/Prov: Belleville, IL
Postal Code: 62221 **E-mail:** rkrausz@siu.edu
Country: USA

Crop Description

Crop 1: GLXMA Glycine max Soybean
Variety: AG3832 **BBCH Scale:** BSOY
Description: RR2Y
Planting Date: 5-19-15
Planting Rate, Unit: 140000 S/A **Planting Method:** SEEDED
Depth, Unit: 1.0 IN
Row Spacing, Unit: 30 IN

Pest Description

Pest 1 Type: W **Code:** ERICA *Conyza canadensis* (L.) Crong.
Common Name: horseweed
Description: glyphosate-resistant marestail
Pest 2 Type: W **Code:** LAMAM *Lamium amplexicaule* L.
Common Name: henbit
Pest 3 Type: W **Code:** TTTTT
Common Name: weeds, generally

Site and Design

Treated Plot Width: 6.67 FT **Total Plot Width:** 10 FT **Site Type:** FIELD
Treated Plot Length: 30 FT **Total Plot Length:** 30 FT **Experimental Unit:** 1 PLOT
Tillage Type: NOTILL no-till
Replications: 4 **Study Design:** RACOB� Randomized Complete Block (RCB)
Untreated Arrangement: INCLUDED single control randomized in each block

No.	Previous Crop	Year
1.	GLXMA	2014

Maintenance

No.	Maintenance Product Name
1.	N 0 LB/A, P2O5 0 LB/A, K2O 0 LB/A

Soil Description

% OM: 1.87 **Texture:** SIL silt loam
pH: 5.5 **Soil Name:** Alvin
CEC: 7.06

Additional Measured Elements

Element	Quantity	Unit
P1	172	lb/A
K	446	lb/A

Moisture and Weather Conditions

Overall Moisture Conditions: ABONOR
Closest Weather Station: SOUTHERN IL AIRPORT (93810) **Distance, Unit:** 3.4 MI

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No.	Date	Amount	Unit	Type	Type Description	Interval	Unit	Min Temp	Max Temp	Temp Unit
1.	3-1-15	0.92	IN	RAIN	rain	4	DAY			
2.	3-4-15					7	DAY	-1	55	F
3.	3-9-15	0.69	IN	RAIN	rain	2	DAY			
4.	3-11-15					7	DAY	35	74	F
5.	3-13-15	2.81	IN	RAIN	rain	2	DAY			
6.	3-18-15					7	DAY	36	72	F
7.	3-24-15	1.66	IN	RAIN	rain	3	DAY			
8.	3-25-15					7	DAY	25	74	F
9.	4-1-15					7	DAY	33	76	F
10.	4-2-15	2.72	IN	RAIN	rain	2	DAY			
11.	4-6-15	1.65	IN	RAIN	rain	4	DAY			
12.	4-8-15					7	DAY	43	78	F
13.	4-13-15	0.15	IN	RAIN	rain	4	DAY			
14.	4-15-15					7	DAY	42	79	F
15.	4-19-15	0.89	IN	RAIN	rain	3	DAY			
16.	4-22-15					7	DAY	36	77	F
17.	4-25-15	0.26	IN	RAIN	rain	1	DAY			
18.	4-29-15					7	DAY	36	84	F
19.	5-6-15					7	DAY	49	85	F
20.	5-7-15	1.59	IN	RAIN	rain	5	DAY			
21.	5-13-15					7	DAY	45	83	F
22.	5-14-15	0.49	IN	RAIN	rain	5	DAY			
23.	5-20-15					7	DAY	44	85	F
24.	5-20-15	0.46	IN	RAIN	rain	1	DAY			
25.	5-24-15	0.46	IN	RAIN	rain	1	DAY			
26.	5-25-15	0.05	IN	RAIN	rain	1	DAY			
27.	5-27-15					7	DAY	55	84	F
28.	5-27-15	0.13	IN	RAIN	rain	1	DAY			
29.	5-29-15	0.07	IN	RAIN	rain	1	DAY			
30.	5-30-15	0.62	IN	RAIN	rain	1	DAY			

Application Description

	A
Application Date:	4-16-15
Appl. Start Time:	16:30
Appl. Stop Time:	17:15
Application Method:	Spray
Application Timing:	1-2"MT
Application Placement:	BROFOL
Applied By:	EJM
Air Temperature, Unit:	79 F
% Relative Humidity:	66
Wind Velocity, Unit:	1 MPH
Wind Direction:	W
Dew Presence (Y/N):	N
Soil Temperature, Unit:	63 F
Soil Moisture:	NORMAL
% Cloud Cover:	0
Next Moisture Occurred On:	4-19-15
Time to Next Moisture, Unit:	3 DAY

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Trial ID: 15-FagerS-FMC-AimAuth Location: Murphysboro, IL Trial Year: 2015
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Crop Stage At Each Application

	A
Crop 1 Code, BBCH Scale:	GLXMA
Stage Scale Used:	DESC
Stage Majority, Percent:	NA

Pest Stage At Each Application

	A
Pest 1 Code, Type, Scale:	ERICA W
Stage Majority, Percent:	10
Stage Minimum, Percent:	7
Stage Maximum, Percent:	18
Height, Unit:	1 IN
Height Minimum, Maximum:	0.25 1
Density, Unit:	5 FT2
Pest 2 Code, Type, Scale:	LAMAM W
Stage Majority, Percent:	10+
Stage Minimum, Percent:	10+
Stage Maximum, Percent:	10+
Height, Unit:	6 IN
Height Minimum, Maximum:	4 6
Density, Unit:	1 FT2
Pest 3 Code, Type, Scale:	TTTTT W
Stage Majority, Percent:	NA

Application Equipment

	A
Appl. Equipment:	CO2 sprayer
Equipment Type:	BACSPR
Operation Pressure, Unit:	30 PSI
Nozzle Type:	XR
Nozzle Size:	8003
Boom Length, Unit:	6.67 FT
Spray Volume, Unit:	20 GPA

Marestail Burndown in Soybean with Aim, Authority First and Authority MTZ combined with 2,4-D or Dicamba.

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Pest Code		ERICA-HR					LAMAM							
Crop Code		ERICA-HR					LAMAM							
Rating Date		4-21-15					5-1-15							
Rating Type		Control					Control							
Rating Unit		Percent					Percent							
Rating Timing		5 DA-A					15 DA-A							
Trt-Eval Interval		5 DA-A					15 DA-A							
Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Other Rate	Other Rate Unit	Growth Stage	Appl Code					
1	2,4-D LV 4 AUTHORITY FIRST DF MSO (MSO ULTRA) N-PAK AMS	3.8 70 100 100	EC WG SL SL	0.475 0.175 1 % 2.5 %	lb ae/a lb ai/a v/v v/v	16 4 1 2.5	fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A	63 ij	92 ef	98 a	63 def	97 ab
2	2,4-D LV 4 AUTHORITY MTZ DF MSO (MSO ULTRA) N-PAK AMS	3.8 45 100 100	EC WG SL SL	0.475 0.394 1 % 2.5 %	lb ae/a lb ai/a v/v v/v	16 14 1 2.5	fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A	75 efg	96 a-d	94 bc	73 abc	98 a
3	AIM EC 2,4-D LV 4 AUTHORITY FIRST DF MSO (MSO ULTRA) N-PAK AMS	2 3.8 70 100 100	EC EC WG SL SL	0.0156 0.475 0.175 1 % 2.5 %	lb ai/a lb ae/a lb ai/a v/v v/v	1 16 4 1 2.5	fl oz/a fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A MT A	75 efg	94 b-f	99 a	60 d-g	96 abc
4	AIM EC 2,4-D LV 4 AUTHORITY MTZ DF MSO (MSO ULTRA) N-PAK AMS	2 3.8 45 100 100	EC EC WG SL SL	0.0156 0.475 0.394 1 % 2.5 %	lb ai/a lb ae/a lb ai/a v/v v/v	1 16 14 1 2.5	fl oz/a fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A MT A	89 b	98 ab	92 c	79 a	99 a
5	2,4-D LV 4 AUTHORITY FIRST DF MSO (MSO ULTRA) N-PAK AMS	3.8 70 100 100	EC WG SL SL	0.95 0.175 1 % 2.5 %	lb ae/a lb ai/a v/v v/v	32 4 1 2.5	fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A	69 ghi	92 ef	99 a	56 efg	97 abc
6	2,4-D LV 4 AUTHORITY MTZ DF MSO (MSO ULTRA) N-PAK AMS	3.8 45 100 100	EC WG SL SL	0.95 0.394 1 % 2.5 %	lb ae/a lb ai/a v/v v/v	32 14 1 2.5	fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A	85 bc	97 ab	98 ab	78 a	99 a
7	AIM EC 2,4-D LV 4 AUTHORITY FIRST DF MSO (MSO ULTRA) N-PAK AMS	2 3.8 70 100 100	EC EC WG SL SL	0.0156 0.95 0.175 1 % 2.5 %	lb ai/a lb ae/a lb ai/a v/v v/v	1 32 4 1 2.5	fl oz/a fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A MT A	71 fgh	95 a-e	99 a	66 cd	96 abc
8	AIM EC 2,4-D LV 4 AUTHORITY MTZ DF MSO (MSO ULTRA) N-PAK AMS	2 3.8 45 100 100	EC EC WG SL SL	0.0156 0.95 0.394 1 % 2.5 %	lb ai/a lb ae/a lb ai/a v/v v/v	1 32 14 1 2.5	fl oz/a fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A MT A	83 bc	98 ab	99 a	76 a	99 a
9	CLARITY AUTHORITY FIRST DF MSO (MSO ULTRA) N-PAK AMS	4 70 100 100	SL WG SL SL	0.25 0.175 1 % 2.5 %	lb ae/a lb ai/a v/v v/v	8 4 1 2.5	fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A	58 j	90 f	99 a	73 abc	98 ab
10	CLARITY AUTHORITY MTZ DF MSO (MSO ULTRA) N-PAK AMS	4 45 100 100	SL WG SL SL	0.25 0.394 1 % 2.5 %	lb ae/a lb ai/a v/v v/v	8 14 1 2.5	fl oz/a oz/a v/v v/v	1-2" 1-2" 1-2" 1-2"	MT A MT A MT A MT A	81 cde	94 b-f	96 abc	76 ab	98 ab

Means followed by same letter do not significantly differ (P=.05, LSD)
Mean comparisons performed only when AOV Treatment P(F) is significant at mean comparison OSL.
Missing data estimates are included in columns: Average=6,8

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Pest Code	Crop Code	Rating Date	Rating Type	Rating Unit	Rating Timing	Trt-Eval Interval	ERICA-HR	ERICA-HR	ERICA-HR	LAMAM	LAMAM
							4-21-15 Control Percent	5-1-15 Control Percent	5-16-15 Control Percent	4-21-15 Control Percent	5-1-15 Control Percent
							5 DA-A	15 DA-A	30 DA-A	5 DA-A	15 DA-A
Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Other Rate	Other Rate Unit	Growth Stage	Appl Code		
11	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		73 fg	93 def
	CLARITY	4	SL	0.25	lb ae/a	8	fl oz/a	1-2"MT A			99 a
	AUTHORITY FIRST DF	70	WG	0.175	lb ai/a	4	oz/a	1-2"MT A		53 g	92 c
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
12	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		89 b	98 ab
	CLARITY	4	SL	0.25	lb ae/a	8	fl oz/a	1-2"MT A			98 a
	AUTHORITY MTZ DF	45	WG	0.394	lb ai/a	14	oz/a	1-2"MT A		74 abc	99 a
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
13	CLARITY	4	SL	0.5	lb ae/a	16	fl oz/a	1-2"MT A		65 hi	93 c-f
	AUTHORITY FIRST DF	70	WG	0.175	lb ai/a	4	oz/a	1-2"MT A			99 a
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A		64 de	93 bc
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
14	CLARITY	4	SL	0.5	lb ae/a	16	fl oz/a	1-2"MT A		83 bcd	97 abc
	AUTHORITY MTZ DF	45	WG	0.394	lb ai/a	14	oz/a	1-2"MT A			99 a
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A		79 a	99 a
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
15	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		69 ghi	94 b-f
	CLARITY	4	SL	0.5	lb ae/a	16	fl oz/a	1-2"MT A			99 a
	AUTHORITY FIRST DF	70	WG	0.175	lb ai/a	4	oz/a	1-2"MT A		55 fg	87 d
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
16	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		85 bc	97 ab
	CLARITY	4	SL	0.5	lb ae/a	16	fl oz/a	1-2"MT A			99 a
	AUTHORITY MTZ DF	45	WG	0.394	lb ai/a	14	oz/a	1-2"MT A		73 abc	99 a
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
17	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		76 def	81 g
	2,4-D LV 4	3.8	EC	0.475	lb ae/a	16	fl oz/a	1-2"MT A			68 d
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A		68 bcd	81 e
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
18	SHARPEN	2.85	SC	0.0223	lb ai/a	1	fl oz/a	1-2"MT A		97 a	99 a
	2,4-D LV 4	3.8	EC	0.475	lb ae/a	16	fl oz/a	1-2"MT A			96 abc
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A		54 g	87 d
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
19	NONTREATED									0	0
LSD P=.05										6.8	4.1
Standard Deviation										4.8	2.9
CV										6.21	3.06
Replicate F										0.201	2.102
Replicate Prob(F)										0.8950	0.1129
Treatment F										18.729	8.553
Treatment Prob(F)										0.0001	0.0001

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							TTTTT	TTTTT
							5-1-15	5-16-15
							Control	Control
							Percent	Percent
							15 DA-A	30 DA-A
Trt No.	Treatment Name	Form Conc	Form Type	Rate Rate	Other Rate	Other Rate	Growth Stage	Appl Code
1	2,4-D LV 4	3.8 EC		0.475 lb ae/a	16 fl oz/a		1-2"MT A	87 de
	AUTHORITY FIRST DF	70 WG		0.175 lb ai/a	4 oz/a		1-2"MT A	87 bcd
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
2	2,4-D LV 4	3.8 EC		0.475 lb ae/a	16 fl oz/a		1-2"MT A	94 abc
	AUTHORITY MTZ DF	45 WG		0.394 lb ai/a	14 oz/a		1-2"MT A	85 d
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
3	AIM EC	2 EC		0.0156 lb ai/a	1 fl oz/a		1-2"MT A	91 a-d
	2,4-D LV 4	3.8 EC		0.475 lb ae/a	16 fl oz/a		1-2"MT A	90 a-d
	AUTHORITY FIRST DF	70 WG		0.175 lb ai/a	4 oz/a		1-2"MT A	
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
4	AIM EC	2 EC		0.0156 lb ai/a	1 fl oz/a		1-2"MT A	97 a
	2,4-D LV 4	3.8 EC		0.475 lb ae/a	16 fl oz/a		1-2"MT A	86 cd
	AUTHORITY MTZ DF	45 WG		0.394 lb ai/a	14 oz/a		1-2"MT A	
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
5	2,4-D LV 4	3.8 EC		0.95 lb ae/a	32 fl oz/a		1-2"MT A	89 cde
	AUTHORITY FIRST DF	70 WG		0.175 lb ai/a	4 oz/a		1-2"MT A	86 cd
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
6	2,4-D LV 4	3.8 EC		0.95 lb ae/a	32 fl oz/a		1-2"MT A	96 ab
	AUTHORITY MTZ DF	45 WG		0.394 lb ai/a	14 oz/a		1-2"MT A	90 a-d
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
7	AIM EC	2 EC		0.0156 lb ai/a	1 fl oz/a		1-2"MT A	93 a-d
	2,4-D LV 4	3.8 EC		0.95 lb ae/a	32 fl oz/a		1-2"MT A	90 a-d
	AUTHORITY FIRST DF	70 WG		0.175 lb ai/a	4 oz/a		1-2"MT A	
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
8	AIM EC	2 EC		0.0156 lb ai/a	1 fl oz/a		1-2"MT A	97 a
	2,4-D LV 4	3.8 EC		0.95 lb ae/a	32 fl oz/a		1-2"MT A	95 a
	AUTHORITY MTZ DF	45 WG		0.394 lb ai/a	14 oz/a		1-2"MT A	
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
9	CLARITY	4 SL		0.25 lb ae/a	8 fl oz/a		1-2"MT A	91 a-d
	AUTHORITY FIRST DF	70 WG		0.175 lb ai/a	4 oz/a		1-2"MT A	88 bcd
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	
10	CLARITY	4 SL		0.25 lb ae/a	8 fl oz/a		1-2"MT A	92 a-d
	AUTHORITY MTZ DF	45 WG		0.394 lb ai/a	14 oz/a		1-2"MT A	84 d
	MSO (MSO ULTRA)	100 SL		1 % v/v	1 % v/v		1-2"MT A	
	N-PAK AMS	100 SL		2.5 % v/v	2.5 % v/v		1-2"MT A	

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Pest Code	TTTTT	TTTTT									
Crop Code											
Rating Date	5-1-15	5-16-15									
Rating Type	Control	Control									
Rating Unit	Percent	Percent									
Rating Timing											
Trt-Eval Interval	15 DA-A	30 DA-A									
Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Other Rate	Other Rate Unit	Growth Stage	Appl Code		
11	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		91 bcd	90 a-d
	CLARITY	4	SL	0.25	lb ae/a	8	fl oz/a	1-2"MT A			
	AUTHORITY FIRST DF	70	WG	0.175	lb ai/a	4	oz/a	1-2"MT A			
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
12	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		96 ab	90 a-d
	CLARITY	4	SL	0.25	lb ae/a	8	fl oz/a	1-2"MT A			
	AUTHORITY MTZ DF	45	WG	0.394	lb ai/a	14	oz/a	1-2"MT A			
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
13	CLARITY	4	SL	0.5	lb ae/a	16	fl oz/a	1-2"MT A		91 a-d	95 a
	AUTHORITY FIRST DF	70	WG	0.175	lb ai/a	4	oz/a	1-2"MT A			
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
14	CLARITY	4	SL	0.5	lb ae/a	16	fl oz/a	1-2"MT A		97 a	92 abc
	AUTHORITY MTZ DF	45	WG	0.394	lb ai/a	14	oz/a	1-2"MT A			
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
15	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		90 cde	93 ab
	CLARITY	4	SL	0.5	lb ae/a	16	fl oz/a	1-2"MT A			
	AUTHORITY FIRST DF	70	WG	0.175	lb ai/a	4	oz/a	1-2"MT A			
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
16	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		96 ab	90 a-d
	CLARITY	4	SL	0.5	lb ae/a	16	fl oz/a	1-2"MT A			
	AUTHORITY MTZ DF	45	WG	0.394	lb ai/a	14	oz/a	1-2"MT A			
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
17	AIM EC	2	EC	0.0156	lb ai/a	1	fl oz/a	1-2"MT A		79 f	61 f
	2,4-D LV 4	3.8	EC	0.475	lb ae/a	16	fl oz/a	1-2"MT A			
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
18	SHARPEN	2.85	SC	0.0223	lb ai/a	1	fl oz/a	1-2"MT A		84 ef	74 e
	2,4-D LV 4	3.8	EC	0.475	lb ae/a	16	fl oz/a	1-2"MT A			
	MSO (MSO ULTRA)	100	SL	1	% v/v	1	% v/v	1-2"MT A			
	N-PAK AMS	100	SL	2.5	% v/v	2.5	% v/v	1-2"MT A			
19	NONTREATED									0	0
LSD P=.05						6.0				6.0	7.0
Standard Deviation						4.3				4.3	5.0
CV						4.65				4.65	5.72
Replicate F						1.947				1.947	1.684
Replicate Prob(F)						0.1337				0.1337	0.1821
Treatment F						5.394				5.394	10.418
Treatment Prob(F)						0.0001				0.0001	0.0001

Marestail Burndown in Soybean with Aim, Authority First and Authority MTZ combined with 2,4-D or Dicamba.

Trial ID: 15-FagerS-FMC-AimAuth Location: Murphysboro, IL Trial Year: 2015
Investigator: Ronald F. Krausz

Trial Comments

1. Protocol: FMC (Aim / Authority).
2. Ratings:
WC at 5, 15, and 30 DA-A.
Target marestail and rate other weeds including winter annuals.
3. Application timing A (1-2"MT) = 1 to 2 inch marestail bolting, absolutely less than 4 inch tall, and about 30 days early preplant, but focus on marestail height.
4. Plant soybean not sooner than 30 DA-A and after 1 inch of rainfall.
5. Yield not requested, crop injury rating not requested.
6. Photos not requested.
7. Possible blanket POST application for grasses.
8. ERICA-HR = Herbicide-resistant marestail (glyphosate).
TTTTT = weeds, generally. At 15 DA-A winter annuals including common chickweed,
at 30 DA-A common chickweed and newly emerging common waterhemp.
9. Rainfall following the 1-2"MT application was 0.89 inch over 3 days beginning 3 days later.
10. Not harvested.