

Southern Illinois University

Fall-Applied Residual Herbicides in Winter Wheat followed by Soybean Double-Crop - Marestail.

Trial ID: 12-ARC-25-N60
 Location: Agronomy Res. Center
 Investigator: Bryan Young

General Trial Information	
Study Director: Bryan Young	Investigator: Bryan Young Title: Professor
Trial Status: F - one-year/final	
Initiation Date: 10-26-11	
Trial Location	
City: Carbondale	
State/Prov.: IL	
Postal Code: 62901	
Country: USA	

Objectives: Determine the value of residual ALS herbicides for control of marestail and other weeds in winter wheat.
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Personnel	
Study Director: Bryan Young	Title: Professor
Investigator: Bryan Young	Affiliation: Southern Illinois University
Address: 1205 Lincoln Drive - AG 176 - MC 4415	
Location: Carbondale IL	
Postal Code: 62901	E-mail: bgyoung@siu.edu
Phone No.: 618-453-7679	Mobile No.: 618-713-6471

Crop Description	
Crop 1: TRZAW Triticum aestivum (winter) Winter wheat	
Variety: P25R62	
BBCH Scale: BCER	Planting Date: 10-26-11
Planting Method: SEEDED Seeded	Rate, Unit: 1.4 millionS/A
Depth, Unit: 1 IN	
Row Spacing, Unit: 7.5 IN	
Crop 2: GLXMA Glycine max Soybean	
Variety: P94Y50	Description: RR
BBCH Scale: BSOY	Planting Date: 6-13-12
Planting Method: SEEDED Seeded	Rate, Unit: 175000 S/A
Depth, Unit: 2 IN	
Row Spacing, Unit: 30 IN	

Pest Description	
Pest 1 Type: W Code: ERICA - Conyza canadensis (L.) Crong.	Common Name: horseweed
Pest 2 Type: W Code: ALLVI - Allium vineale L.	Common Name: garlic, wild
Pest 3 Type: W Code: LAMPU - Lamium purpureum L.	Common Name: deadnettle, purple
Pest 4 Type: W Code: CERVU - Cerastium vulgatum L.	Common Name: chickweed, mouseear
Pest 5 Type: W Code: ALOCA - Alopecurus carolinianus Walt.	Common Name: foxtail, Carolina

Site and Design	
Plot Width, Unit: 10 FT	Site Type: FIELD field
Plot Length, Unit: 30 FT	
Plot Area, Unit: 300 FT ²	Tillage Type: NOTILL no-till
Replications: 3	Study Design: RACOB L Randomized Complete Block (RCB)

No.	Previous Crop	Year
1.	GLXMA	2011

Maintenance	
No.	Maintenance Treatment Name
1.	Fall: N 30 LB/A, P205 0 LB/A, K20 0 LB/A
2.	Spring: N 85 LB/A, P205 0 LB/A, K20 0 LB/A

Moisture and Weather Conditions	
Overall Moisture Conditions:	BELNOR below normal
Closest Weather Station: ICN - Carbondale IL	Distance, Unit: 0.5 MI

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Application Description				
	A		B	
Application Date:	10-29-11		12-2-11	
Time of Day:	12:00		16:00	
Application Method:	Spray		Spray	
Application Timing:	PRE		FALL	
Application Placement:	BROSOI		BROFOL	
Applied By:	NRJ		NRJ	
Air Temperature, Unit:	55	F	53	F
% Relative Humidity:	33		56	
Wind Velocity, Unit:	2	MPH	1	MPH
Wind Direction:	W		NE	
Dew Presence (Y/N):	N	no	N	no
Soil Temperature, Unit:	50	F	46	F
Soil Moisture:	NORMAL		ABONOR	
% Cloud Cover:	0		10	

Crop Stage At Each Application				
	A		B	
Crop 1 Code, BBCH Scale:	TRZAW	BCER	TRZAW	BCER
Stage Scale Used:	DESC		DESC	
Stage Majority, Percent:	NA		FK1	
Height, Unit:			4	IN
Height Minimum, Maximum:			3	4
Crop 2 Code, BBCH Scale:	GLXMA	BSOY	GLXMA	BSOY
Stage Scale Used:	DESC		DESC	
Stage Majority, Percent:	NA		NA	

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Pest Stage At Each Application				
	A		B	
Pest 1 Code, Type, Scale:	ERICA	W DESC	ERICA	W DESC
Stage Majority, Percent:	4		8	
Stage Minimum, Percent:	2		4	
Stage Maximum, Percent:	8		12	
Height, Unit:	0.5	IN	1	IN
Height Minimum, Maximum:	0.5	1	0.5	1.5
Density, Unit:	2	FT2	2	FT2
Pest 2 Code, Type, Scale:	ALLVI	W DESC	ALLVI	W DESC
Stage Majority, Percent:	2		2	
Stage Minimum, Percent:	1		1	
Stage Maximum, Percent:	3		3	
Height, Unit:	4	IN	4	IN
Height Minimum, Maximum:	2	6	2	6
Density, Unit:	4	FT2	4	FT2
Pest 3 Code, Type, Scale:	LAMPU	W DESC	LAMPU	W DESC
Stage Majority, Percent:	4		6	
Stage Minimum, Percent:	2		4	
Stage Maximum, Percent:	6		10	
Height, Unit:	0.5	IN	1	IN
Height Minimum, Maximum:	0.5	1	0.5	1.5
Density, Unit:	2	FT2	2	FT2
Pest 4 Code, Type, Scale:	CERVU	W DESC	CERVU	W DESC
Stage Majority, Percent:	4		6	
Stage Minimum, Percent:	2		4	
Stage Maximum, Percent:	6		10	
Height, Unit:	0.5	IN	1	IN
Height Minimum, Maximum:	0.5	1	0.5	1.5
Density, Unit:	2	FT2	2	FT2
Pest 5 Code, Type, Scale:	ALOCA	W DESC	ALOCA	W DESC
Stage Majority, Percent:	4		8	
Stage Minimum, Percent:	2		4	
Stage Maximum, Percent:	6		10	
Height, Unit:	1	IN	1	IN
Height Minimum, Maximum:	0.5	1.5	1	2
Density, Unit:	3	FT2	3	FT2

Application Equipment				
	A		B	
Appl. Equipment:	CO2 sprayer		CO2 sprayer	
Equipment Type:	BACSPR		BACSPR	
Operation Pressure, Unit:	30	PSI	30	PSI
Nozzle Type:	XR		XR	
Nozzle Size:	8002		8002	
Boom Length, Unit:	6.67 FT		6.67 FT	
Spray Volume, Unit:	15	GPA	15	GPA

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Pest Code	Crop Code	Rating Date	Rating Type	Rating Unit	Rating Timing	Trt-Eval Interval	TRZAW 6-4-12 Moisture Percent	TRZAW 6-4-12 Test wt. lb/bu	TRZAW 6-4-12 Yield bu/A	TRZAW 12-9-11 Injury Percent	TRZAW 12-16-11 Injury Percent	TRZAW 12-30-11 Injury Percent			
							221 DA-A	221 DA-A	221 DA-A	7 DA-B	14 DA-B	28 DA-B			
Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Other Rate	Other Rate Unit	Growth Stage	Appl Code						
1	HARMONY EXTRA NIS (ACTIVATOR 90)	50 SG 100 SL	SG SL	0.0234 lb ai/a 0.25 % v/v	lb ai/a % v/v	0.75 oz/a 0.25 % v/v	oz/a % v/v	FALL FALL	B B	11.9 a	53.9 a	62 a	0 a	0 a	0 a
2	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL	WG SL	0.0094 lb ai/a 0.25 % v/v	lb ai/a % v/v	0.2 oz/a 0.25 % v/v	oz/a % v/v	FALL FALL	B B	11.2 a	51.5 a	83 a	0 a	0 a	0 a
3	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL	WG SL	0.0188 lb ai/a 0.25 % v/v	lb ai/a % v/v	0.4 oz/a 0.25 % v/v	oz/a % v/v	FALL FALL	B B	11.3 a	51.2 a	82 a	0 a	0 a	0 a
4	ALLY EXTRA NIS (ACTIVATOR 90)	52 SG 100 SL	SG SL	0.0065 lb ai/a 0.25 % v/v	lb ai/a % v/v	0.2 oz/a 0.25 % v/v	oz/a % v/v	FALL FALL	B B	11.4 a	49.6 a	73 a	0 a	0 a	0 a
5	ALLY EXTRA NIS (ACTIVATOR 90)	52 SG 100 SL	SG SL	0.013 lb ai/a 0.25 % v/v	lb ai/a % v/v	0.4 oz/a 0.25 % v/v	oz/a % v/v	FALL FALL	B B	11.6 a	51.4 a	66 a	0 a	0 a	0 a
6	HARMONY EXTRA SENCOR NIS (ACTIVATOR 90)	50 SG 75 WG 100 SL	SG WG SL	0.0234 lb ai/a 0.188 lb ai/a 0.25 % v/v	lb ai/a lb ai/a % v/v	0.75 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a % v/v	FALL FALL FALL	B B B	11.4 a	51.0 a	70 a	0 a	0 a	0 a
7	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL	WG WG SL	0.0094 lb ai/a 0.188 lb ai/a 0.25 % v/v	lb ai/a lb ai/a % v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a % v/v	FALL FALL FALL	B B B	12.0 a	51.7 a	63 a	0 a	0 a	0 a
8	ALLY EXTRA SENCOR NIS (ACTIVATOR 90)	52 SG 75 WG 100 SL	SG WG SL	0.0065 lb ai/a 0.188 lb ai/a 0.25 % v/v	lb ai/a lb ai/a % v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a % v/v	FALL FALL FALL	B B B	11.9 a	52.3 a	72 a	0 a	0 a	0 a
9	POWERFLEX NIS (ACTIVATOR 90)	7.5 WG 100 SL	WG SL	0.0164 lb ai/a 0.25 % v/v	lb ai/a % v/v	3.5 oz/a 0.25 % v/v	oz/a % v/v	FALL FALL	B B	11.3 a	50.4 a	76 a	0 a	0 a	0 a
10	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL	WG SL	0.0117 lb ai/a 0.25 % v/v	lb ai/a % v/v	0.25 oz/a 0.25 % v/v	oz/a % v/v	PRE PRE	A A	11.8 a	52.0 a	65 a	0 a	0 a	0 a
11	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL	WG WG SL	0.0117 lb ai/a 0.188 lb ai/a 0.25 % v/v	lb ai/a lb ai/a % v/v	0.25 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a % v/v	PRE PRE PRE	A A A	11.9 a	53.8 a	66 a	0 a	0 a	0 a
12	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL	WG SL	0.0234 lb ai/a 0.25 % v/v	lb ai/a % v/v	0.5 oz/a 0.25 % v/v	oz/a % v/v	PRE PRE	A A	12.0 a	53.2 a	71 a	0 a	0 a	0 a
13	NONTREATED									12.2 a	52.7 a	55 a	0 a	0 a	0 a
14	ROUNDUP POWERMAX N-PAK AMS	4.5 SL 100 SL	SL SL	0.77 lb ae/a 5 % v/v	lb ae/a % v/v	22 fl oz/a 5 % v/v	fl oz/a % v/v	PRE PRE	A A	11.5 a	52.5 a	83 a	0 a	0 a	0 a
LSD (P=.05)							0.89	4.62	23.1	0.0	0.0	0.0			
Standard Deviation							0.53	2.74	13.8	0.0	0.0	0.0			
CV							4.55	5.28	19.52	0.0	0.0	0.0			
Replicate F							0.029	1.691	12.624	0.000	0.000	0.000			
Replicate Prob(F)							0.9713	0.2048	0.0002	1.0000	1.0000	1.0000			
Treatment F							1.113	0.597	1.120	0.000	0.000	0.000			
Treatment Prob(F)							0.3934	0.8339	0.3886	1.0000	1.0000	1.0000			

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.

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							ERICA	ERICA	ERICA	ERICA	ERICA			
							12-30-11 Control Percent	3-1-12 Control Percent	4-1-12 Control Percent	5-1-12 Control Percent	6-1-12 Control Percent			
							28 DA-B	90 DA-B	121 DA-B	151 DA-B	182 DA-B			
Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Other Rate	Other Rate Unit	Growth Stage	Appl Code					
1	HARMONY EXTRA NIS (ACTIVATOR 90)	50 SG 100 SL		0.0234 lb ai/a 0.25 % v/v	ai/a v/v	0.75 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	23 cd	88 abc	70 abc	60 a	63 a
2	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0094 lb ai/a 0.25 % v/v	ai/a v/v	0.2 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	20 cd	85 abc	78 abc	73 a	78 a
3	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0188 lb ai/a 0.25 % v/v	ai/a v/v	0.4 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	40 b	63 d	60 c	75 a	81 a
4	ALLY EXTRA NIS (ACTIVATOR 90)	52 SG 100 SL		0.0065 lb ai/a 0.25 % v/v	ai/a v/v	0.2 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	20 cd	77 bcd	68 abc	76 a	72 a
5	ALLY EXTRA NIS (ACTIVATOR 90)	52 SG 100 SL		0.013 lb ai/a 0.25 % v/v	ai/a v/v	0.4 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	27 cd	83 abc	62 bc	65 a	60 a
6	HARMONY EXTRA SENCOR NIS (ACTIVATOR 90)	50 SG 75 WG 100 SL		0.0234 lb ai/a 0.188 lb ai/a 0.25 % v/v	ai/a ai/a v/v	0.75 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a v/v	FALL FALL FALL	B B B	17 d	73 cd	73 abc	70 a	77 a
7	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL		0.0094 lb ai/a 0.188 lb ai/a 0.25 % v/v	ai/a ai/a v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a v/v	FALL FALL FALL	B B B	20 cd	80 abc	73 abc	63 a	67 a
8	ALLY EXTRA SENCOR NIS (ACTIVATOR 90)	52 SG 75 WG 100 SL		0.0065 lb ai/a 0.188 lb ai/a 0.25 % v/v	ai/a ai/a v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a v/v	FALL FALL FALL	B B B	23 cd	80 abc	80 ab	92 a	90 a
9	POWERFLEX NIS (ACTIVATOR 90)	7.5 WG 100 SL		0.0164 lb ai/a 0.25 % v/v	ai/a v/v	3.5 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	28 c	87 abc	70 abc	77 a	78 a
10	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0117 lb ai/a 0.25 % v/v	ai/a v/v	0.25 oz/a 0.25 % v/v	oz/a v/v	PRE PRE	A A	99 a	93 ab	77 abc	70 a	67 a
11	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL		0.0117 lb ai/a 0.188 lb ai/a 0.25 % v/v	ai/a ai/a v/v	0.25 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a v/v	PRE PRE PRE	A A A	99 a	95 a	77 abc	82 a	78 a
12	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0234 lb ai/a 0.25 % v/v	ai/a v/v	0.5 oz/a 0.25 % v/v	oz/a v/v	PRE PRE	A A	98 a	93 ab	86 a	73 a	73 a
13	NONTREATED									0 e	0 e	0 d	0 b	0 b
14	ROUNDUP POWERMAX N-PAK AMS	4.5 SL 100 SL		0.77 lb ae/a 5 % v/v	ae/a v/v	22 fl oz/a 5 % v/v	fl oz/a v/v	PRE PRE	A A	95 a	80 abc	68 abc	73 a	83 a
LSD (P=.05)							10.8	16.1	19.4	32.9	33.0			
Standard Deviation							6.4	9.6	11.5	19.6	19.7			
CV							14.74	12.47	17.14	28.95	28.46			
Replicate F							0.684	7.224	3.103	0.245	1.063			
Replicate Prob(F)							0.5133	0.0032	0.0619	0.7841	0.3600			
Treatment F							97.502	18.311	9.551	3.441	3.588			
Treatment Prob(F)							0.0001	0.0001	0.0001	0.0035	0.0027			

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Location: Agronomy Res. Center

Investigator: Bryan Young

Pest Code	Crop Code	Rating Date	Rating Type	Rating Unit	Rating Timing	Trt-Eval Interval	ALLVI 12-30-11 Control Percent	ALLVI 3-1-12 Control Percent	ALLVI 4-1-12 Control Percent	ALLVI 5-1-12 Control Percent	ALLVI 6-1-12 Control Percent
							28 DA-B	90 DA-B	121 DA-B	151 DA-B	182 DA-B
Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Other Rate	Other Rate Unit	Growth Stage	Appl Code		
1	HARMONY EXTRA SG NIS (ACTIVATOR 90)	50 SG 100 SL		0.0234 lb ai/a 0.25 % v/v	ai/a v/v	0.75 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	10 d	93 a
2	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0094 lb ai/a 0.25 % v/v	ai/a v/v	0.2 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	10 d	92 a
3	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0188 lb ai/a 0.25 % v/v	ai/a v/v	0.4 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	10 d	90 ab
4	ALLY EXTRA SG NIS (ACTIVATOR 90)	52 SG 100 SL		0.0065 lb ai/a 0.25 % v/v	ai/a v/v	0.2 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	10 d	88 ab
5	ALLY EXTRA SG NIS (ACTIVATOR 90)	52 SG 100 SL		0.013 lb ai/a 0.25 % v/v	ai/a v/v	0.4 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	10 d	93 a
6	HARMONY EXTRA SG SENCOR NIS (ACTIVATOR 90)	50 SG 75 WG 100 SL		0.0234 lb ai/a 0.188 lb ai/a 0.25 % v/v	ai/a ai/a v/v	0.75 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a v/v	FALL FALL FALL	B B B	10 d	88 ab
7	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL		0.0094 lb ai/a 0.188 lb ai/a 0.25 % v/v	ai/a ai/a v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a v/v	FALL FALL FALL	B B B	13 d	73 c
8	ALLY EXTRA SG SENCOR NIS (ACTIVATOR 90)	52 SG 75 WG 100 SL		0.0065 lb ai/a 0.188 lb ai/a 0.25 % v/v	ai/a ai/a v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a v/v	FALL FALL FALL	B B B	10 d	87 ab
9	POWERFLEX NIS (ACTIVATOR 90)	7.5 WG 100 SL		0.0164 lb ai/a 0.25 % v/v	ai/a v/v	3.5 oz/a 0.25 % v/v	oz/a v/v	FALL FALL	B B	10 d	80 bc
10	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0117 lb ai/a 0.25 % v/v	ai/a v/v	0.25 oz/a 0.25 % v/v	oz/a v/v	PRE PRE	A A	92 a	93 a
11	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL		0.0117 lb ai/a 0.188 lb ai/a 0.25 % v/v	ai/a ai/a v/v	0.25 oz/a 4.0 oz/a 0.25 % v/v	oz/a oz/a v/v	PRE PRE PRE	A A A	85 bc	95 a
12	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0234 lb ai/a 0.25 % v/v	ai/a v/v	0.5 oz/a 0.25 % v/v	oz/a v/v	PRE PRE	A A	88 ab	93 a
13	NONTREATED									0 e	0 d
14	ROUNDUP POWERMAX N-PAK AMS	4.5 SL 100 SL		0.77 lb ae/a 5 % v/v	ae/a v/v	22 fl oz/a 5 % v/v	fl oz/a v/v	PRE PRE	A A	83 c	87 ab
LSD (P=.05)										4.6	10.5
Standard Deviation										2.7	6.3
CV										8.66	7.6
Replicate F										1.515	0.450
Replicate Prob(F)										0.2385	0.6423
Treatment F										538.607	45.692
Treatment Prob(F)										0.0001	0.0001

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Pest Code Crop Code Rating Date Rating Type Rating Unit Rating Timing Trt-Eval Interval							LAMPU	LAMPU	LAMPU	CERVU	CERVU	CERVU		
							12-30-11 Control Percent	3-1-12 Control Percent	4-1-12 Control Percent	12-30-11 Control Percent	3-1-12 Control Percent	4-1-12 Control Percent		
							28 DA-B	90 DA-B	121 DA-B	28 DA-B	90 DA-B	121 DA-B		
Trt No.	Treatment Name	Form Conc	Form Type	Rate Unit	Other Rate	Other Rate Unit	Growth Stage	Appl Code						
1	HARMONY EXTRA NIS (ACTIVATOR 90)	50 SG 100 SL	SG SL	0.0234 lb ai/a 0.25 % v/v	0.75 oz/a 0.25 % v/v		FALL FALL	B B	20 de	75 ab	75 a	53 cde	99 a	99 a
2	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL	WG SL	0.0094 lb ai/a 0.25 % v/v	0.2 oz/a 0.25 % v/v		FALL FALL	B B	27 cd	74 ab	75 a	67 bc	99 a	99 a
3	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL	WG SL	0.0188 lb ai/a 0.25 % v/v	0.4 oz/a 0.25 % v/v		FALL FALL	B B	47 bc	98 ab	99 a	62 bcd	99 a	99 a
4	ALLY EXTRA NIS (ACTIVATOR 90)	52 SG 100 SL	SG SL	0.0065 lb ai/a 0.25 % v/v	0.2 oz/a 0.25 % v/v		FALL FALL	B B	37 bcd	90 ab	93 a	57 cde	98 a	98 a
5	ALLY EXTRA NIS (ACTIVATOR 90)	52 SG 100 SL	SG SL	0.013 lb ai/a 0.25 % v/v	0.4 oz/a 0.25 % v/v		FALL FALL	B B	50 b	96 ab	97 a	62 bcd	99 a	99 a
6	HARMONY EXTRA SENCOR NIS (ACTIVATOR 90)	50 SG 75 WG 100 SL	SG WG SL	0.0234 lb ai/a 0.188 lb ai/a 0.25 % v/v	0.75 oz/a 4.0 oz/a 0.25 % v/v		FALL FALL FALL	B B B	23 d	88 ab	91 a	53 cde	99 a	99 a
7	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL	WG WG SL	0.0094 lb ai/a 0.188 lb ai/a 0.25 % v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v		FALL FALL FALL	B B B	18 de	90 ab	90 a	60 bcd	99 a	99 a
8	ALLY EXTRA SENCOR NIS (ACTIVATOR 90)	52 SG 75 WG 100 SL	SG WG SL	0.0065 lb ai/a 0.188 lb ai/a 0.25 % v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v		FALL FALL FALL	B B B	20 de	90 ab	91 a	43 e	99 a	99 a
9	POWERFLEX NIS (ACTIVATOR 90)	7.5 WG 100 SL	WG SL	0.0164 lb ai/a 0.25 % v/v	3.5 oz/a 0.25 % v/v		FALL FALL	B B	35 bcd	68 b	75 a	47 de	96 a	98 a
10	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL	WG SL	0.0117 lb ai/a 0.25 % v/v	0.25 oz/a 0.25 % v/v		PRE PRE	A A	99 a	99 a	99 a	99 a	99 a	99 a
11	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL	WG WG SL	0.0117 lb ai/a 0.188 lb ai/a 0.25 % v/v	0.25 oz/a 4.0 oz/a 0.25 % v/v		PRE PRE PRE	A A A	99 a	99 a	99 a	99 a	99 a	99 a
12	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL	WG SL	0.0234 lb ai/a 0.25 % v/v	0.5 oz/a 0.25 % v/v		PRE PRE	A A	98 a	99 a	99 a	99 a	99 a	99 a
13	NONTREATED								0 e	0 c	0 b	0 f	0 c	0 c
14	ROUNDUP POWERMAX N-PAK AMS	4.5 SL 100 SL	SL SL	0.77 lb ae/a 5 % v/v	22 fl oz/a 5 % v/v		PRE PRE	A A	90 a	90 ab	90 a	73 b	82 b	78 b
LSD (P=.05)							20.1	30.7	27.4	15.7	2.9	2.9		
Standard Deviation							12.0	18.3	16.3	9.3	1.7	1.7		
CV							25.33	22.17	19.48	14.96	1.9	1.9		
Replicate F							0.329	4.020	4.854	1.338	2.100	1.978		
Replicate Prob(F)							0.7225	0.0301	0.0162	0.2798	0.1427	0.1587		
Treatment F							24.958	5.943	7.496	23.467	712.958	719.764		
Treatment Prob(F)							0.0001	0.0001	0.0001	0.0001	0.0001	0.0001		

Southern Illinois University

Fall-Applied Residual Herbicides in Winter Wheat followed by Soybean Double-Crop - Marestail.

Trial ID: 12-ARC-25-N60
 Location: Agronomy Res. Center

Investigator: Bryan Young

Pest Code Crop Code Rating Date Rating Type Rating Unit Rating Timing Trt-Eval Interval							ALOCA 12-30-11 Control Percent	ALOCA 3-1-12 Control Percent	ALOCA 4-1-12 Control Percent	GLXMA 6-26-12 Injury Percent	GLXMA 7-17-12 Injury Percent		
							28 DA-B	90 DA-B	121 DA-B	7 DAE	28 DAE		
Trt No.	Treatment Name	Form Conc	Form Type	Rate Unit	Other Rate	Other Rate Unit	Growth Stage	Appl Code					
1	HARMONY EXTRA SG NIS (ACTIVATOR 90)	50 SG 100 SL		0.0234 lb ai/a 0.25 % v/v	0.75 oz/a 0.25 % v/v		FALL FALL	B B	0 e	0 e	0 e	0 a	0 a
2	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0094 lb ai/a 0.25 % v/v	0.2 oz/a 0.25 % v/v		FALL FALL	B B	53 b	77 b	77 b	0 a	0 a
3	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0188 lb ai/a 0.25 % v/v	0.4 oz/a 0.25 % v/v		FALL FALL	B B	50 bc	87 ab	87 ab	0 a	0 a
4	ALLY EXTRA SG NIS (ACTIVATOR 90)	52 SG 100 SL		0.0065 lb ai/a 0.25 % v/v	0.2 oz/a 0.25 % v/v		FALL FALL	B B	0 e	0 e	0 e	0 a	0 a
5	ALLY EXTRA SG NIS (ACTIVATOR 90)	52 SG 100 SL		0.013 lb ai/a 0.25 % v/v	0.4 oz/a 0.25 % v/v		FALL FALL	B B	0 e	0 e	0 e	0 a	0 a
6	HARMONY EXTRA SG SENCOR NIS (ACTIVATOR 90)	50 SG 75 WG 100 SL		0.0234 lb ai/a 0.188 lb ai/a 0.25 % v/v	0.75 oz/a 4.0 oz/a 0.25 % v/v		FALL FALL FALL	B B B	37 d	23 d	23 d	0 a	0 a
7	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL		0.0094 lb ai/a 0.188 lb ai/a 0.25 % v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v		FALL FALL FALL	B B B	47 bcd	33 cd	47 c	0 a	0 a
8	ALLY EXTRA SG SENCOR NIS (ACTIVATOR 90)	52 SG 75 WG 100 SL		0.0065 lb ai/a 0.188 lb ai/a 0.25 % v/v	0.2 oz/a 4.0 oz/a 0.25 % v/v		FALL FALL FALL	B B B	40 cd	43 c	40 cd	0 a	0 a
9	POWERFLEX NIS (ACTIVATOR 90)	7.5 WG 100 SL		0.0164 lb ai/a 0.25 % v/v	3.5 oz/a 0.25 % v/v		FALL FALL	B B	53 b	88 ab	88 ab	0 a	0 a
10	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0117 lb ai/a 0.25 % v/v	0.25 oz/a 0.25 % v/v		PRE PRE	A A	99 a	96 a	96 ab	0 a	0 a
11	FINESSE SENCOR NIS (ACTIVATOR 90)	75 WG 75 WG 100 SL		0.0117 lb ai/a 0.188 lb ai/a 0.25 % v/v	0.25 oz/a 4.0 oz/a 0.25 % v/v		PRE PRE PRE	A A A	98 a	95 a	95 ab	0 a	0 a
12	FINESSE NIS (ACTIVATOR 90)	75 WG 100 SL		0.0234 lb ai/a 0.25 % v/v	0.5 oz/a 0.25 % v/v		PRE PRE	A A	99 a	98 a	98 a	0 a	0 a
13	NONTREATED								0 e	0 e	0 e	0 a	0 a
14	ROUNDUP POWERMAX N-PAK AMS	4.5 SL 100 SL		0.77 lb ae/a 5 % v/v	22 fl oz/a 5 % v/v		PRE PRE	A A	98 a	90 a	88 ab	0 a	0 a
LSD (P=.05)							12.5	12.1	19.4	0.0	0.0		
Standard Deviation							7.5	7.2	11.5	0.0	0.0		
CV							15.53	13.83	21.86	0.0	0.0		
Replicate F							0.340	4.307	2.594	0.000	0.000		
Replicate Prob(F)							0.7150	0.0242	0.0939	1.0000	1.0000		
Treatment F							81.125	99.830	38.410	0.000	0.000		
Treatment Prob(F)							0.0001	0.0001	0.0001	1.0000	1.0000		

Fall-Applied Residual Herbicides in Winter Wheat followed by Soybean Double-Crop - Marestalk.

Trial ID: 12-ARC-25-N60

Location: Agronomy Res. Center

Investigator: Bryan Young

Trial Comments

1. Protocol: DuPont (USA-12-210).
2. Ratings: CI 7, 14 + 28 DA-B, plant double crop soybean CI 7 + 28 DAE.
WC 28 DA-B, March 1, April 1, May 1, and June 1.
3. Yield - double crop soybean (if possible).
4. Target weed marestalk (ERICA).
5. Blanket POST in spring if needed Axial XL (16.4 fl oz/A) plus Harmony Extra SG (0.75 oz/A) for BL/grass control.
6. Harvested wheat 6-4-12, 5 ft by 27.5 ft.
7. Planted double-crop soybean (P94Y50) on 6-13-12.
Missing data for soybean injury was due to poor emergence due to dry soil conditions.
8. Soybean crop was not harvested due to dry conditions.