

Evaluation of Grass Control in No-Till Corn.

02-2A-W205

OBJECTIVE: Comparison of several grass herbicides applied early preplant, preemergence and postemergence in no-till corn.

SUMMARY: None of the grass herbicides caused any corn injury. Grass herbicides applied EPP 30 provided poor control of giant foxtail and fall panicum 42 days after planting. Grass herbicides applied EPP 15 controlled giant foxtail 0 to 90% and fall panicum 0 to 60%. Grass herbicides applied PRE provided 28 to 95% control of giant foxtail and 73 to 96% control of fall panicum. Topnotch and Harness applied PRE provided 92% or greater control of both grasses. Steadfast and Basis applied POST provided 90% or greater control of giant foxtail and fall panicum. Corn yield ranged from 0 to 135 bu/A. Grain yield was low due to abnormally dry growing season.

HERBICIDES

AXIOM 68 WG
BALANCE 75 WG
BASIS 75 WG
CALLISTO 4 SC
DEFINE 60 WG
DEGREE 3.8 ME
DUAL II MAGNUM 7.64 EC
HARNESS 7 EC
OUTLOOK 6 EC
PRINCEP 90 WG
ROUNDUP ULTRA 3 SL
STEADFAST 75 WG
TOPNOTCH 3.2 ME

WEEDS

foxtail, giant
panicum, fall

CROP

corn, field

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PLANT, SOIL AND GENERAL AGRICULTURE DEPARTMENT

SOUTHERN ILLINOIS UNIVERSITY

Evaluation of Grass Control in No-Till Corn.

Project Code: 02-2A-W205 Location: Belleville Research

Investigator: Bryan Young, Assistant Professor, Southern Illinois University

City State Zip Country: Belleville IL 62221 USA
 Trial Status: Final Updated: 10-24-02

Objective:

Comparison of several grass herbicides applied early preplant, preemergence and postemergence in no-till corn.

Weed Code	Common Name	Scientific Name
1.	SETFA foxtail, giant	Setaria faberi Herrm.
2.	PANDI panicum, fall	Panicum dichotomiflorum Michx.

Crop 1:	ZEAMX corn, field	Variety:	Pioneer 33P69LL
Planting Method:	Seeded	Planting Date:	5-27-02
Rate:	28000 S/A	Depth:	1.5 IN
Row Spacing:	30 IN		

Plot Width, Unit:	10 FT	Plot Length, Unit:	28 FT	Reps:	3
Tillage Type:	No-Till	Study Design:	Randomized complete block		
Previous Crop, Year:	GLXMA, 2001				

Field Prep./Maintenance: N 150 LB/A, P205 50 LB/A, K20 150 LB/A

Soil Name:	Weir	% OM:	1.5	pH:	6.4	CEC:	10
Texture:	Silt loam	Fert. Level:	P1: 81 LB/A, K: 274 LB/A				

APPLICATION DESCRIPTION

	A	B	C	D	E	F
Application Date:	4-11-02	4-26-02	5-29-02	6-6-02	6-10-02	5-29-02
Time of Day:	11:00	11:00	11:00	9:00	15:00	11:00
Application Method:	SPRAY	SPRAY	SPRAY	SPRAY	SPRAY	SPRAY
Application Timing:	EPP30	EPP15	PRE	3"CORN	2"GRASS	3"BL-1
Applic. Placement:	BROFOL	BROFOL	BROFOL	BROFOL	BROFOL	BROFOL
Air Temp., Unit:	72 F	56 F	76 F	64 F	86 F	76 F
% Relative Humidity:	38	32	84	80	98	84
Wind Velocity, Unit:	5 MPH	0 MPH	0-5 MPH	5-10 MPH	5-10 MPH	0-5 MPH
Soil Moisture:	ABONOR	ABONOR	NORMAL	NORMAL	NORMAL	NORMAL
% Cloud Cover:			85	50	70	85
	G	H	I			
Application Date:	6-6-02	6-17-02	6-17-02			
Time of Day:	9:30	14:30	14:30			
Application Method:	SPRAY	SPRAY	SPRAY			
Application Timing:	3"BL-2	3"BL-3	3"BL-4			
Applic. Placement:	BROFOL	BROFOL	BROFOL			
Air Temp., Unit:	64 F	82 F	82 F			
% Relative Humidity:	80	30	30			
Wind Velocity, Unit:	5-10 MPH	0-5 MPH	0-5 MPH			
Soil Moisture:	NORMAL	NORMAL	NORMAL			
% Cloud Cover:	90	20	20			

CROP STAGE AT EACH APPLICATION

	A	B	C	D	E	F
Crop 1 Code, Stage:	ZEAMX NA	ZEAMX NA	ZEAMX NA	ZEAMX V1	ZEAMX V3-V4	ZEAMX NA
Height, Unit:	NA NA	NA NA	NA NA	1-3 IN	6-10 IN	NA NA
	G	H	I			
Crop 1 Code, Stage:	ZEAMX V1	ZEAMX V5	ZEAMX V5			
Height, Unit:	1-3 IN	10-12 IN	10-12 IN			

WEED STAGE AT EACH APPLICATION

	A	B	C	D	E	F
Weed 1 Code:	SETFA	SETFA	SETFA	SETFA	SETFA	SETFA
Stage (leaves):	1-2	2-4	2-4	2-4	2-4	2-4
Height (inches):	0-1	2-6	2-4	2-4	2-6	2-6
Density:		Medium	Medium	Low	Medium	Medium

Weed 2 Code:	PANDI
Stage (leaves):	2-4
Height (inches):	2-6
Density:	Low

	G	H	I
Weed 1 Code:	SETFA	SETFA	SETFA
Stage (leaves):	2-4	3-5	3-5
Height (inches):	2-4	2-5	2-5
Density:	Low	Medium	Low

Weed 2 Code:	PANDI	PANDI
Stage (leaves):	3-5	3-5
Height (inches):	2-5	2-5
Density:	Low	Low

APPLICATION EQUIPMENT

	A	B	C	D	E	F
Appl. Equipment:	CO2 sprayer	CO2 sprayer	CO2 sprayer	CO2 sprayer	CO2 sprayer	CO2 sprayer
Operating Pressure:	40 PSI	40 PSI	40 PSI	40 PSI	40 PSI	40 PSI
Nozzle Type:	Flat fan	Flat fan	Flat fan	Flat fan	Flat fan	Flat fan
Nozzle Size:	8002	8003	8003	8003	8002	8002
Boom Length, Unit:	7.5 FT	7.5 FT	7.5 FT	7.5 FT	7.5 FT	7.5 FT
Spray Volume, Unit:	20 GPA	20 GPA	20 GPA	20 GPA	20 GPA	20 GPA

	G	H	I
Appl. Equipment:	CO2 sprayer	CO2 sprayer	CO2 sprayer
Operating Pressure:	40 PSI	40 PSI	40 PSI
Nozzle Type:	Flat fan	Flat fan	Flat fan
Nozzle Size:	8002	8002	8002
Boom Length, Unit:	7.5 FT	7.5 FT	7.5 FT
Spray Volume, Unit:	20 GPA	20 GPA	20 GPA

NOTES:

Harvested Oct-15-02, (2) 30 inch rows by 25 ft.

Evaluation of Grass Control in No-Till Corn.

Project Code: 02-2A-W205 Location: Belleville Research

Weed Code	SETFA	SETFA	SETFA	PANDI	PANDI	ZEAMX	ZEAMX
Crop Code	Yield	Control	Control	Control	Control	Injury	Injury
Rating Data Type	bu/A	Percent	Percent	Percent	Percent	Percent	Percent
Rating Unit							
Rating Date	10-15-02	5-11-02	6-17-02	7-8-02	6-17-02	7-8-02	6-17-02
Trt-Eval Interval	30 DA-A	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP	42 DAP

Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Prod Rate	Prod Unit	Grow Stg	Appl Code	Yield	Control	Control	Control	Control	Injury	Injury	
1	NONTREATED									0	0	27	27	53	53	0	0
2	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	16	98	77	60	67	0	0	0
2	DUAL II MAGNUM	7.64	EC	1.27	LB A/A	1.33	PT/A	EPP30	A								
2	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
2	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
2	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
3	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	12	97	25	25	52	27	0	0
3	TOPNOTCH	3.2	ME	1.8	LB A/A	4.5	PT/A	EPP30	A								
3	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
3	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
3	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
4	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	10	93	30	30	52	27	0	0
4	HARNES	7	EC	1.8	LB A/A	2.06	PT/A	EPP30	A								
4	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
4	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
4	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
5	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	23	100	30	30	52	27	0	0
5	DEGREE	3.8	ME	1.8	LB A/A	3.8	PT/A	EPP30	A								
5	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
5	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
5	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
6	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	6	95	25	0	52	27	0	0
6	OUTLOOK	6	EC	0.75	LB A/A	1	PT/A	EPP30	A								
6	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
6	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
6	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
7	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	22	100	42	0	68	27	0	0
7	AXIOM	68	WG	0.72	LB A/A	17	OZ/A	EPP30	A								
7	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
7	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
7	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
8	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	10	100	25	0	82	57	0	0
8	DEFINE	60	WG	0.60	LB A/A	16	OZ/A	EPP30	A								
8	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
8	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
8	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								

Weed Code	SETFA	SETFA	SETFA	PANDI	PANDI											
Crop Code	ZEAMX															
Rating Data Type	Yield	Control	Control	Control	Control	Control	Injury	Injury								
Rating Unit	bu/A	Percent	Percent	Percent	Percent	Percent	Percent	Percent								
Rating Date	10-15-02	5-11-02	6-17-02	7-8-02	6-17-02	7-8-02	6-17-02	7-8-02								
Trt-Eval Interval	30 DA-A	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP								

Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Prod Rate	Prod Unit	Grow Stg	Appl Code								
9	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	32	100	25	0	87	87	0	0
9	BASIS	75	WG	0.031	LB A/A	0.66	OZ/A	EPP30	A								
9	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
9	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
9	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
10	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	28	100	60	60	80	30	0	0
10	BALANCE	75	WG	0.094	LB A/A	2	OZ/A	EPP30	A								
10	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
10	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
10	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
11	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP30	A	12	97	0	0	27	27	0	0
11	PRINCEP	90	WG	1.0	LB A/A	17.8	OZ/A	EPP30	A								
11	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-1	F								
11	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-1	F								
11	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-1	F								
12	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	33	100	57	47	80	45	0	0
12	DUAL II MAGNUM	7.64	EC	1.27	LB A/A	1.33	PT/A	EPP15	B								
12	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
12	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
12	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
13	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	36	100	75	0	75	0	0	0
13	TOPNOTCH	3.2	ME	1.8	LB A/A	4.5	PT/A	EPP15	B								
13	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
13	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
13	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
14	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	18	98	0	0	77	52	0	0
14	HARNES	7	EC	1.8	LB A/A	2.06	PT/A	EPP15	B								
14	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
14	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
14	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
15	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	57	100	80	0	80	0	0	0
15	DEGREE	3.8	ME	1.8	LB A/A	3.8	PT/A	EPP15	B								
15	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
15	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
15	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
16	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	12	100	25	0	52	27	0	0
16	OUTLOOK	6	EC	0.75	LB A/A	1	PT/A	EPP15	B								
16	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
16	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
16	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								

Weed Code	SETFA	SETFA	SETFA	PANDI	PANDI	ZEAMX	ZEAMX	
Crop Code	ZEAMX				ZEAMX			
Rating Data Type	Yield	Control	Control	Control	Control	Injury	Injury	
Rating Unit	bu/A	Percent	Percent	Percent	Percent	Percent	Percent	
Rating Date	10-15-02	5-11-02	6-17-02	7-8-02	6-17-02	7-8-02	6-17-02	
Trt-Eval Interval	30 DA-A	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP	42 DAP	

Trt No.	Treatment Name	Form Conc	Form Type	Rate Rate	Rate Unit	Prod Rate	Prod Unit	Grow Stg	Appl Code								
17	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	21	100	90	90	67	0	0	0
17	AXIOM	68	WG	0.72	LB A/A	17	OZ/A	EPP15	B								
17	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
17	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
17	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
18	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	19	100	50	0	77	27	0	0
18	DEFINE	60	WG	0.60	LB A/A	16	OZ/A	EPP15	B								
18	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
18	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
18	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
19	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	42	100	77	17	82	30	0	0
19	BASIS	75	WG	0.031	LB A/A	0.66	OZ/A	EPP15	B								
19	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
19	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
19	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
20	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	17	97	55	0	77	27	0	0
20	BALANCE	75	WG	0.094	LB A/A	2	OZ/A	EPP15	B								
20	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
20	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
20	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
21	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	EPP15	B	10	99	0	0	60	60	0	0
21	PRINCEP	90	WG	1.0	LB A/A	17.8	OZ/A	EPP15	B								
21	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-2	G								
21	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-2	G								
21	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-2	G								
22	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	110		92	73	97	93	0	0
22	DUAL II MAGNUM	7.64	EC	1.27	LB A/A	1.33	PT/A	PRE	C								
22	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
22	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
22	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
23	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	86		98	92	96	92	0	0
23	TOPNOTCH	3.2	ME	1.8	LB A/A	4.5	PT/A	PRE	C								
23	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
23	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
23	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
24	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	135		98	93	96	94	0	0
24	HARNESS	7	EC	1.8	LB A/A	2.06	PT/A	PRE	C								
24	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
24	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
24	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								

Weed Code																
Crop Code																
Rating Data Type																
Rating Unit																
Rating Date																
Trt-Eval Interval																

		SETFA	SETFA	SETFA	PANDI	PANDI										
	ZEAMX													ZEAMX	ZEAMX	
	Yield	Control	Control	Control	Control	Control								Injury	Injury	
	bu/A	Percent	Percent	Percent	Percent	Percent								Percent	Percent	
	10-15-02	5-11-02	6-17-02	7-8-02	6-17-02	7-8-02	6-17-02	7-8-02	6-17-02	7-8-02	6-17-02	7-8-02				
		30 DA-A	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP	42 DAP				

Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Prod Rate	Prod Unit	Grow Stg	Appl Code								
25	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	86		98	95	90	73	0	0
25	DEGREE	3.8	ME	1.8	LB A/A	3.8	PT/A	PRE	C								
25	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
25	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
25	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
26	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	70		93	88	89	85	0	0
26	OUTLOOK	6	EC	0.75	LB A/A	1	PT/A	PRE	C								
26	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
26	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
26	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
27	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	95		97	95	97	88	0	0
27	AXIOM	68	WG	0.72	LB A/A	17	OZ/A	PRE	C								
27	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
27	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
27	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
28	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	57		93	88	90	75	0	0
28	DEFINE	60	WG	0.60	LB A/A	16	OZ/A	PRE	C								
28	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
28	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
28	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
29	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	91		90	82	98	96	0	0
29	BASIS	75	WG	0.031	LB A/A	0.66	OZ/A	PRE	C								
29	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
29	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
29	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
30	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	82		83	78	98	95	0	0
30	BALANCE	75	WG	0.094	LB A/A	2	OZ/A	PRE	C								
30	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
30	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
30	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
31	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	111		30	28	94	91	0	0
31	PRINCEP	90	WG	1.0	LB A/A	17.8	OZ/A	PRE	C								
31	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-3	H								
31	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-3	H								
31	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-3	H								
32	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	73		90	53	90	53	0	0
32	DUAL II MAGNUM	7.64	EC	1.27	LB A/A	1.33	PT/A	3"CORN	D								
32	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
32	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
32	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								

Weed Code		SETFA	SETFA	SETFA	PANDI	PANDI								
Crop Code		ZEAMX								ZEAMX	ZEAMX			
Rating Data Type		Yield	Control	Control	Control	Control	Control			Injury	Injury			
Rating Unit		bu/A	Percent	Percent	Percent	Percent	Percent			Percent	Percent			
Rating Date		10-15-02	5-11-02	6-17-02	7-8-02	6-17-02	7-8-02			6-17-02	7-8-02			
Trt-Eval Interval		30 DA-A	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP			42 DAP	42 DAP			

Trt No.	Treatment Name	Form Conc	Form Type	Rate	Rate Unit	Prod Rate	Prod Unit	Grow Stg	Appl Code								
33	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	64		82	33	87	63	0	0
33	TOPNOTCH	3.2	ME	1.8	LB A/A	4.5	PT/A	3"CORN	D								
33	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
33	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
33	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								
34	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	93		78	17	88	77	0	0
34	HARNES	7	EC	1.8	LB A/A	2.06	PT/A	3"CORN	D								
34	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
34	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
34	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								
35	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	60		83	33	83	55	0	0
35	DEGREE	3.8	ME	1.8	LB A/A	3.8	PT/A	3"CORN	D								
35	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
35	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
35	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								
36	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	64		89	49	82	42	0	0
36	OUTLOOK	6	EC	0.75	LB A/A	1	PT/A	3"CORN	D								
36	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
36	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
36	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								
37	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	68		92	88	94	87	0	0
37	DEFINE	60	WG	0.60	LB A/A	16	OZ/A	3"CORN	D								
37	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
37	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
37	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								
38	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	58		100	95	100	93	0	0
38	STEADFAST	75	WG	0.035	LB A/A	0.75	OZ/A	2"GRASS	E								
38	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
38	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
38	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								
39	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	63		68	42	87	85	0	0
39	PRINCEP	90	WG	1.0	LB A/A	17.8	OZ/A	3"CORN	D								
39	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
39	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
39	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								
40	ROUNDUP ULTRA	3	SL	0.75	LB AE/A	2	PT/A	PRE	C	53		100	90	100	90	0	0
40	BASIS	75	WG	0.016	LB A/A	0.34	OZ/A	2"GRASS	E								
40	CALLISTO	4	SC	0.094	LB A/A	3	OZ/A	3"BL-4	I								
40	PRIME OIL COC	100	LIQ	1.0	% V/V	1	%V/V	3"BL-4	I								
40	28% UAN	100	LIQ	2.5	% V/V	2.5	%V/V	3"BL-4	I								

LSD (P=.05) 47.2 4.5 40.8 43.2 34.7 47.9 0.0 0.0

Weed Code									
Crop Code	ZEAMX							ZEAMX	ZEAMX
Rating Data Type	Yield	Control	Control	Control	Control	Control	Control	Injury	Injury
Rating Unit	bu/A	Percent	Percent	Percent	Percent	Percent	Percent	Percent	Percent
Rating Date	10-15-02	5-11-02	6-17-02	7-8-02	6-17-02	7-8-02	6-17-02	7-8-02	7-8-02
Trt-Eval Interval	30 DA-A	21 DAP	42 DAP	21 DAP	42 DAP	21 DAP	42 DAP		

Trt No.	Treatment Name	Form Conc	Form Type	Rate	Unit	Prod Rate	Prod Unit	Grow Stg	Appl Code						
Replicate F				10.079		3.611		11.626		6.685		1.695	11.536	0.000	0.000
Replicate Prob(F)				0.0001		0.0362		0.0001		0.0021		0.1903	0.0001	1.0000	1.0000
Treatment F				4.368		187.931		4.985		5.800		2.053	3.451	0.000	0.000
Treatment Prob(F)				0.0001		0.0001		0.0001		0.0035		0.0001	1.0000	1.0000	

Evaluation of Grass Control in No-Till Corn.

Project Code: 02-2A-W205 Location: Belleville Research

Trial Comments

1. Protocol: SIU (RFK).
2. DA-A = days after EPP30 application. DAP = days after planting. 30 DA-A was also 15 days after EPP15 application.
3. Ratings at 21 DAP were also 67, 52, 19, 11, 7, 19, 11, 0, and 0 days after EPP30, EPP15, PRE, 3"CORN, 2"GRASS, 3"BL-1, 3"BL-2, 3"BL-3, and 3"BL-4 applications, respectively.
Ratings at 42 DAP were also 88, 73, 40, 32, 28, 40, 32, 21, and 21 days after EPP30, EPP15, PRE, 3"CORN, 2"GRASS, 3"BL-1, 3"BL-2, 3"BL-3, and 3"BL-4 applications, respectively.
4. Non-zero weed control ratings in the nontreated plots reflect competition among weeds.