

Weed Control and Crop Safety with Surtain Janesville, WI 2024

Trial Information

Trial Sponsor(s): BASF

Objective: Evaluate weed control and crop safety of PRE and POST applications of ***Surtain**

Crop: Corn

Variety: 202-24STX RIB

Weed species (pressure): giant ragweed (high-very high)

Herbicide Application(s): PRE – 5/6
EPOST – 5/29 (V3 corn)
POST – 6/6 (V5 corn)

For the full report see trial #24-ROK-CN05 in the [2024 Wisconsin Weed Science Research Report](#)

***Surtain** is a new corn herbicide pre-mix, developed by BASF, containing encapsulated saflufenacil (Sharpen) and pyroxasulfone (Zidua).



Weed Control and Crop Safety w/Surtain (Janesville, WI 2024)

Trt # Herbicide (rate acre ⁻¹)		Corn Injury ^b (%)				Giant Ragweed (%)				
		5/28	6/4	6/11	6/17	5/28	6/4	6/11	6/17	7/1
1	Check Untreated	0	0	0	0	0	0	0	0	0
One-Pass – PRE (5/6)										
2	Acuron (1.5 qt)	0	0	0	0	86	82	78	70	45
3	Resicore (1.25 qt)	0	0	0	0	91	84	82	72	49
4	Trivolt SC (12 fl oz)	0	0	0	0	64	70	61	33	8
5	Storen (1.2 qt)	0	0	0	0	86	84	78	69	54
6	Surtain (11 fl oz)	0	0	0	0	56	57	42	30	11
7	Surtain (11 fl oz) + AAtrex (2 pt)	0	0	0	0	69	67	50	29	8
8	Surtain (14 fl oz)	0	0	0	0	70	63	46	34	10
9	Surtain (14 fl oz) + AAtrex (2 pt)	0	0	0	0	64	66	51	33	26
10	Surtain (17 fl oz)	0	0	0	0	62	68	57	46	29
One-Pass – EPOST (5/29)		EPOST				EPOST				
11	Surtain (14 fl oz) + Clarity (8 fl oz) + Roundup PM3 (30 fl oz) + NIS (0.25%) + AMS ^c	0	3.5	2.5	0	0	95	97	94	88
12	Surtain (14 oz) + Armezon (0.75 oz) + AAtrex (2 pt) + RU PM3 (30 oz) + COC (1%) + AMS ^c	0	8.8	5.5	0	0	98	99	94	85
Two-Pass – PRE (5/6) <i>fb</i> POST (6/6)		POST				POST				
13	Surtain (14 fl oz) <i>fb</i> Armezon PRO (16 fl oz) + AAtrex (1 pt) + Roundup PM3 (30 fl oz) + COC (1%) + AMS ^c	0	0	11.0	8.5	69	63	80	98	97
14	Surtain (14 fl oz) <i>fb</i> Status (5 oz) + Zidua SC (2.5 fl oz) + Roundup PM3 (30 fl oz) + NIS (0.25%) + AMS ^c	0	0	4.3	0	71	73	93	100	99
LSD ($\alpha=0.10$)		ns	0.4	0.6	1.1	14	11	17	21	19
p value		-	<.001	<.001	<.001	0.005	<.001	<.001	<.001	<.001

^aVisual control from 70-100% is illustrated on a color scale with green representing greater weed control values.

^bCorn injury = % leaf necrosis (burn)

^cDry AMS applied at 8.5 lb/100 gal

Weed Control and Crop Safety with Surtain Janesville, WI 2024

Plot pictures taken on 5/28
22 days after the PRE application

The number in the upper right-hand corner is the average %
giant ragweed control of 4 replications

22 days after PRE (5/28)

0%

Untreated Check



22 days after PRE (5/28)
PRE: 1.5 qt Acuron

86%



22 days after PRE (5/28)

PRE: 1.25 at Resicore

91%



22 days after PRE (5/28)

PRE: 12 oz TriVolt

64%



22 days after PRE (5/28)

PRE: 1.2 qt Storen

86%



22 days after PRE (5/28)

PRE: 11 oz Surtain

56%



22 days after PRE (5/28)
PRE: 11 oz Surtain + 2 pt AAtrex

69%



22 days after PRE (5/28)

PRE: 14 oz Surtain

70%



22 days after PRE (5/28)
PRE: 14 oz Surtain + 2 pt AAtrex

64%



22 days after PRE (5/28)

PRE: 17 oz Surtain

62%



Weed Control and Crop Safety with Surtain Janesville, WI 2024

Plot pictures taken on 6/4
29 days after the PRE application
6 days after the EPOST application
2 days before the POST application

The number in the upper right-hand corner is the average %
giant ragweed control of 4 replications



29 days after PRE (6/4)
PRE: 1.5 qt Acuron

82%



29 days after PRE (6/4)
PRE: 1.25 at Resicore

84%



29 days after PRE (6/4)
PRE: 12 oz TriVolt

70%



29 days after PRE (6/4)
PRE: 1.2 qt Storen

84%



29 days after PRE (6/4)
PRE: 11 oz Surtain

57%



29 days after PRE (6/4)
PRE: 11 oz Surtain + 2 pt AAtrex

67%





29 days after PRE (6/4)
PRE: 14 oz Surtain + 2 pt AAtrex

66%



29 days after PRE (6/4)
PRE: 17 oz Surtain

68%



6 days after EPOST (6/4)

EPOST: 14 oz Surtain + 8 oz Clarity + 30 oz Roundup PM3 + NIS + AMS

95%



4%

6 days after EPOST (6/4)

**EPOST: 14 oz Surtain + 0.75 oz Armezon + 2 pt Aatrex +
30 oz Roundup PM3 + COC + AMS**

98%



Weed Control and Crop Safety with Surtain Janesville, WI 2024

Plot pictures taken on 6/11

36 days after the PRE application

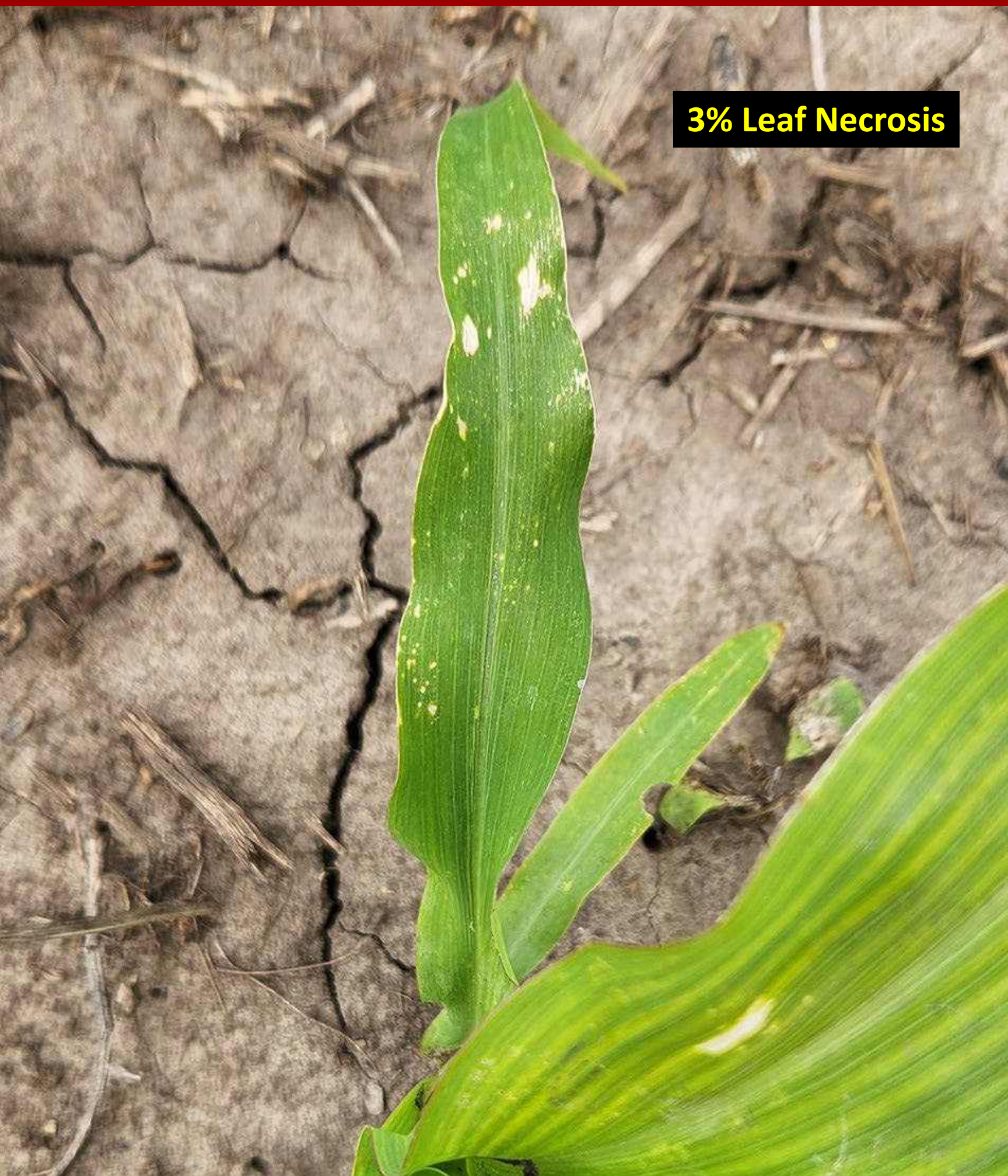
13 days after the EPOST application

5 days after the POST application

13 days after EPOST (6/11)

EPOST: 14 oz Surtain + 8 oz Clarity + 30 oz Roundup PM3 + NIS + AMS

3% Leaf Necrosis



13 days after EPOST (6/11)

EPOST: 14 oz Surtain + 0.75 oz Armezon + 2 pt Aatrex +
30 oz Roundup PM3 + COC + AMS

98%

6% Leaf Necrosis



5 days after POST (6/1)

PRE: 14 oz Surtain *fb*

80%

POST: 16 oz Armezon PRO + 1 pt AAtrex + 30 oz RU PM3 + COC + AMS



5 days after POST (6/1)

PRE: 14 oz Surtain *fb*

POST: 16 oz Armezon PRO + 1 pt AAtrex + 30 oz RU PM3 + COC + AMS

11% Leaf Necrosis



5 days after POST (6/1)

PRE: 14 oz Surtain *fb*

93%

POST: 5 oz Status + 2.5 oz Zidua SC + 30 oz Roundup PM3 + NIS + AMS



5 days after POST (6/1)

PRE: 14 oz Surtain *fb*

POST: 5 oz Status + 2.5 oz Zidua SC + 30 oz Roundup PM3 + NIS + AMS



Weed Control and Crop Safety with Surtain Janesville, WI 2024

Plot pictures taken on 6/17

42 days after the PRE application

19 days after the EPOST application

11 days after the POST application

42 days after PRE (6/17)
Untreated Check

0%



42 days after PRE (6/17)
PRE: 1.5 qt Acuron

70%



42 days after PRE (6/17)

PRE: 1.25 at Resicore

72%



42 days after PRE (6/17)

PRE: 12 oz TriVolt

33%



42 days after PRE (6/17)
PRE: 1.2 qt Storen

69%



42 days after PRE (6/17)

PRE: 11 oz Surtain

30%



42 days after PRE (6/17)
PRE: 11 oz Surtain + 2 pt AAtrex

29%



42 days after PRE (6/17)

PRE: 14 oz Surtain

34%



42 days after PRE (6/17)
PRE: 14 oz Surtain + 2 pt AAtrex

33%



42 days after PRE (6/17)

PRE: 17 oz Surtain

46%



19 days after EPOST (6/17)

EPOST: 14 oz Surtain + 8 oz Clarity + 30 oz Roundup PM3 + NIS + AMS

94%



19 days after EPOST (6/17)

**EPOST: 14 oz Surtain + 0.75 oz Armezon + 2 pt AAtrex +
30 oz Roundup PM3 + COC + AMS**

94%



11 days after POST (6/17)

PRE: 14 oz Surtain *fb*

98%

POST: 16 oz Armezon PRO + 1 pt AAtrex + 30 oz RU PM3 + COC + AMS



11 days after POST (6/17)

PRE: 14 oz Surtain *fb*

100%

POST: 5 oz Status + 2.5 oz Zidua SC + 30 oz Roundup PM3 + NIS + AMS

