

Achieve tank mix compatibility and efficacy. (1998) Achieve was evaluated for wild oat control compared to other products. Amidon hard red spring wheat was seeded April 23. Seedbed preparation was conventional with 6-inch row spacing and wheat seeded at 1 million pls/A. All treatments were applied with a CO2 pressurized bicycle sprayer traveling 3 mph with 8001 flat fan nozzles delivering 10 gpa at 40 psi. Plot dimensions were 10 feet by 30 feet. The treatments were arranged in a RCBD and replicated three times. Wheat was harvested with a small plot combine on August 11.

Soil conditions were very dry from mid-April through mid-June. We received only one inch of rainfall from planting to the first herbicide application and one additional inch through the first month after the herbicide application. Wild oat control with Achieve was better (20-30%) when tankmixed with certain broadleaf herbicides compared to Achieve applied alone. Severe antagonism was observed when Achieve was tankmixed with Peak. Weed control was generally as good or better when AMS was included in the tankmix.

Application date	May 19
Air / Soil temperature (F)	71 / 68
Soil moisture	Dry
Relative humidity	25%
Wheat stage	3-leaf
Wild oat stage / density	3-leaf / 17 per sq ft
Common lambsquarters size / density	<1" tall / 20 per sq ft

<u>Treatment</u>	<u>Rate</u>	<u>June 9</u>		<u>July 24</u>		<u>Yield</u> Bu/A
		<u>Wioa</u>	<u>Colq</u>	<u>Wioa</u>	<u>Colq</u>	
		-----% Control-----				
Achieve + TF8035	0.18 lb A/A + 0.5% V/V	63	0	53	0	16
Achieve + TF8035 + AMS	0.18 lb A/A + 0.5% V/V + 1.5 lb/A	75	0	60	0	18
Achieve + TF8035 + Bronate	0.18 lb A/A + 0.5% V/V + 0.751 lb A/A	85	95	83	100	30
Achieve + TF8035 + Bronate + AMS	0.18 lb A/A + 0.5% V/V + 0.751 lb A/A + 1.5 lb/A	85	95	91	97	35
Achieve + TF8035 + Starane + 2,4-D ester	0.18 lb A/A + 0.5% V/V + 0.167 lb A/A + 0.5lb A/A	87	95	88	99	32
Achieve + TF8035 + Starane + 2,4-D ester + AMS	0.18 lb A/A + 0.5% V/V + 0.167 lb A/A + 0.5 lb A/A + 1.5 lb/A	85	95	82	100	26
Achieve + TF8035 + 2,4-D ester	0.18 lb A/A + 0.5% V/V + 0.5 lb A/A	83	95	68	100	18

Achieve + TF8035 + 2,4-D ester + AMS	0.18 lb A/A +0.5% V/V + 0.5 lb A/A + 1.5 lb/A	88	94	88	99	34
Achieve + TF8035 + Curtail M	0.18 lb A/A + 0.5% V/V + 0.346 lb A/A	85	94	84	100	29
Achieve + TF8035 + Curtail M + AMS	0.18 lb A/A + 0.5% V/V + 0.346 lb A/A + 1.5 lb/A	90	93	80	99	25
Achieve + TF8035 + Peak	0.18 lb A/A + 0.5% V/V + 0.018 lb A/A	77	82	50	100	22
Achieve + TF8035 + Peak + AMS	0.18 lb A/A + 0.5% V/V + 0.018 lb A/A + 1.5 lb/A	48	77	38	90	15
Achieve + TF8035 + MCPA ester	0.18 lb A/A + 0.5% V/V + 0.5 lb A/A	87	93	77	99	23
Achieve + TF8035 + MCPA ester + AMS	0.18 lb A/A + 0.55 V/V + 0.25 lb A/A + 1.5 lb/A	89	85	75	100	24
Untreated		0	0	0	0	11
C.V.%		12	8	18	5	32
LSD .05		16	10	26	8	13