Foxtail Control in HRS Wheat, Carrington, 2005

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The dryland study was conducted on a loam soil with 7.2 pH and 3.4% organic matter at the NDSU Carrington Research Extension Center. The experimental design was a randomized complete block with three replicates. An NDSU experimental HRS wheat line was planted on May 15. Herbicide treatments were applied with a CO₂-hand-boom plot sprayer delivering 10 gal/A at 30 psi through 8001 flat-fan nozzles to the center 6.7 ft of 10 by 25 ft plots. Treatments were applied on June 7 with 62 F, 84% RH, 100% cloudy sky, and 10 mph wind to 4-leaf wheat and 1- to 4-leaf yellow foxtail. Average wheat density in untreated plots was 44plants/ft² and yellow foxtail density was 13 plants/ft². The trial was harvested with a plot combine on August 28.

Table.							
		Yeftc	o n tro l	HRS wheat			
H e rb ic id e		6/24	7 / 8	In ju ry		Seed	Test
Treatment	Product rate			6/24	7/8	Yield	Weight
	fl oz/A	·%		%		bu/A	lb/b u
Pinoxaden+A12127S	8.2+9.6	9 4	9 4	0	0	32.8	54.5
Pinoxaden+A12127S+W olfpack Pinoxaden+A12127S+H arm ony	8.2+9.6+12.8	9 4	9 4	0	0	31.7	53.9
Extra+MCPAe	8.2+9.6+0.3 oz+8	8 9	9 1	0	0	32.5	54.9
Puma	8	8 5	8 4	0	0	31.9	55.0
Puma+Wolpack	8 + 1 2 .8	7 0	7 2	0	0	33.3	55.2
Everest+NIS	0.6 oz + 0.25% v/v	7 5	7 5	3	2	34.3	54.7
Everest+Wolfpack	0.6 oz + 12.8	68	6 1	0	0	32.1	54.6
Untreated .	0	0	0	0	0	30.5	54.7
LSD (0.05)		6	1 3	NS	NS	NS	NS

Yellow foxtail control was 89 to 94% with pinoxaden treatments. Foxtail control was not antagonized with broadleaf herbicide tank mixtures with pinoxaden. Short-term crop flash was noted in some plots treated with pinoxaden (data not shown). Slight wheat injury occurred with Everest. Wheat yield and test weight did not differ among treatments, likely due to a competitive wheat crop (excellent crop density with good vigor) and light to medium foxtail density.