

## Weed control and crop tolerance to herbicides in no-till dry pea (Minot 2004).

'Majoret' dry pea was direct-seeded April 26 into wheat stubble at 120 lb/A into 7.5-inch rows. Individual plots were 10 x 30 ft and replicated three times. Preemergence (PRE) and postemergence (POST) herbicides were applied May 4 and June 17, respectively. The study was conducted on a loam soil with pH 5.5 and OM 3.1%. The primary weeds present were green and yellow foxtail (Fxtl), redroot pigweed (Rrpw), and wild buckwheat (wibw).

None of the treatments reduced crop density compared to the untreated check. However, Sencor applied PRE and treatments containing Basagran caused slight to moderate visible crop injury at the July rating. Yield with Basagran alone was slightly lower, which was likely due to moderate crop injury and slightly lower broadleaf weed control compared to other treatments.

All treatments provided good to excellent control of redroot pigweed and wild buckwheat. Spartan at the low rate (2.67 oz) and Basagran alone provided slightly less control of redroot pigweed and wild buckwheat compared to other treatments. Spartan alone did not control the foxtail species. Select and Poast provided good foxtail control.

Treatment <sup>a</sup>	Rate	Timing	Dry pea		Yield TW		Fxtl		Rrpw		Wibw	
			Jun 3	Jul 10	Aug 13		Jun 14	Jul 10	Jun 14	Jul 10	Jun 14	Jul 10
			#/m row	% inj	lb/A	lb/bu	———— % control ————					
Raptor <sup>b</sup> + Basagran	4 oz + 1 pt	POST	8.7	13	2796	64.8	0	94	0	92	0	90
Spartan/ Select + COC	2.67 oz/ 5 fl oz + 1% v/v	PRE/ POST	9.5	1	3100	65.6	60	95	76	83	77	88
Spartan/ Select + COC	4 oz/ 5 fl oz + 1% v/v	PRE/ POST	8.9	2	2850	64.6	71	97	90	91	87	95
Spartan/ Select + COC	5.33 oz/ 5 fl oz + 1% v/v	PRE/ POST	9.4	0	3119	64.7	73	97	90	90	93	96
Basagran + Poast + COC	2 pt + 1 pt + 2 pt	POST	8.7	17	2606	65.0	0	89	0	86	0	85
Spartan/ Basagran + Poast + COC	2.67 oz/ 1 pt + 1 pt + 2 pt	PRE/ POST	8.9	14	2926	65.7	58	93	73	93	77	95
Spartan + Sencor/ Select + COC	4 oz + 0.33 lb/ 5 fl oz + 1% v/v	PRE/ POST	8.4	21	2906	65.7	67	97	88	94	87	92
Untreated			9.0	0	2190	64.6	0	0	0	0	0	0
Handweeded check <sup>c</sup>			8.3	7	2846	65.1	0	0	0	0	0	0
LSD (0.05)			NS	5	346	NS	16	3	20	9	18	5
CV			8.3	33	7	0.8	25	2	25	8	22	4

<sup>a</sup>Roundup UltraMax II plus AMS was applied PRE to each treatment at 11 oz + 2.5 gal/100gal.

<sup>b</sup>Raptor was applied with NIS and 28% N at 0.25% v/v + 1 qt.

<sup>c</sup>Select plus COC at 5 oz + 1% v/v were applied to aid handweeding.