

Project Title: 2009 Intrastate Alfalfa Variety Evaluation – Dryland

Project Leader: Heather Mason

Project Personnel: Louise Strang

Objectives: To evaluate the yield performance of alfalfa varieties in a northwestern Montana dryland environment

Results:

Nine alfalfa cultivars were planted at a rate of 5 lb/a on May 9, 2008 in a randomized complete block design with four replications. In the spring of 2009, stands were well established following a cool, wet winter. All harvests were taken at the full bloom stage of the alfalfa crop. Yields at first harvest (June 26, 2009) were above average at 3.05 t/a. The growing season was warmer and drier than normal, but a wet July resulted in another good harvest (1.82 t/a) from the second cutting on August 4, 2009. Drier weather in the last summer and early fall resulted in reduced yields (0.93 t/a) from the third haying on October 16, 2009. Hay yields of the nine varieties did not differ in the 2009 or 2008 season.

Table 1. Stand and yield data from the Intrastate Alfalfa Variety Evaluation, 2009.

Cultivar	MT-ID#	Stand % plot	Harv-1 t/a	Harv-2 t/a	Harv-3 t/a	2009 Total t/a	2008 Total t/a	Total 08-09 t/a
Rebound 5.0	MT-398	81	2.99	1.93	1.06	5.98	0.90	6.88
DKA43-13	MT-413	95	2.91	1.90	1.18	5.98	1.24	7.22
54V09	MT-414	68	2.91	1.82	0.90	5.62	0.98	6.60
FSG 229CR	MT-415	94	3.29	1.94	0.97	6.20	1.31	7.51
FSG 429SN	MT-416	81	3.05	1.76	0.90	5.71	0.99	6.70
FSG 408DP	MT-417	74	3.02	1.94	0.96	5.92	1.03	6.95
Ladak-65	MT-2	84	2.84	1.59	0.74	5.17	0.92	6.09
Melton	MT-338	85	3.34	1.93	0.91	6.18	1.04	7.22
Shaw	MT-328	69	3.15	1.59	0.80	5.54	1.13	6.67
Mean		81	3.05	1.82	0.93	5.81	1.06	6.87
P>F		ns	ns	ns	ns	ns	ns	ns
LSD (0.05)		29.99	0.83	0.44	0.31	1.42	0.40	1.58