

**APPENDIX A, Table 1:** First and second production-year trial results from alfalfa trial on Gary Berrus farm, Lowville, New York. Trial entries are alfalfa populations developed for resistance to alfalfa snout beetle and the corresponding unselected populations.

**2013 ASB Trial - Lowville NY**

**Sown May 1, 2013. Used reduce seeding rate 12 grams/package instead of 15 grams/package.**

Alfalfa Population	Alfalfa Pedigree	Yield 9/5/13		2014		2014 Rank	2015		Height		2015 Rank
		T/A	*=yields in top group	Total Yield (T/A)	*=yields in top group		Yield 5/30/15 T/A	% Stand 30-May	3=tall, 1=short 30-May	*=yields in top group	
Seedway 9558	Seedway 9558 Base	2.05	*	5.03		14	1.79	85	2.3	*	12
NY0703	Seedway 9558-Asb4	2.09	*	5.86	*	3	1.86	80	2.5	*	8
Seedway 9558 SBR	Seedway 9558 Asb7	2.11	*	5.86	*	2	2.07	78	2.5	*	2
NY1202	Seedway 9558 Asb9	2.15	*	5.93	*	1	1.97	88	2.8	*	5
NY9223	Oneida VR Base	2.05	*	5.12		12	1.96	88	3.0	*	6
NY1203	Oneida VR Asb9	1.95		5.53	*	5	2.03	88	3.0	*	3
NY0243	PLH Base	1.80		4.97		15	1.16	50	1.0		16
NY1201	PLH Asb9	1.81		5.36		11	1.68	68	1.3		14
NY0324	MIII Base	2.13	*	5.66	*	4	1.66	78	2.8		15
NY1205	MIII Asb9	1.85		5.48	*	8	1.92	85	3.0	*	7
NY0326	ReSelect Saranac Base	1.74		5.06		13	1.86	85	3.0	*	10
NY1207	ReSelect Saranac Asb9	1.85		5.45	*	9	1.82	88	3.0	*	11
NY9117	NY9117 Base	2.23	*	5.41	*	10	1.98	90	2.8	*	4
NY1204	NY9117 Asb9	1.95		5.53	*	6	2.13	83	2.8	*	1
NY0316	Curculio Resistant	2.00	*	5.50	*	7	1.86	78	2.8	*	9
NY1206	Curculio Asb8	1.93		4.81		16	1.70	78	2.8		13
Avg. of Base Populations		2.00		5.25			1.75	79	2.5		10
Avg. of Selected Populations (cycle 8 or 9)		1.93		5.44			1.89	82	2.6		8
Trial Mean		1.98		5.41			1.84	80	2.6		
F-test		2.57**		2.79**			2.85**	2.22*	8.56**		
LSD (0.05)		0.25		0.56			0.38	19	0.6		
CV (%)		12.9		9.1			14.7	16.6	16.1		

Dug from reps 6 and 7 in fall 2014. Trial was injured by Brown root rot as well as ASB. Plants severely stressed.

**APPENDIX A, Table 2:** First production-year trial results from alfalfa trial on Haskell and Tim Yancey farm, Croghan, New York. Trial entries are alfalfa populations developed for resistance to alfalfa snout beetle and the corresponding unselected populations.

2014 Alfalfa Snout Beetle Resistant Alfalfa Trial																		
Belfort NY Mr. Haskell Yancey																		
The first three replicates had better alfalfa stands than the other three replicates.																		
Pedigree	REPS 1,2,3						*=yields		REPS 4,5,6						*=yields		Average	
					in top group	% Stand					in top group	% Stand	All Reps					
	5-Jun	23-Jul	Total	Rank			5-Jun	23-Jul	Total	Rank			Total	Rank				
	tons/acre						tons/acre						T/A					
Seedway 9558	1.14	1.33	2.45	10	*	92	0.73	0.91	1.64	11		82	2.05	10				
Seedway 9558 SBR	1.35	1.49	2.81	1	*	90	0.86	1.09	1.95	3	*	85	2.38	2				
ASB, Seedway 9558 Asb9	1.19	1.39	2.57	7	*	93	0.81	0.99	1.80	7		87	2.19	6				
ASB, NY1203 Base	0.99	1.24	2.24	15		90	0.58	0.72	1.30	15		73	1.77	15				
ASB, OVR Asb9	0.88	1.17	2.06	16		80	0.50	0.62	1.12	16		72	1.59	16				
ASB, NY1201 Base	1.28	1.33	2.64	3	*	92	0.80	0.92	1.73	8		75	2.18	7				
ASB, PLH Asb9	1.18	1.38	2.57	8	*	92	0.81	1.05	1.85	6	*	82	2.21	5				
ASB, MIII Asb9	0.99	1.39	2.37	12		87	0.65	0.85	1.50	12		85	1.94	13				
ASB, Curculio Asb8	1.10	1.34	2.43	11	*	92	0.66	0.78	1.44	14		72	1.94	12				
ASB cross	1.24	1.35	2.61	5	*	90	0.85	1.07	1.91	4	*	87	2.26	4				
ASB, NY1207 Base	1.20	1.45	2.64	4	*	92	0.71	1.01	1.72	9		85	2.18	8				
ASB, ReSelect Sar Asb9	1.06	1.29	2.35	14		87	0.64	0.85	1.49	13		83	1.92	14				
NY9117	1.24	1.43	2.67	2	*	92	0.93	1.17	2.09	1	*	88	2.38	1				
ASB, 9117 Asb9	1.38	1.25	2.60	6	*	93	0.87	1.12	2.00	2	*	87	2.30	3				
Guardsman II	1.15	1.31	2.46	9	*	88	0.86	1.00	1.86	5	*	82	2.16	9				
N-R-Gee	1.19	1.17	2.36	13		93	0.81	0.90	1.71	10		85	2.04	11				
Trial Mean	1.16	1.33	2.49				0.75	0.94	1.70									
F-test	5.52 **	0.80 NS	2.08 NS				8.99 **	6.57 **	8.11 **									
LSD (0.05)	0.19	0.33	0.43				0.12	0.18	0.28									
CV (%)	9.6	14.8	10.1				9.6	11.1	9.8									
Efficiency	313%	159%	237%				163%	129%	142%									