

2011 Minnesota Corn Performance Trials

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University of Minnesota Agricultural Experiment Station

Results of the Minnesota Corn Evaluation Program are presented in this bulletin. The program was conducted by the University of Minnesota Agricultural Experiment Station to provide unbiased information for use by corn growers when they choose which brand of corn to buy. The program was financed in part by entry fees from private seed companies that chose to place their entries for testing.

TEST LOCATIONS

Test zones, locations and maturities are as follows:

Southern Zone: Lamberton, Rochester and Waseca
Early Maturity Trial - 103 Relative Maturity (RM) and earlier entries
Late Maturity Trial - 104 RM and later entries

Central Zone: Hutchinson, Morris and Rosemount
Early Maturity Trial - 96 RM and earlier entries
Late Maturity Trial - 97 RM and later entries

Northern Zone: Glyphosate Tolerant Entries at Crookston, Rothsay and Staples
Entries without glyphosate tolerance at Crookston, Staples and Underwood

TESTING PROCEDURE

Entries: Seed corn companies choose their entries for each zone. Entries in each trial were based on the relative maturity (RM) provided by the company. The University of Minnesota Corn Testing Committee could also choose entries in each test. All locations tested three replications for each entry.

PRESENTATION OF DATA

Yields are given for individual locations along with yields and harvest moisture contents averaged across locations for 2011. Reported yields are adjusted to 15.5% grain moisture. Entries are ranked within a maturity group by moisture content averaged across locations for 2011.

IDENTIFICATION OF TRAITS

Genetic modifications of entries will be identified using generic terms to describe the trait without identifying the specific event for genetic modification.

For example Bt will identify genetic modification for corn borer resistance but will not differentiate between the Bt 11 event, the YieldGuard corn borer event or the Herculex corn borer event.

Identifiers will be:

Bt = European corn borer resistance

CRW = Corn rootworm resistance

GLY = glyphosate herbicide resistance

LL = Liberty herbicide resistance

LEAST SIGNIFICANT DIFFERENCE

The LSD (Least Significant Difference) figures at the bottom of the yield columns in the tables are statistical measures of variability in the trials. These values may be used to determine whether the difference between any two entries is likely to be a real difference or just natural variation.

If the yield difference between two entries is equal to or greater than the LSD, then one can be confident that the two entries probably differ in yield potential. We show LSD values with a 0.2 alpha level which means that when two entries differ in yield by the LSD value or more, one can be 80% confident that the two entries differ in yield potential. The higher yielding one is the better entry from the yield standpoint. If the yield difference between two entries is less than the LSD, the two entries probably do not differ significantly in yield potential.

Table 1a. Participating Companies

Names and mailing addresses of companies participating in the 2011 trials:

AgriGold Hybrids: Rt.1 Box 203 St Francisville, IL 62460
Albert Lea Seed House (Viking Hybrids): Box 127, 1414 W. Main, Albert Lea, MN 56007
Anderson Seeds: 37825 Co. Road 63, St. Peter, MN 56082
Croplan Genetics: 13749 Nevada Circle, Savage, MN 55378
Dahlman Seed Co.: 73504 200th St., Dassel, MN 55325
Dairyland Seed Co., Inc.: Box 958, West Bend, WI 53095
Dekalb (Monsanto Co.): 102 W. Carol Ave., Courtland, IL 60112
Dyna-Gro / CPS: 708 West Spruce St. Fergus Falls, MN 56537
Epley Bros. Hybrids Inc.: P.O. Box 310, Shell Rock IA 50670
G2 Genetics: 415 South Duff, Suite C, Ames, IA 50010
Hyland Seeds: 2 Hyland Drive, Blenheim, Ontario, Canada NOP 1A0
Legacy Seeds Inc.: 1937 Spindt Dr. Waupaca, WI 54981
NuTech Seed: 415 South Duff, Suite C, Ames, IA 50010
Peterson Farms Seed: 3104 164th Ave S.E. Harwood, ND 58092
Pioneer Hi-Bred Int'l., Inc.: 151 Saint Andrews Ct., Mankato, MN 56001
Proseed: 705 E Brewster, Harvey, ND 58341
Renk Seed Co.: 6809 Wilburn Rd., Sun Prairie, WI 53590
Seeds 2000: Box 200 115 N 3rd St., Breckenridge, MN 56520
Titan Pro: 1301 S. 24th St, Clear Lake, IA 50428
Wensman Seed Co.: P.O. Box 190, Wadena, MN 56492

Table 1b. Participating Companies

Names and Internet links of companies participating in the 2011 trials:

AgriGold Hybrids : www.agrigold.com
Albert Lea Seed House (Viking Hybrids): www.alseed.com
Croplan Genetics: www.croplangenetics.com
Dahlgan Seed Co.: www.dahlganseed.com
Dairyland Seed Co., Inc.: www.dairylandseed.com
Dekalb: www.dekalb.com, www.asgrow.com
Dyna-Gro / CPS: www.dynagroseed.com/dynagro
G2 Genetics: www.yieldleader.com
Hyland Seeds: www.hylandseeds.com
Legacy Seeds Inc.: www.legacyseeds.com
NuTech Seed: www.nutechseed.com
Peterson Farms Seed: www.petersonfarmsseed.com
Pioneer Hi-Bred Int'l., Inc.: www.pioneer.com/usa/
Proseed Inc.: www.proseed.net
Renk Seed Co.: www.renkseed.com
Seeds 2000: www.seeds2000.net
Titan Pro: www.titanprosci.com
Wensman Seed www.wensmanseed.com

Table 2. Individual Trial Information - 2011

Location	Cooperators	Previous Crop	Planting Date	Harvest Date
Lamberton	Steve Quiring	Soybean	10-May	11-Oct
Rochester	Fritz Brietenbach	Soybean	18-May	24-Oct
Waseca	Tom Hoverstad	Soybean	4-May	17-Oct
Hutchinson	Nathan Winter Paul Wright	Corn	4-Jun	19-Oct
Morris	George Nelson	Soybean	18-May	13-Oct
Rosemount	Jerry Holz	Soybean	16-May	25-Oct
Rothsay	George Nelson Troy Larson	Wheat	10-May	26-Oct
Crookston	Mark Hanson	Soybean	13-May	18-Oct
Staples	Bob Schafer	Soybean	10-May	18-Oct
Underwood	Matt Bickell	Corn	6-May	18-Oct

Early Maturity entries, Southern Locations, 2011

Company	Entry	Traits	Relative Maturity	Yield, Bushels/acre at:			Average Across Locations	
				Lamberton	Rochester	Waseca	Bu/Acre	% Moisture
97 and earlier RM entries								
DAIRYLAND SEED	ST-9395SSX	Bt,CRW,GLY,LL	95	174	184	222	193	12.9
DeKalb	DKC45-51	Bt,CRW,GLY,LL	95	187	195	192	191	13.2
Renk	RK585VT3P	Bt,CRW,GLY	96	189	155	188	177	13.4
Anderson Seeds	812VT3	Bt,CRW,GLY	93	171	160	196	176	13.4
Dahlman	R48-30 VT3PRO	Bt,CRW,GLY	95	189	190	203	194	13.4
Renk	RK580VT3	Bt,CRW,GLY	97	184	192	204	193	13.5
Anderson Seeds	628R	GLY	95	195	192	202	196	13.5
Anderson Seeds	811R	GLY	92	173	168	181	174	13.5
Anderson Seeds	628VT3	Bt,CRW,GLY	96	168	190	219	192	13.7
AgriGold	A6203VT3	Bt,CRW,GLY	96	211	168	219	199	13.8
97 and earlier RM Averages:				184	179	203	189	13.4
98 to 101 RM entries								
AgriGold	A6225VT3	Bt,CRW,GLY	98	204	190	197	197	13.0
DeKalb	DKC49-94	Bt,CRW,GLY,LL	99	187	180	206	191	13.1
Pioneer	P9910XR	Bt,CRW,GLY,LL	99	214	205	236	218	13.1
Anderson Seeds	617R	GLY	98	183	190	197	190	13.2
Titan Pro	80A00GL	Bt,CRW,GLY,LL	100	183	203	198	195	13.4
Wensman	W 7273VT3	Bt,CRW,GLY	98	181	183	202	188	13.4
DeKalb	DKC48-12	Bt,CRW,GLY,LL	98	192	202	206	200	13.6
AgriGold	A6220VT3Pro	Bt,CRW,GLY	98	199	186	190	191	13.7
Epley Brothers	E1238GT3000	Bt,CRW,GLY,LL	101	180	172	201	184	13.9
AgriGold	A6256STX	Bt,CRW,GLY,LL	100	193	185	212	197	14.0
Anderson Seeds	626R	GLY	100	182	172	209	188	14.1
Legacy Seeds	L-4010 VT3Pro	Bt,CRW,GLY	100	185	188	195	189	14.3
Wensman	W 7290VT3PRO	Bt,CRW,GLY	99	216	198	229	214	14.3
Viking	C94-00R		100	185	174	192	184	14.4
Croplan Genetics	4338VT3	Bt,CRW,GLY	100	187	198	205	197	14.4
G2 Genetics	5H-501	Bt,GLY,LL	101	192	204	210	202	14.4
Anderson Seeds	605VT3	Bt,CRW,GLY	100	178	172	196	182	14.5
G2 Genetics	5H-0101	Bt,GLY,LL	101	185	209	230	208	14.5
Dahlman	R50-30		100	174	191	180	182	14.5
NuTech	5N-001	Bt,CRW,GLY,LL	100	183	186	217	195	14.5
Anderson Seeds	6073		101	204	205	224	211	14.7
Pioneer	P0115XR	Bt,CRW,GLY,LL	101	196	230	223	216	14.7
Titan Pro	89A98GL	Bt,CRW,GLY,LL	98	193	195	209	199	14.8
DAIRYLAND SEED	ST-9399	Bt,CRW,GLY,LL	99	206	212	221	213	14.9
G2 Genetics	5X-500	Bt,CRW,GLY,LL	100	179	200	217	199	15.1
AgriGold	A6276VT3	Bt,CRW,GLY	101	198	208	209	205	15.2
Wensman	W 7320VT3PRO	Bt,CRW,GLY	101	184	193	197	191	15.3
Titan Pro	1018		101	179	202	233	205	15.5
Viking	60-01N		101	193	208	219	206	15.6
Titan Pro	80A01GLV	Bt,CRW,GLY,LL	101	188	207	220	205	16.2
98 to 101 RM Averages:				190	195	209	198	14.3

Early Maturity entries, Southern Locations, 2011, continued

Company	Entry	Traits	Relative Maturity	Yield, Bushels/acre at:			Average Across Locations	
				Lamberton	Rochester	Waseca	Bu/Acre	% Moisture
102 to 103 RM entries								
Anderson Seeds	103R	GLY	102	188	185	201	191	14.6
G2 Genetics	5H-902	Bt, GLY, LL	102	202	221	227	217	14.0
NuTech	5N-102	Bt, CRW, GLY, LL	102	195	188	227	203	14.4
DAIRYLAND SEED	ST-9303SSX	Bt, CRW, GLY, LL	103	205	210	218	211	14.5
Wensman	W 7360VT3	Bt, CRW, GLY	103	197	214	213	208	14.7
AgriGold	A6319VT3Pro	Bt, CRW, GLY	103	193	163	210	189	14.9
DeKalb	DKC53-78	Bt, CRW, GLY, LL	103	198	183	218	200	15.1
Renk	RK698VT3	Bt, CRW, GLY	103	188	206	213	202	15.2
NuTech	5B-0205	Bt, CRW, GLY, LL	102	176	211	228	205	15.3
G2 Genetics	5H-903	Bt, GLY, LL	103	182	207	199	196	15.4
Renk	RK694GTCBLLRWBL	Bt, CRW, GLY, LL	103	201	220	210	210	15.6
G2 Genetics	5H-502	Bt, GLY, LL	102	195	219	204	206	15.7
Anderson Seeds	103VT3	Bt, CRW, GLY	103	168	199	205	191	15.9
NuTech	5N-803	Bt, CRW, GLY, LL	103	186	195	224	202	16.1
AgriGold	A6323GT3	Bt, CRW, GLY, LL	103	210	197	215	207	17.5
102 to 103 RM averages:				192	201	214	202	15.3
Southern Locations, Early Maturity Averages:				190	194	209	198	14.4
LSD(0.20)				19	20	18	11	0.5

Late Maturity entries, Southern Locations, 2011

Company	Entry	Traits	Relative Maturity	Yield, Bushels/acre at:			Average Across Locations	
				Lamberton	Rochester	Waseca	Bu/Acre	% Moisture
104 RM and later entries								
G2 Genetics	5H-905	Bt,GLY,LL	105	201	180	222	201	15.1
Renk	RK708VT3P	Bt,CRW,GLY	105	186	185	204	192	15.2
Wensman	W6443 RR	GLY	106	191	176	248	205	15.3
Titan Pro	1041		104	177	189	197	188	15.4
NuTech	5N-705	Bt,CRW,GLY,LL	105	184	164	223	190	15.4
Renk	RK741VT3P	Bt,CRW,GLY	108	189	169	222	193	15.5
Titan Pro	80A05GL	Bt,CRW,GLY,LL	105	182	179	211	190	16.0
DeKalb	DKC55-09	Bt,CRW,GLY,LL	105	193	197	223	204	16.1
Renk	RK744VT3P	Bt,CRW,GLY	107	188	187	211	195	16.3
G2 Genetics	5H-0701	Bt,GLY,LL	107	175	206	226	202	16.3
DeKalb	DKC57-50	Bt,CRW,GLY	107	170	181	194	182	16.5
Pioneer	P0448XR	Bt,CRW,GLY,LL	104	204	189	230	207	16.6
Croplan Genetics	5438SS	Bt,CRW,GLY,LL	104	192	190	230	204	16.7
Wensman	W 7473VT3	Bt,CRW,GLY	109	192	186	240	206	16.8
Viking	D44-05RL	Bt,CRW,GLY	105	172	186	221	193	16.9
Pioneer	P0533XR	Bt,CRW,GLY,LL	105	191	175	214	193	17.1
Viking	50-04N		104	204	208	204	206	17.2
DAIRYLAND SEED	ST-9206SSX	Bt,CRW,GLY,LL	106	189	185	209	194	17.3
Legacy Seeds	L-5350 3000GT	Bt,CRW,GLY,LL	104	195	213	216	208	17.4
Epley Brothers	E1418GT3000	Bt,CRW,GLY,LL	104	182	194	228	201	17.6
NuTech	5B-1003	Bt,GLY,LL	110	170	181	217	189	17.7
G2 Genetics	5H-0601	Bt,GLY,LL	106	192	173	229	198	17.8
Titan Pro	X81A04	GLY	104	191	164	205	187	17.9
Wensman	W 7392GT3	Bt,CRW,GLY,LL	104	213	181	206	200	18.1
DAIRYLAND SEED	ST-9308SSX	Bt,CRW,GLY,LL	108	175	170	197	181	18.5
NuTech	5N-1004	Bt,CRW,GLY,LL	110	172	185	209	189	18.7
G2 Genetics	5H-1001	Bt,GLY,LL	110	188	173	199	187	18.8
Epley Brothers	E1602SS	Bt,CRW,GLY,LL	106	168	188	226	194	18.8
Wensman	W 7566VT3PRO	Bt,CRW,GLY	111	190	188	241	206	19.1
DeKalb	DKC59-35	Bt,CRW,GLY	109	195	213	224	211	19.3
G2 Genetics	5X-909	Bt,CRW,GLY,LL	109	189	194	206	196	19.5
G2 Genetics	5X-908	Bt,CRW,GLY,LL	108	185	189	222	199	19.7
DAIRYLAND SEED	ST-9210SSX	Bt,CRW,GLY,LL	110	170	185	236	197	20.1
Southern Locations, Late Maturity Averages:				187	186	218	197	17.3
LSD(0.20)				18	17	15	10	0.9

Early Maturity entries, Central Locations, 2011

Company	Entry	Traits	Relative Maturity	Yield, Bushels/acre at:			Average Across Locations	
				Hutchinson	Morris	Rosemount	Bu/Acre	% Moisture
93 and earlier RM entries								
NuTech	5N-290	Bt,CRW,GLY,LL	90	232	184	206	207	15.1
Proseed	990 3000GT	Bt,CRW,GLY,LL	90	209	180	197	195	15.2
Titan Pro	80A93GL	Bt,CRW,GLY,LL	93	220	163	200	194	15.2
Renk	RK302GTCBLLRW	Bt,CRW,GLY,LL	90	226	196	200	207	15.5
G2 Genetics	5H-492	Bt,GLY,LL	92	189	189	178	185	15.9
Proseed	1091 3000GT	Bt,CRW,GLY,LL	91	208	163	192	188	15.9
Peterson Farm Seed	98L90	Bt,GLY,LL	90	245	220	217	227	16.4
NuTech	5B-290	Bt,GLY,LL	90	205	205	199	203	16.5
Renk	RK434VT3P	Bt,CRW,GLY	92	225	193	199	206	16.5
Peterson Farm Seed	76R92	Bt,GLY	92	208	192	203	201	16.6
DeKalb	DKC42-72	Bt,CRW,GLY	92	220	181	186	196	16.7
G2 Genetics	5X-9101	Bt,CRW,GLY,LL	91	199	192	193	195	16.8
Dahlman	R45-46 RR	GLY	90	209	185	195	196	17.0
Dahlman	R45-48 VT3PRO	Bt,CRW,GLY	90	211	169	192	191	17.1
DAIRYLAND SEED	ST-9992	Bt,GLY,LL	92	239	211	215	222	17.7
Dahlman	R45-34 VT3PRO	Bt,CRW,GLY	90	221	187	181	196	17.8
Wensman	W 7140VT3PRO	Bt,CRW,GLY	93	226	180	189	198	18.2
NuTech	5N-9001	Bt,CRW,GLY,LL	90	205	171	178	185	18.3
Dahlman	R46-30 VT3PRO	Bt,CRW,GLY	92	226	165	183	191	18.4
93 RM and earlier averages:				217	186	195	199	16.7
94 to 96 RM entries								
DAIRYLAND SEED	ST-6494	Bt,CRW,GLY,LL	94	203	194	195	198	15.6
Hyland Seeds	8377	Bt,CRW,GLY,LL	94	195	169	193	186	16.5
SEEDS 2000	9602 G3	Bt,CRW,GLY,LL	96	217	204	203	208	16.9
Proseed	794 3000GT	Bt,CRW,GLY,LL	94	204	182	207	198	17.3
G2 Genetics	5X-795	Bt,CRW,GLY,LL	95	211	194	190	198	17.4
Dahlman	R48-30 VT3PRO	Bt,CRW,GLY	95	215	179	205	200	17.7
Viking	E52-94R		94	201	187	184	191	17.8
Renk	RK585VT3P	Bt,CRW,GLY	96	201	196	197	198	17.9
DAIRYLAND SEED	ST-9395SSX	Bt,CRW,GLY,LL	95	218	197	209	208	18.0
Legacy Seeds	L-3610 VT3Pro	Bt,CRW,GLY	96	223	195	196	205	18.1
Pioneer	P9630XR	Bt,CRW,GLY,LL	96	225	163	190	193	18.2
Legacy Seeds	L-3110 VT3Pro	Bt,CRW,GLY	94	233	170	196	199	18.3
Renk	RK530VT3P	Bt,CRW,GLY	94	215	191	188	198	18.3
G2 Genetics	5X-895	Bt,CRW,GLY,LL	95	205	188	183	192	18.5
Peterson Farm Seed	87V95	Bt,CRW,GLY,LL	95	192	147	208	182	18.6
Wensman	W 7268VT3	Bt,CRW,GLY	96	217	204	215	212	18.7
Viking	C33-94R	GLY	94	198	179	192	189	18.9
G2 Genetics	5H-696	Bt,GLY,LL	96	225	44	203	157	19.0
DeKalb	DKC45-51	Bt,CRW,GLY,LL	95	218	172	191	194	19.9
94 to 96 RM averages:				211	176	197	195	18.0
Central Locations, Early Maturity Averages:				214	181	196	197	17.3
LSD(0.20)				15	19	12	9	0.5

Late Maturity entries, Central Locations, 2011

Company	Entry	Traits	Relative Maturity	Yield, Bushels/acre at:			Average Across Locations	
				Hutchinson	Morris	Rosemount	Bu/Acre	% Moisture
97 to 99 RM entries								
NuTech	5N-9901	Bt,CRW,GLY,LL	99	176	192	203	190	16.6
G2 Genetics	5H-797	Bt,GLY,LL	97	220	192	200	204	18.0
Wensman	W 7273VT3	Bt,CRW,GLY	98	214	208	211	211	18.1
Wensman	W 7270VT3PRO	Bt,CRW,GLY	97	211	174	196	194	18.1
Viking	U41-99L	Bt, LL	99	192	174	213	193	18.3
Titan Pro	X81A97	Bt,GLY,LL	97	221	145	175	180	18.5
Pioneer	P9917XR	Bt,CRW,GLY,LL	99	198	194	209	200	18.9
Pioneer	P9910XR	Bt,CRW,GLY,LL	99	198	188	201	196	18.9
Peterson Farm Seed	53B97	Bt,CRW,GLY	97	190	177	215	194	19.0
Renk	RK676		99	205	171	187	188	19.0
Renk	RK580VT3	Bt,CRW,GLY	97	237	157	199	198	19.1
NuTech	5N-197	Bt,CRW,GLY,LL	97	186	205	212	201	19.2
DeKalb	DKC48-12	Bt,CRW,GLY,LL	98	228	205	206	213	19.2
Wensman	W 7290VT3PRO	Bt,CRW,GLY	99	206	175	225	202	19.5
DeKalb	DKC49-94	Bt,CRW,GLY,LL	99	215	206	196	206	19.5
Viking	Y91-99RL	Bt,CRW,GLY,LL	99	207	208	196	204	20.1
Titan Pro	89A98GL	Bt,CRW,GLY,LL	98	238	211	209	219	20.2
SEEDS 2000	9902 G3	Bt,CRW,GLY,LL	99	214	228	215	219	20.3
DAIRYLAND SEED	ST-9399	Bt,CRW,GLY,LL	99	204	222	204	210	20.6
Hyland Seeds	HL 4424	Bt,CRW,GLY,LL	98	192	195	198	195	20.9
99 RM and earlier averages:				208	191	203	201	19.1
Later than 99 RM entries								
DeKalb	DKC50-66	Bt,CRW,GLY	100	227	186	195	203	18.7
Titan Pro	80A00GL	Bt,CRW,GLY,LL	100	206	186	208	200	19.0
Dahlman	R50-30		100	194	171	189	185	19.0
G2 Genetics	5X-500	Bt,CRW,GLY,LL	100	156	177	207	180	19.2
Hyland Seeds	HL 4490	Bt,CRW,GLY,LL	100	190	149	193	178	19.5
Titan Pro	1018		101	208	217	204	210	19.9
Legacy Seeds	L-4010 VT3Pro	Bt,CRW,GLY	100	206	228	189	208	20.1
G2 Genetics	5H-902	Bt,GLY,LL	102	216	196	209	207	20.2
NuTech	5B-0205	Bt,CRW,GLY,LL	102	195	138	209	180	20.3
G2 Genetics	5H-0101	Bt,GLY,LL	101	227	210	205	214	20.3
NuTech	5N-001	Bt,CRW,GLY,LL	100	176	202	208	195	20.5
NuTech	5N-102	Bt,CRW,GLY,LL	102	213	226	213	217	20.6
Renk	RK698VT3	Bt,CRW,GLY	103	206	193	213	204	20.8
Wensman	W 7320VT3PRO	Bt,CRW,GLY	101	221	205	201	209	21.2
G2 Genetics	5H-501	Bt,GLY,LL	101	224	211	207	214	21.3
DeKalb	DKC53-78	Bt,CRW,GLY,LL	103	190	153	217	187	21.3
Titan Pro	80A01GLV	Bt,CRW,GLY,LL	101	178	199	209	195	21.5
G2 Genetics	5H-502	Bt,GLY,LL	102	203	188	215	202	21.5
DAIRYLAND SEED	ST-9303SSX	Bt,CRW,GLY,LL	103	209	134	224	189	22.1
DAIRYLAND SEED	ST-9206SSX	Bt,CRW,GLY,LL	106	199	161	210	190	22.5
DeKalb	DKC55-09	Bt,CRW,GLY,LL	105	230	175	203	202	22.6
Pioneer	P0448XR	Bt,CRW,GLY,LL	104	222	200	212	211	22.8
Later than 99 RM averages:				204	186	206	199	20.7
Central Locations, Late Maturity Averages:				206	189	205	200	19.9
LSD(0.20)				23	30	15	13	0.6

Glyphosate Tolerant entries, Northern Locations, 2011

Company	Entry	Traits	Relative Maturity	Yield, Bushels/acre at:			Average Across Locations	
				Crookston	Rothsay	Staples	Bu/Acre	% Moisture
82 and earlier RM glyphosate tolerant entries								
Wensman	W 8107VT2PRO	Bt,GLY	80	93	162	197	151	14.9
Peterson Farm Seed	76F82	Bt,GLY	82	117	172	179	156	15.0
Wensman	W 7080VT3	Bt,CRW,GLY	80	151	150	185	162	15.0
Renk	RK212GT	GLY	81	133	160	198	164	15.2
Wensman	W 8074VT2PRO	Bt,GLY	81	127	146	198	157	15.3
82 and earlier RM glyphosate tolerant entry averages:				124	158	192	158	15.1
83 to 87 RM glyphosate tolerant entries								
G2 Genetics	5H-080	Bt,GLY,LL	83	138	136	207	160	14.4
Hyland Seeds	8234	Bt,CRW,GLY,LL	86	138	155	176	156	14.5
DAIRYLAND SEED	ST-9286SSX	Bt,CRW,GLY,LL	86	158	158	187	168	14.8
Peterson Farm Seed	56J86	Bt,CRW,GLY	86	180	164	201	182	14.8
DeKalb	DKC33-53	Bt,CRW,GLY,LL	83	119	132	185	145	14.8
Proseed	884 VT3	Bt,CRW,GLY	84	120	157	181	153	14.9
DeKalb	DKC35-43	Bt,CRW,GLY	85	118	148	175	147	14.9
Wensman	W 8089VT2PRO	Bt,GLY	86	129	146	204	160	14.9
Dyna-Gro Seed	D27GC19	Bt,GLY,LL	87	140	158	188	162	14.9
Dahlman	R43-30 VT3PRO	Bt,CRW,GLY	85	156	161	208	175	14.9
DAIRYLAND SEED	ST-7085	Bt,GLY,LL	85	138	136	200	158	15.0
Pioneer Brand	39V07	Bt,CRW,GLY	85	164	158	198	174	15.0
Renk	RK295GTCBLLRW	Bt,CRW,GLY,LL	85	115	169	182	155	15.0
NuTech	5N-183	Bt,CRW,GLY,LL	83	110	138	184	144	15.0
Wensman	W 8085VT2PRO	Bt,GLY	84	120	168	202	163	15.1
NuTech	5N-186	Bt,CRW,GLY,LL	86	116	144	204	154	15.1
Pioneer Brand	P8581R	GLY	85	107	128	191	142	15.2
Proseed	1086 3000GT	Bt,CRW,GLY,LL	86	149	168	192	170	15.2
Proseed	1183 GTCBLL	Bt,GLY,LL	83	139	159	184	161	15.3
Proseed	781 RRBt	Bt,GLY	83	128	158	181	156	15.5
SEEDS 2000	2852 GTCBLL	Bt,GLY,LL	85	114	176	213	168	15.7
83 to 87 RM glyphosate tolerant entry averages:				133	153	192	160	15.0

Glyphosate Tolerant entries, Northern Locations, 2011, continued

Company	Entry	Traits	Relative Maturity	Yield, Bushels/acre at:			Average Across Locations	
				Crookston	Rothsay	Staples	Bu/Acre	% Moisture
88 to 92 RM glyphosate tolerant entries								
DeKalb	DKC39-07	Bt, GLY	89	149	182	217	183	14.4
Renk	RK302GTCBLLRW	Bt, CRW, GLY, LL	90	101	177	213	164	14.5
Proseed	990 3000GT	Bt, CRW, GLY, LL	90	90	151	203	148	14.5
Legacy Seeds	L-2999 3000GT	Bt, CRW, GLY, LL	91	130	179	208	172	14.7
Dahlman	R44-66 RR	GLY	88	184	207	198	196	14.7
NuTech	5N-290	Bt, CRW, GLY, LL	90	120	170	198	163	14.9
Hyland Seeds	HL R238	GLY	92	150	186	205	180	14.9
Pioneer Brand	P8906HR	Bt, CRW, GLY	89	90	174	226	163	15.0
Titan Pro	X81A88GLV	GLY	88	119	161	165	148	15.1
Dyna-Gro Seed	CX11191	Bt, CRW, GLY	91	174	163	202	179	15.1
Peterson Farm Seed	98L90	Bt, GLY, LL	90	161	176	205	181	15.1
G2 Genetics	5X-8901	Bt, CRW, GLY, LL	89	71	150	178	133	15.1
Hyland Seeds	8300	Bt, CRW, GLY, LL	90	171	175	182	176	15.2
Proseed	1091 3000GT	Bt, CRW, GLY, LL	91	176	150	194	173	15.2
G2 Genetics	5X-9101	Bt, CRW, GLY, LL	91	112	173	198	161	15.2
Dyna-Gro Seed	D32VP29	Bt, CRW, GLY	92	171	175	208	185	15.2
Dahlman	R45-48 VT3PRO	Bt, CRW, GLY	90	182	195	205	194	15.3
NuTech	5B-290	Bt, GLY, LL	90	136	135	200	157	15.3
SEEDS 2000	2903 GTCBLL	Bt, GLY, LL	90	134	150	211	165	15.4
Renk	RK434VT3P	Bt, CRW, GLY	92	163	153	197	171	15.4
Wensman	W 8120VT2PRO	Bt, GLY	92	158	163	201	174	15.4
G2 Genetics	5H-492	Bt, GLY, LL	92	130	177	186	164	15.4
Dahlman	R45-34 VT3PRO	Bt, CRW, GLY	90	169	160	190	173	15.4
Peterson Farm Seed	76R92	Bt, GLY	92	174	152	220	182	15.4
Dahlman	R46-30 VT3PRO	Bt, CRW, GLY	92	150	147	188	161	15.5
Hyland Seeds	8386	Bt, CRW, GLY, LL	92	144	176	202	174	15.6
Wensman	W 7107VT3	Bt, CRW, GLY	90	113	174	206	164	15.6
DAIRYLAND SEED	ST-9992	Bt, GLY, LL	92	162	127	197	162	15.6
Legacy Seeds	L-2811 VT3Pro	Bt, CRW, GLY	88	189	149	204	181	15.7
Dahlman	R45-46 RR	GLY	90	177	169	216	187	15.8
G2 Genetics	5H-8902	Bt, GLY, LL	89	137	159	197	164	15.8
NuTech	5N-9001	Bt, CRW, GLY, LL	90	153	197	200	183	16.5
88 to 92 RM glyphosate tolerant entry averages:				145	166	201	171	15.2
93 and later RM glyphosate tolerant entries								
DAIRYLAND SEED	ST-9395SSX	Bt, CRW, GLY, LL	95	143	154	191	163	14.5
Hyland Seeds	8454	Bt, CRW, GLY, LL	93	120	164	189	157	14.6
DAIRYLAND SEED	ST-6494	Bt, CRW, GLY, LL	94	87	187	198	157	14.6
Hyland Seeds	8395	Bt, CRW, GLY, LL	95	92	165	192	149	14.7
Dyna-Gro Seed	D35RR40	GLY	95	155	187	218	187	14.9
SEEDS 2000	9202 VT2P	Bt, GLY	95	177	192	197	189	15.2
DeKalb	DKC45-51	Bt, CRW, GLY, LL	95	164	172	176	171	15.3
Wensman	W 7140VT3PRO	Bt, CRW, GLY	93	169	170	203	181	15.8
Wensman	7143VT3	Bt, CRW, GLY	93	105	165	200	157	15.8
G2 Genetics	5X-795	Bt, CRW, GLY, LL	95	49	168	200	139	15.9
SEEDS 2000	9503 VT3P	Bt, CRW, GLY	95	185	185	201	190	15.9
Pioneer Brand	P9630XR	Bt, CRW, GLY, LL	96	107	150	192	150	16.0
93 and Later RM glyphosate tolerant entry averages:				129	172	196	166	15.3
Glyphosate tolerant northern locations averages:				137	163	197	166	15.2
LSD(0.20)				23	27	13	12	0.3

Entries Without Glyphosate Tolerance, Northern Locations, 2011

Company	Entry	Traits	Relative Maturity	Yield, Bushels/acre at:			Average Across Locations	
				Crookston	Staples	Underwood	Bu/Acre	% Moisture
Foundation Direct	8925		85	103	182	150	145	14.9
Dahlman	R40-10		80	116	154	92	120	14.9
Foundation Direct	ORG8080		80	79	151	114	115	15.1
Foundation Direct	ORG8900		88	156	177	162	165	15.3
Viking	20-90N		90	135	197	201	177	15.9
Foundation Direct	8830		89	132	194	184	170	16.2
Foundation Direct	8984		84	53	214	177	148	16.8
Northern Zone non glyphosate entry average:				110	181	154	149	15.6
LSD(0.20)				24	12	16	10	0.3