NORTHERN MINNESOTA GRASS SEED GROWERS
NEWSLETTER
August 1, 2011

RYEGRASS GROWING DEGREE DAYS (GDD)

Ryegrass GDD will be tracked for the 2011 growing season with comparisons to the last four years. A base temp of 32 degrees F will be used for ryegrass (T-Base = 32 F).

Table 1. Growing degree days (GDD) for March, April, May, June and July 2006 - 2011 near Roseau MN.

Year	2011	2010	2009	2008	2007	2011 vs. 10
March	7	137	30	6	90	-130
April	278	476	247	202	322	-198
May	639	707	515	501	746	-68
June	898	911	860	870	990	-13
July	1162	1,174	943	1,034	1,156	-12
Total	2,984	3,405	2,595	2,613	3,461	

For the week ending July 31st, 259 GDD were accumulated with an average of 37 GDD/day. For the month of July the 2011 season is similar to the 2010 season (-12 GDD). We have had five weeks of warm weather which has hastened ryegrass maturity.

GENERAL CROP CONDITION

Ryegrass

Several ryegrass fields have been harvested this week. Ryegrass harvest will continue for a couple weeks with good weather. Swathing of later maturing ryegrass will continue this week.

CROP MANAGEMENT

Ryegrass

Spring wheat harvest is right around the corner. If ryegrass is to be seeded into wheat stubble it is important to get a **uniform spread of the wheat straw and chaff.** Chaff spreaders will spread hulls and other "fines". A uniform spread of the wheat straw is the first step in successful ryegrass stand establishment.

Late summer seeding of ryegrass into wheat stubble has been a successful method used to establish ryegrass. With spring wheat harvest right around the corner the 2011 season would provide an opportunity for seeding ryegrass into wheat stubble after harvest. When should ryegrass be seeded in the late summer? The data in Table 1 are results from research conducted at the Magnusson Research Farm near Roseau, MN.

An application of Roundup to control weed growth is a good management practice prior to seeding ryegrass into wheat stubble. This is especially important for perennial grass (e.g. Quackgrass) and perennial broadleaf weeds.

Table 1: Arctic Green perennial ryegrass seeded at various dates in tilled and no-till ground in 2008 and a two year average (2008 & 2009) at the Magnusson Research Farm near Roseau, MN.

	----------2009----------				-------2008 & 2009^ ------	
	Tilled Ground*		Wheat Stubble**		Average of Tilled & No-till	
Seeding	**Yield**	**Dry Matter**	**Yield**	**Dry Matter**	**Yield**	**Dry Matter**
Date	(#/acre)	(tons/acre)	(#/acre)	(tons/acre)	(#/acre)	(tons/acre)
8/25/08	736	1.81	1405	2.96	1314	2.70
9/1/08	599	1.61	1135	2.71	1281	2.76
9/9/08	545	1.07	714	2.05	953	2.00
9/17/08	173	0.71	466	1.27	665	1.43
9/22/08	67	0.92	377	1.08	365	0.95
LSD @5%	444	1.10	444	1.10	320	0.78

^ Averages of tilled and no-till seeding of perennial ryegrass seeded in 2007 and 2008 (harvested in 2008 and 2009). The seeding dates for 2007 are similar to those of 2008 (harvested in 2009).
* Perennial ryegrass seeded into bare ground without a cover
** Perennial ryegrass seeded into wheat stubble

Several conclusions can be gleaned from the data in Table 1.

- In 2009, ryegrass dry matter and seed yields were better if seeded into stubble than bare ground
- For ryegrass seed yields over 1,000 pounds, ryegrass should be seeded in late August or the first week of September
- Dry matter yields had a similar decline as seed yield as seeding date was later in the fall
- Data would suggest not seeding ryegrass if seeding is delayed until mid-September as yield potential is 50% of late August seeding

This will be the last weekly Grass Seed Newsletter as we are into ryegrass harvest. The newsletter format will change to a monthly format for the late summer and fall.