



Can Grazing Cover Crops Add Value

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Utilizing forage crops for soil improvement isn't all that new. Farmers on mixed operations have incorporated livestock and crops and seen the benefits of legumes and manures both economically and from a soil health aspect. As farms became more specialized, the benefits of livestock and forages were lost to grain farmers. Economics moved Beef production to lower quality soils not suited for high yielding grain production.

What we then started to see was livestock production on lower producing soils, with good management practices, substantially increase the grazing capacity and health of these soils.

Mixed farming operations know the benefits of forages (cover crops) and livestock, but in recent years grain producers have also started to investigate and incorporate cover crops into their operations.

Looking at a recent report out of the University of Manitoba [2020 Prairie Cover Crop Survey](#), we see from this table an indication of the interest in utilizing cover crops across western Canada.

Table 3: Percent and number of acres of cover crops grown on farms that responded by cover crop type and province (N = 281).

Province	Cover Crop Type					
	Shoulder	Full	Total	Shoulder	Full	Total
	Percentage of Farm Acres			Number of Acres		
Alberta	37%	63%	23%	8,627	14,776	23,403
Saskatchewan	55%	45%	31%	17,281	14,265	31,546
Manitoba	64%	36%	46%	30,256	17,335	47,590
Total	55%	45%	100%	56,163	46,376	102,539

What is interesting is that from the farms surveyed over half of the farms (54 percent) that responded had beef cattle as part of their farm operation, but only 29 percent did not have any livestock on their farm.

When cover crops are incorporated into a livestock operation the economic benefits - over and above improved soil health - can be increased by utilizing a cover crop as a forage source. In an article from the Canadian Journal of Plant Science [Integrating green manure and grazing systems: A review](#), the authors note that in grazed green manures (cover crops), a large proportion of these nutrients are returned to the system in highly plant-available forms, unlike plant material in soil-incorporated green manure

crops, which must undergo the process of decomposition and mineralization before the nutrients are plant-available. The rumen effectively speeds up the cycling of these nutrients within the system (Gardner and Faulkner 1991). This may affect the uptake of nutrients by the following crop, potentially increasing yield.

When we look at the Cover Crop Survey the respondents that don't have livestock may be incorporating cover crops into their operations either by relay cropping, inter-cropping or as a green manure crop. All of these methods have benefits such as:

- Increased microbial diversity in soils due to plant diversity
- Improved soil health by reducing disturbance (less tillage)
- Extended plant growth to feed soil microbes
- Keeping the soil covered to reduce erosion

As with any new practice, you will want to do everything possible to make it successful. Before doing anything it is suggested that you should first decide what you want the cover crop to do, which can be difficult as we often want it to do everything.

Here are seven reasons you might have to plant a cover crop. They can:

1. Help you implement a no-till system.
2. Help reduce erosion by improving aggregate stability.
3. Support soil microbial activity.
4. Help with weed control.
5. Help build soil organic matter.
6. Reduce the need for commercial fertilizers.
7. Extend the grazing season for livestock.

As a grain farmer number 7 isn't an option, or is it?

In a recent Manitoba Cooperator article, [How crops and livestock producers can work together for their mutual benefit](#), we read about Vince, a regenerative farmer, who had pursued for years to improve soil carbon, water management, nutrient cycling and limit erosion and figured the next step beyond his extensive cover crops was livestock. He thought, it could help intensify those gains through rotational grazing, while also generating some income charging a grazing fee.

Can something like this work on your operation? As you read through the article you can see some of the issues that need to be addressed. You also need to be sure you find someone that you can work with.

Finding someone just became a lot easier with the introduction of the [Manitoba Grazing Exchange \(MGE\)](#).

Integrating livestock onto cropland with proper grassland management are key to improving soil health. The goal of MGE is to virtually connect farmers who have

available grazing pasture or cover crop fields with livestock owners/ranchers who are seeking grazing land through an interactive map.

The Manitoba Grazing Exchange (MGE) was launched in January 2022 through a partnership between the [Manitoba Organic Alliance](#) and the [Manitoba Forage & Grassland Association](#)

A good way to add value to a cover crop is to have ruminants consume it. When we can put livestock into the system to utilize some of those cover crops, we've got a win-win situation.

For more information on grazing cover crops:

[Grazing Cover Crops](#)