



April 2020 Newsletter

Looking into the Future

4/16 7:30-9pm Soil Building Secrets

Ray Archuleta will explain how soil functions: how plants, animals, and organisms work together as a collective to transform and extract nutrients from the soil. David Kleinschmidt will explain how farmers and ranchers can use diverse crops, cover crops and animals to enhance that cycle. <https://understandingag.grazecart.com/webinars>

4/16 10:30-12pm Silvopasture: A Global and Historical Perspective SFA This webinar captures the history and use of silvopasture as a practice throughout the Midwest. You'll find a refresher on silvopasture as a practice and its concepts, highlights of research from silvopastoral systems in the region, and a tour of farms and farm systems that utilize the practice. [REGISTER.](#)

4/16 11am Cover Crop Characteristics and Identification NDSU Cover Crop Webinar Series <https://www.ag.ndsu.edu/news/newsreleases/2020/march-30-2020/ndsu-extension-to-host-grazing-cover-crops-webinar-series>.

4/21 10:30-12pm Silvopasture In Minnesota SFA This webinar is focused on producer experiences using silvopasture in their operations. From beef to goats and from Northern to Southern Minnesota you will tour a diversity of operations, climates, and landscapes. This webinar is an on-the-ground tour of working farms. [REGISTER.](#)

4/21 11am Winter Grazing & Alfalfa Production NDSU Cover Crop Webinar Series <https://www.ag.ndsu.edu/news/newsreleases/2020/march-30-2020/ndsu-extension-to-host-grazing-cover-crops-webinar-series>.

Find these events on our website
<https://mnsoilhealth.org/events/>

And Facebook
<https://www.facebook.com/mnsoilhealth/>

6/23-25 Regenerative Farming & Ranching Soil Health Academy

What You Will Learn: Principles of Soil Health & Adaptive Stewardship, Restoring Vibrant Ecosystems Through Adaptive Grazing, Making Grazing Highly Profitable & Desirable, Successful Marketing: Strategies for Enhanced Net Margins, Nutrient Management, Designing Cover Crop Mixes, Farm Economics and Whole Farm Planning

Stoney Creek Farm, Redwood Falls, MN

<https://soilhealthacademy.grazecart.com/sha-redwood-falls-mn-june>

9/10-11 Soil Health School

A two day training designed to provide an introduction and effective information on how to get started implementing soil health practices as well as a deeper look into management options and integrating regenerative practices. Classroom and field learning will be provided, hear from Minnesota farmers implementing soil health practices as well as technical experts from the state. Discussion sessions will be provided to hear and ask questions from farmers to learn about their successes and challenges as they've implemented soil health practices. Who Should Attend? Farmers, agronomists, technical staff, those interested in learning more. Registration coming soon

11/17-19 Keys to Marketing Success-How to Become a Price Maker and Not a Price Taker Soil Health Academy

Come to this school prepared to discuss your individual marketing and business plan. Instructors will be working with you on customizing marketing plans specific to your situation and operation. Holiday Inn & Suites, Lakeville, MN

<https://soilhealthacademy.grazecart.com/sha-marketing>

Nobel Conference on the "Living Soil: A Universe Underfoot" – one of my all-time favorites! Excellent presentations from experts from across the globe. Personal favs were [Dr. Montgomery](#), [Dr. Rattan Lal](#), and [Dr. Suzanne Simard](#) (if you watch any of them, watch Dr. Simard!) All presentations can be viewed here: <https://www.youtube.com/playlist?list=PLHuAoPzfQhGGKQhGpPo8hWwUwqk3rOzIN>

SD NRCS has posted a new video series on "Growing Resilience with Soil Health". View "A Year Like No Other" and "Overcoming Ruts and Erosion" as well as other topics [here](#). Don't forget to check out the latest soil health video installments from MN NRCS [here](#)!

Timing is Everything

Spring is here, hopefully the last snow of the season has fallen, and we're getting equipment ready. Looking at our fields tells us a lot about how we're going to move forward. If we have covers growing this spring and we're worried about growth, wanting to get it sprayed off right away, wait. We've learned the hard way that spraying when it's too cold wastes our time and money and just adds frustration. If you're planting soybeans into cereal rye, leave the rye, plant your beans when it's time, and then terminate the rye. This will reduce wrapping on your planter and create a nice seedbed while helping to control weeds, especially herbicide resistant varieties. You can spray or crimp after soybean have been planted but make sure you are crimping at the right stage to get an effective kill. It is recommended to crimp at the stage of anthesis, the reproductive stage. When it is shedding pollen you know you are good to go.

The growing cover crop also sucks up excess water and improves trafficability while warming up the soil 1-5 degrees higher than a bare, tilled field making it easier to get in the field faster and less rutting and compacting. The surface biomass protects the soils and the roots help provide the soil strength while it's forming soil aggregates, feeding the biology, taking in excess nitrogen, increasing infiltration, and adding organic matter.



IA State Extension

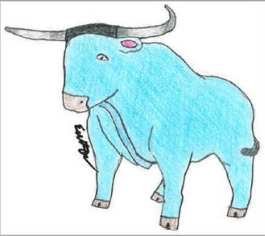


Some have tried tilling the stand of rye before planting, this ended up with root balls everywhere and the rye re-rooting, a huge mess that required multiple tillage passes to make a decent seedbed-tillage isn't an effective method to dealing with the covers.

Planting into cereal rye for the first time seems ridiculous with all of the biomass to get through, but it actually plants well, you don't need a no-till drill to do this. You'll want to make sure your closing wheels are doing their job, some will test this out before planting to see how it goes to give them time to make adjustments before planting.

The first month or so of growth on your soybeans will not always be pretty planting into cereal rye or heavy residue, that is fine, pretty isn't everything! They will bounce back and be a nice looking stand come summer and be nodulating heavily due to the nitrogen tie up from the covers making excellent beans.

Some farmers have been planting corn green, they are finding success when they front load their nitrogen to balance the nitrogen tie up from the covers. One potential issue with planting corn green into a grass/grain cover crop is the greenbridge-pests. Healthy soils have a variety of soil critters in high abundance to help battle pests and disease. Soils just coming into soil health practices may not have the populations built up to handle these species and have issues. Management to provide adequate sunlight to the corn can involve using skip rows when planting the covers, haying or grazing the covers prior to planting, strip tilling, planting a light rate, and terminating before it gets 12" tall.



Babe's Country

So you've got forestland, waiting to harvest timber, grazing under the canopy, or just enjoying the beauty and providing for wildlife. What about the non-timber forest products? Are there options that are sustainable and profitable? Absolutely! The Virginia NRCS developed a tool to calculate the potential income of non-timber forest products. It provides 10 and 25 year projections and a comparison of crop alternatives.

PLANT SELECTION

Select the types and number of plants to be grown. Product Price is a default value based on growers' experience. Initially, leave the prices on the default values.

Species	# Plants	Area Required (sq ft)	Product Price	Product Unit
Pussy Willow	25	1800	\$0.40	price/stem
Dogwood	25	1800	\$0.40	price/stem
Pawpaw	25	2700	\$1.50	price/lb
Elderberry	25	1200	\$1.00	price/lb
Hybrid Hazelnut	25	2250	\$3.00	price/lb
Persimmon	25	10000	\$2.75	price/lb
Totals	150	19750		

Choose your selection of products and get financial results

FINANCIAL RESULTS

Select interest rate. This calculator only considers basic variable costs and not fixed costs such as land price and taxes. Select the Additional Information button for more detail on the tool and disclaimers.

NTFP Project area (ac):	0.45	
Pick Interest Rate:	3%	< >
Financial Indicators	10 Yr Period	25 Yr Period
Present Value of Revenues	\$24,564	\$77,766
Present Value of Costs	\$19,352	\$57,689
Net Present Value	\$5,211	\$20,077
Internal Rate of Return	28%	32%
Years to Break Even	5	5
Annual Equivalent Value (AEV)	\$611	\$1,153
Alternative Comparison		
Crop Annual Equivalent Value	\$182	\$182
Forage Annual Equivalent Value	\$152	\$152

POTENTIAL INCOME COMPARISON

Potential income if area in proposed conservation planting is used instead for crop

Crop Alternative		Forage Alternative	
Crop Type:	Corn	Forage Type:	Alfalfa
Expected Yield (bu/ac)	150	Production (tons/ac)	3
Expected Price (\$/bu)	\$4.00	Forage Value (\$/ton)	\$150
Production Costs (\$/ac)	\$200	Production Costs (\$/ac)	\$115
Annual Net (ac):	\$400	Annual Net (ac):	\$335

See the potential income comparison of alternate crops to see which has the better payout. There are additional reports and information from this tool and is a user friendly excel spreadsheet!

Find it at <https://www.fs.usda.gov/nac/resources/tools/ntfp.shtml>

Buying Regenerative Grown Products from Minnesota

Buying local and supporting regeneratively grown products is always a priority but with recent events, it is more important than ever. Livestock producers are facing hurdles of not having adequate facilities to take their products forcing many to cull stock, dump milk, break eggs, and try to figure out where to put livestock that can't be processed. There are ways we can help, buying direct from the farmers not only eases this burden we're experiencing but also allows the consumer to know where their food is coming from. Knowing your farmer, how the products were produced, and knowing that you are contributing to the improvements to our natural resources provides you with an opportunity to make a positive difference and to feel good about doing it. Many farms selling direct to consumers have websites and/or Facebook pages, search for:

- MN Buy Direct from Farmer
- Sustainable Meat (or whatever product you're looking for) for Sale MN
- Grassfed Meat MN
- Organic Meat for Sale MN

Another great option is to view Regenerate Minnesota's map and listing for regeneratively grown ag products. Their definition of regenerative ag is:

“Regenerative Agriculture” describes farming and grazing practices that, among other benefits, reverse climate change by rebuilding soil organic matter and restoring degraded soil biodiversity – resulting in both carbon drawdown and improving the water cycle.



You can learn the location, products, and get in contact with the farm. More farms are constantly being added, it is a fantastic way to do your part and support our farmers and our resources!

<https://regeneratemn.org/maps/>

Contact

Jennifer Hahn
Coalition Coordinator
651-485-7848
coordinator@mnsoilhealth.org
<https://mnsoilhealth.org/>
FB @mnsoilhealth

Made possible by the Minnesota NRCS



Natural Resources Conservation Service



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