

## RAIL RESPONSE

The Bill C-49 debate continues to rage on » **PG 13**



## INOCULATION STRATEGY

One pulse specialist says failures are a regular occurrence » **PG 20**

# Manitoba Co-OPERATOR

SEPTEMBER 21, 2017

SERVING MANITOBA FARMERS SINCE 1925 | VOL. 75, NO. 38 | \$1.75

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## Succession planning at risk

Frustration over Ottawa's proposed changes to small-business taxation continues to mount

BY SHANNON VANRAES  
Co-operator staff

**F**armers are being urged to join the chorus of opposition facing the federal government's proposed tax changes.

Manitoba's minister of agriculture has already added his voice to the growing calls for Ottawa to reconsider the massive overhaul and Keystone Agricultural Producers is asking its members to participate in government consultations before the October 2 deadline.

"This is very concerning for us," said Minister Ralph Eichler, speaking to the *Manitoba Co-operator* last week. "We see this as a next step in succession planning, not a way to try and beat the government out of tax dollars. It's more of a way to ensure that the next generation of farmers will be able to take over and assume that farm."

The proposed changes will make it more difficult to share farm income with spouses and children, discourage farms from renting out land and make it harder for farmers to sell land to their own children.

"We should be putting rules in there that make it easier for

See **SMALL-BUSINESS** on page 6 »

## CP Rail closing 17 producer car loading sites across the West

KAP is considering joining APAS's call for a moratorium, at least until new rail legislation becomes law

BY ALLAN DAWSON  
Co-operator staff

**C**P Rail is pulling the plug on producer car loading sites throughout the Prairies, including two in Manitoba at Foxwarren and Strathclair.

That move has the Keystone Agricultural Producers considering joining a call for a moratorium on closing sidings used to load producer cars that was first proposed by the Agricultural Producers Association of Saskatchewan (APAS).

"In this age, when the world is so much smaller, taking out railway infrastructure, I can't see that as being a positive... I don't think it's a good move at all right now," KAP president Dan Mazier said in an interview Sept. 11.

However, KAP wants to look into the issue more before formally seeking a moratorium, Mazier added.

Canadian National Railway isn't closing any producer car sites right now, an official said in an email.

The sites CP Rail is removing aren't used and involve switches, which should they fail, can derail a train, CP Rail said in an emailed statement.

In addition to the two in Manitoba, CP Rail is closing nine sites in Saskatchewan and six in Alberta. (See the full list on page 6.)

The Agricultural Producers of Saskatchewan (APAS) issued a news release Aug. 28 advocating a moratorium and also wrote federal Transport Minister Marc Garneau asking for that.

The letter also requests legislative changes to ensure closure of urban and rural sid-



Loading a producer car at the Boundary Group Inc. facility at Darlingford, Man., on the short line owned and operated by the Boundary Trail Railway Company. CP Rail is closing 17 producer car loading sites across the West, including two in Manitoba — Foxwarren and Strathclair. PHOTO: ALLAN DAWSON

ings are subject to the same requirements.

"Producer car loading is an important source of competition and innovation in Saskatchewan's agriculture industry," APAS president Todd Lewis said in the release. "Shipping grain by rail is far more cost effective than hauling grain long distances by truck and results in a much smaller carbon footprint."

Lewis said once a loading site is listed for discontinuance, it is extremely difficult to get it relisted.

"Although demand for pro-

ducer cars has declined in recent years, our industry is very dynamic," Lewis said. "There is the potential that crop diversification and increased production could lead to more demand in the future. This demand will not be met if producers lose access to their local rail sidings."

Mazier agreed, adding proposed legislation under Bill C-49, the Transportation Modernization Act, to allow long haul interswitching could, increase interest in producer cars.

"If you (as a grain company) had no infrastructure... maybe

these sites all of a sudden become relevant again," he said. "That's why I think there should be an outright moratorium. Until we get this transportation bill figured out they should stop all what they are trying to do because once we lose the infrastructure it's gone."

CP Rail said safety is behind the closings.

"Removing a producer car site that is not being used is necessary to keep communities where we operate and our employees safe by removing a track switch,

See **CP RAIL** on page 6 »

**MIXED UP: TAILOR-MADE SEED MIXES BEST FOR POLLINATORS » PAGE 12**

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## DID YOU KNOW?

## Rapid detection of meat fraud

Spanish researchers say a new biosensor can give test results within an hour

## STAFF

In recent years meat fraud has been a growing problem.

Unscrupulous sellers have been caught adulterating beef with cheaper horse-meat and swapping chicken for turkey in sausages labelled 100 per cent turkey.

Now researchers from the Complutense University of Madrid say they've developed an electrochemical biosensor that can quickly detect a DNA fragment unique to the horse genome and absent in all other mammals.

"Thus, it is possible to identify selectively and without false positives any type of horsemeat, regardless of race," said F. Javier Gallego, a genetics researcher.

Until now, the tests and strategies to detect meat adulteration were based on immunological, spectro-



Processed meat products are particularly hard to test for adulteration.

PHOTO: THINKSTOCK

scopic or molecular biology techniques which were more expensive and took far longer to get results from.

They also weren't as precise, and were particularly troubled by an inability to detect adulteration both at low levels, and using closely related species, and were not reliable in processed meat products because such products are often heat treated in some way, which affects the ability of tests to detect the proteins.

The new technique can detect differences between

samples that are unadulterated and those containing horsemeat at levels as low as half of one per cent.

The multidisciplinary team found better results were obtainable from mitochondrial DNA fragments rather than nuclear DNA, because mitochondrial DNA is more protected and better resistant to possible heat treatments.

Members of the team say the next steps include moving beyond horsemeat and finding similar proteins in other animal species.

## READER'S PHOTO



PHOTO: GRACIE CRAYSTON

## Manitoba Co-OPERATOR

FOR MANITOBA FARMERS SINCE 1927

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[www.manitobacooperator.ca](http://www.manitobacooperator.ca)

Published by Glacier FarmMedia LP

Member, Canadian Circulation Audit Board,  
Member, Canadian Farm Press Association,  
Member, Canadian Agri-Marketing Association



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Publications Mail Agreement #40069240 ISSN 0025-2239

Canadian Postmaster: Return undeliverable Canadian addresses (covers only) to: Circulation Dept., 1666 Dublin Ave., Winnipeg, MB. R3H 0H1

We acknowledge the financial support of the Government of Canada.



# Organic processing sector study underway

When complete in 2018 it will be a first-ever in-depth analysis of Canada's key players, innovations and challenges

BY LORRAINE STEVENSON

Co-operator staff

The organic food-processing sector is on solid ground in Canada, according to a broad-based report showing most firms experiencing year-over-year growth in excess of 10 per cent.

But that growth continues to create its own set of challenges, most significantly an ongoing shortage of raw ingredient supply.

Sourcing ingredients remains this sector's key challenge, says Laura Telford, Manitoba's provincial organic specialist, who is doing an in-depth analysis of Canada's organic food-processing sector.

Prepared with funding from the federal Organic Science Cluster II, the report when completed next year will be a first-ever attempt to shine a spotlight on the Canadian organic food-processing industry specifically.

Virtually all organic research to date has been related to primary production, notes Telford who began the work in 2015.

Yet what ultimately drives production is market demand, and organic processors, like their conventional counterparts, want ingredients sourced as close to home as possible, she said.

That in turn provides the markets for existing and new farm entrants wanting alternatives to the export commodity market.

Telford said as she began this project what struck her initially were the considerable policy barriers and technical restraints facing organic processors, leading her to wonder if they were a hold-back on product development. There are fewer restrictions in the U.S.

But her research to date, which has identified 884 companies producing value-added products for human consumption, has revealed otherwise. The report also includes data from interviews with 38 leading firms across Canada.

Canada's organic standard, with its strict limitations on use of things like colourants or preservatives isn't the barrier it was believed to be, Telford said.

"We thought that it would be difficult to actually bring new processed foods to market in Canada because of rules and regs in organic," she said. "That doesn't seem to be the major barrier. In fact, almost everyone I interviewed said standards haven't



Laura Telford, provincial organic specialist in Manitoba is doing an in-depth study of the organic processing sector in Canada. PHOTO: LORRAINE STEVENSON

been that big of a deal. They said they just want to know what the rules are and they'll make it happen... they are innovative in finding new substances to stand in for things you'd traditionally use for food processing."

Rather, the ongoing challenge — and the signal this research ultimately aims to send to farmers — is finding steady Canadian supplies.

Canada has a relatively small land base of organically managed land — as of 2015 just 1.5 per cent of total agricultural land, according to the Canadian Organic Trade Association.

"It's the major challenge," she said, noting both large and small companies prefer to buy from producers as close to home as possible, she said. Transportation costs are an additional challenge, on top of the high prices they're paying for these supplies.

The report points to multiple initiatives underway to address that challenge, from investments by major breakfast cereal companies to boost acreage to companies making farmland purchases.

The Prairie Organic Grain Initiative, supported by large organic grain buyers and the federal government, is a large collaborative initiative developed by the three Prairie provinces to enhance supply.

"Processors are sending out signals that they're open for business and farmers are responding," said Telford, noting other efforts such

**"Processors are sending out signals that they're open for business and farmers are responding."**

LAURA TELFORD

as firms' hiring of agronomists to work with farmers on end-use quality.

"We're also seeing some gains in yields and we're also seeing the interventions are improving grain quality," she said.

"Organic producers are starting to understand that they're not growing a commodity but growing a food for a food processor."

The report also looks at how organic processors approach marketing.

Few actually rely on the organic stamp alone, Telford said, noting many packaged organic foods will regularly carry multiple claims such as Fair Trade.

Organic processed foods are primarily consumed in British Columbia and Ontario with packaged food sales concentrating primarily in Vancouver, Toronto, Montreal and Ottawa.

The final report is expected to be released in 2018 through the Canadian Organic Trade Association.

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# Open farm day garners crowds

The annual event is a chance to showcase the industry every fall

STAFF

More than 40 farms and agriculture-related organizations threw their doors open Sept. 17 to show the general public just what happens down on the farm.

Among the volunteer hosts were John and Ann Hunter, who farm near Rapid City. They had well over 200 visitors to their farm in just a few hours.

One of the participating organizations was the Manitoba Beef and Forage Initiatives farm near Brookdale.

Photographer Sandy Black visited both for the *Co-operator* and shared these images with us.



Rebecca Schueler of Minnedosa showcased spinning techniques, while John Lewis of Elkhorn demonstrated how to shear a sheep. PHOTOS: SANDY BLACK



Peter Schueler of Rapid City, along with his team Barney and Kenny, gave international exchange students from Brandon University a ride out to the cattle pasture.



Hailey Baron-Wright, followed by Benjamin Wright-Ricker, rushes out of a cattle squeeze at the Manitoba Beef and Forage Initiatives farm, as research co-ordinator Kristelle Harper operates the gate.



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# OPINION/EDITORIAL

## Opening up



Gord Gilmour  
Editor

The non-farming public, especially in Western Canada, continues to be interested in agriculture and rural life.

Evidence of that can be seen in a pair of features in this issue of the *Co-operator*.

In the Country Crossroads section, our Lorraine Stevenson writes about the Argyle fall supper, celebrating its 135th anniversary this year.

Every fall, hundreds gather for the community fundraising event that celebrates the bounty of another Manitoba growing season, garnering attendees from far and wide, including a healthy number of folks from the big city just down the road.

And on Page 3 you can find freelance photographer Sandy Black's contribution, documenting the annual Open Farm Day that invites non-farmers to learn more about an industry that helped shape this province and continues to play an important economic and cultural role in its future.

The common theme of both events is the general public's appetite to attend and support these activities directly, and agriculture itself more indirectly.

One of the big drawing cards is a healthy dose of nostalgia. While few have a direct connection to primary agriculture in this day and age, many have a more distant link to it in the form of parents, grandparents and extended family, sometimes stretching back generations. Even as these links have grown more distant, many remain supportive.

That is both good and bad. As this column has reflected in the past, support built on nostalgia can be a double-edged sword. While it's great they're even thinking of farming in the city, often the picture is an outdated one.

Red barns and picturesque pastures are still part of the scene, of course, but they're not truly representative anymore, as we all know. Most farms are more business-like, which is a fine thing, but just a little less warm and cuddly.

That's not to say they don't have a great story to share, and certainly there are lots of efforts to tell that story. A few jump to mind for me that really put the challenges and triumphs of the industry into perspective.

For example, the large grain farms that a certain element of the public like to vilify are in fact a triumph of modern productivity and, increasingly, of sustainability. They feed more people with a smaller land base than even our own parents would have dreamed possible, never mind our grandparents.

And while nobody would ever confuse the crops that are grown on the Prairies with the native grassland habitat they replaced, it's still important to note the strides that have been made on the sustainability front.

Progress in conservation practices is often overlooked, and should be recognized. Also important, however, is acknowledging there is much work to be done — and farmers won't be able to do it without the public's support through research, extension and compensation if productivity suffers. That's yet another reason telling the story of the industry is so important.

The rise of agriculture, and in particular grain agriculture, is really the story of complex human civilization. Without the ability to grow, harvest and store these dense and transportable foodstuffs, none of the other trappings of human civilization would be possible. It was the creation of food surpluses that allowed some to turn their minds to new challenges and build on this foundation.

But growing annual crops is hard on soil, and eventually depletion of the soil's organic matter lay at the end of the path, no matter what management techniques were used.

Under the various new tillage regimes, that process has slowed, which creates an opportunity for renewal to begin.

The problem, of course, is that's a more complex story to tell. But it's a worthy story and one 'advocates' have in recent years begun to make more widely known.

Another important element to telling the story of modern agriculture is the way the industry seems poised to go even further in the very near future, becoming ever more efficient and sustainable.

The explosion of high-tech equipment promised better placement of inputs and less nutrient run-off. Big datasets may give even more valuable insight into agriculture and how it can be even more of a success story.

A new focus on systemic agriculture, in particularly gaining new prominence at the University of Manitoba, promises to continue to build on the legacy of zero till and the way it leverages natural processes.

This is an important and historic industry with a proud past and a bright future. We should all embrace that fact and do what we can to share this story.



## Demanding more

BY ALAN GUEBERT

Farm & Food

President Trump has been in the news lately for his post-hurricane trips to Texas.

But after his Texas visits, the president moved from visiting one natural disaster to drumming up his own unnatural disaster.

Frustrated that America's NAFTA partners actually want to negotiate, not rubber-stamp his proposed changes to the generation-old trade deal, Trump took to Twitter to chastise our partners and undermine our negotiators.

"We are in the NAFTA (worst trade deal ever made) renegotiation process with Mexico and Canada. Both being very difficult, may have to terminate?" wrote the Twitterer-in-Chief.

American farm leaders, who watch this Trump trade melodrama almost weekly, rolled their eyes, bit their lips, and said little. Soon, however, the president let his fingers do even more trade trash talking.

First, he Twitter-whipped one of America's biggest, richest ag importers, South Korea. Next he threatened to break with any U.S. trading partner that had anything to do with North Korea, arguably the world's most pressing nuclear threat.

The presidential huffing and puffing finally became too much for some American ag leaders who were witnessing decades of righteous trade preaching shredded by tweets from a seething heretic.

On Sunday, Sept. 3, the American Soybean Association (ASA) publicly acted. In a toughly worded "stern warning," it cautioned the president that his threatened withdrawal from the South Korea-U.S. trade deal and his "larger strategy of brinkmanship with regard to trade agreements... could have disastrous consequences."

This call-out of our tweet-before-thinking pres-

ident could be a turning point for ag leaders. As such, now is a good time for them to stop lining up to have their pictures taken with Secretary of Agriculture Sonny Perdue and, instead, start lining up to take control of a rural-focused new Farm Bill.

The clear need for an improved rural America should, after all, come before the foggy, unfocused needs of a ranting, stop-and-go White House.

Or so one hopes.

But hope can be fleeting. On Tuesday, Sept. 5, the White House, through Attorney General Jeff Sessions, started a six-month clock for Congress to act on DACA, the controversial Deferred Action for Childhood Arrivals, an executive order from the Obama administration.

On its own, DACA is an easy call for a majority of the Congress. Most voters and representatives agree that allowing the children of undocumented immigrants to stay in the United States is an example of what this nation does best; it fulfills American dreams.

But, says the Build That Wall wing of the Republican party, DACA is just a back door to broader immigration reform candidate Trump swore to fight.

American farmers and ranchers could play a crucial role in deciding DACA, because at least one-half of all U.S. agricultural workers today are undocumented. Loudly and publicly demanding broader immigration reform would send the White House the clear message that it needs to fix today's most persistent farm and ranch problems, not create new ones.

It might also move Congress to do the same; fix what's broken in the nation's cities and fields, rather than silently wait to see what the White House will break next.

*The Farm and Food File is published weekly through the U.S. and Canada [www.farmandfoodfile.com](http://www.farmandfoodfile.com).*

## OUR HISTORY: September 1969

Pool hybrid pigs advertised in our Sept. 25, 1969 issue were said to yield well and bring good returns, with one customer reporting a sale of 100 animals with an average return of \$60.22 and a total of \$126 in premiums.

Our main front-page story was on a Food and Agricultural Organization report which suggested Canada's wheat problem was only just beginning. It said developing countries would become more self-sufficient in production rather than buying from Canada, and that some could even become export competitors. Canadian wheat carry-over was forecast to reach 23 million tonnes in 1969-70. That was more than a full year's average production at the time, and it compares with only 5.2 million tonnes of carry-over this year.

We reported on "the greatest cattle sale ever held in Eastern Canada," which was the complete dispersal of hockey star Bobby Hull's Hullvle Polled Hereford Cattle Farm in Picton, Ont. A record crowd of more than 2,000 attended the sale of 240 animals for a total of more than \$135,000. The top bull went for \$3,325.

The new NDP government had announced an income tax increase to collect funds to offset its reduction in Medicare premiums, which were still being paid by individual Manitobans. This brought Manitoba income taxes to the highest level in Canada, but the government said a married man with two children earning \$11,348 would pay less in total for medical care under the new scheme.



## COMMENT/FEEDBACK

# Weeding out what is missing

Ontario's approach to marijuana distribution is full of unknowns and ambiguity

BY SYLVAIN CHARLEBOIS

Dalhousie University

**O**ntario has become the first province to define how it intends to sell non-medicinal marijuana to the public. Around 150 stores across the province will open and will be operated by a division of the province's liquor board, the LCBO.

Marijuana won't be sold alongside wine or liquor, but in separate, independent stores, as was recommended by a parliamentary committee earlier this year. While Ontario deserves some credit for forging ahead with guidelines for its legal marijuana distribution system, the province's statement was really filled with ambiguities and unknowns.

Private sector marijuana retailing seems to be off the table, which in turn will allow a government-run Crown corporation to distribute and sell this commodity to the public. Not surprising, given what has happened to the sales of alcohol over the last few decades in the province. Like beer and wines now, marijuana will eventually be available through privately owned retailers; however, little about cannabis is straightforward in our modern society.

Social stigmas related to cannabis use remain, so Ontario felt the public was not ready for private distribution. After all, cannabis has been illegal in Canada since 1923, so we need to give ourselves a chance to get used to the notion of living in a society where it is a legal part of everyday life.

Ontario has set the legal age limit at 19 for purchasing marijuana, but

**"No consideration has been given to the issue of edible cannabis products, other than saying that they will not be allowed. And that is a problem."**

few specifics were given on pricing or costs. Most important, no consideration has been given to edible cannabis products, or how these products would be marketed. Nor have guidelines for home cultivation and use been contextualized, especially for households with children. Cooking at home with marijuana, for example, can be tricky. What's more, the food-service industry and restaurants were not even mentioned in the announcement.

Cannabis is the most widely used illicit drug in the developed world. Its use has, for the longest time, been associated with negative social and economic outcomes. By legalizing marijuana for recreational use, many wonder how it could affect food in general, and it will, despite Ontario's wishes. The province will not allow edibles, for now. But the black market remains and may impact everything else the province is trying to achieve in mitigating risks for the public.

Since Ottawa's announcement, several food companies, processors, and distributors are considering the possibility of commercializing cannabis-infused products. In some U.S. states where marijuana is already legal, consumers can purchase a variety of marijuana-infused food products from fudge, cookies, and brownies, to hard

candies, gelato, and even gummy bears. Yes, candy.

Some food products, like marijuana brownies, have long been a staple of cannabis coffee shops in some parts of the world, but the new products are quite different and may be deceiving. They are skilfully produced and packaged to closely mimic popular candies and other sweets. Making cannabis more readily available to children, especially in edible forms, represents significant risks.

Research shows marijuana use can be damaging to children and their developing brains, and of course, to fetuses through use by expectant women. No policy framework related to edibles, or by pretending the problem does not exist, will lead to more challenges down the road.

Ontario was completely tight lipped on many facets of a highly complex marijuana puzzle. The stigma of marijuana use clearly got the better of the Ontario government. Looking at retailing the product is one thing. But it is worthwhile considering its various applications beyond the exchange between the seller and the customer. Instead, Ontario has adopted an excessively prudent, incremental deployment strategy to the marketing of marijuana across

the province. Again, this is unsurprisingly short sighted.

With the legalization of recreational marijuana, Canada is following in the footsteps of a few states in the U.S., and edible marijuana products have been tremendously popular in these markets. Edibles with marijuana raise public health concerns, including, as mentioned above, the risk of consumption by children. Making them illegal won't solve anything since they will reach the market, one way or another. The food-service industry is also considering its options with the looming legalization of marijuana. Some guidance by provinces would serve the public well, particularly at a time where many wonder how marijuana, as a legal food ingredient, could potentially impact our society.

While governments may see the legalization of recreational marijuana as an interesting new source of substantial revenue, risks associated with the prevalence of marijuana use as a food ingredient have not been clearly articulated. Even with the few stores Ontario will operate, the amount of revenue will likely motivate the province to reconsider its options in this field. No doubt, more stores will open. But as the province grows its addiction to marijuana tax revenues, it should also consider how it will develop guidelines for edibles, and for marijuana as a food ingredient for domestic use. Or else, the underground market will occupy that space and that is not a desirable outcome.

*Sylvain Charlebois is dean of the faculty of management and a professor in food distribution and policy at Dalhousie University.*

## Farmers' focus must shift from yields to soil health

But looking after the land doesn't have to result in a 'yield penalty'

BY LAURA RANCE

Glacier FarmMedia editorial director

**A** funny thing happens whenever talk turns to how to make farming more sustainable.

As various options for improving how agriculture treats the natural environment are discussed, someone inevitably brings up the "yield penalty" farmers and society would pay.

That penalty is seen as the gap between conventional methods using tillage and high rates of inputs and alternative systems where farmers eschew either tillage or artificial inputs — or both.

Researchers do it. Politicians do it. Farmers do it. Even newspaper columnists have been guilty of it.

The problem with such comparisons however, is that they assume that the conventional approaches can be maintained over the long term — when the emerging evidence is that they cannot.

Dan Pennock, a Saskatchewan soil scientist

who contributed to a 2015 FAO report on the state of world soils, told the recent Soil Conservation Council of Canada (SCCC) conference in Guelph the amount of soil lost to erosion equates losing a soccer field every five seconds.

"The majority of the world's soil resources are in only fair, poor or very poor condition and that condition is getting worse in far more cases than they are improving," the FAO report said. One-third of the world's farmable land is moderately to highly degraded.

True, world markets are currently flooded with grain and global yields have on average continued to rise. However, many scientists believe improved genetics and the increasing intensity of farming practices are masking the effects of effectively mining the world's soil.

So, it is hardly a fair comparison if the status quo is not an option.

Don Lobb, an Ontario farmer and agronomist who participated in research on his farm for decades, said such

**The problem with such comparisons however, is that they assume that the conventional approaches can be maintained over the long term.**

comparisons are counterproductive for another reason.

Farming systems that work with natural systems are so complex they can't be studied in conventional ways or easily compared.

"Classical research can only compare one thing at a time," he said.

The interactions between soil biology, the farmer's crop rotation, local drainage and, of course, the weather, are unique to each farm and not easily measured using linear benchmarks. "Every time you make one change it affects everything else," he said.

For example, farmers who have practised zero tillage for a number of years have found they can use lower rates of phosphorus because high mycorrhizal activity increases how efficiently plants can access it.

There are undoubtedly other factors in play that scientists are only just beginning to measure.

Lori Phillips, a soil biologist with Agriculture and Agri-Food Canada told the SCCC summit that while it's now known that a single teaspoon of soil contains billions of micro-organisms, most of them can't be cultured for study under traditional research methods.

However, biotechnology tools that allow scientists to extract and analyze the DNA of the entire soil microbiome are generating unprecedented insights into soil life.

"It's led to a soil microbial gold rush," she said. "We need this information and we didn't have it before."

"We can't manage what we can't measure," Phillips said. The next phase of research

will be to better understand what role these micro-organisms play in the soil and how well they function under different management practices.

"I liken it to a teenager who can vacuum. The teenager might be there and might be genetically capable of vacuuming, but is he actually pushing a vacuum?" she said.

Lobb says farmers need researchers to help them understand how things work, but putting that knowledge to work on the farm is more about art than science.

Lobb believes the benchmark for measuring success in farming must move from yield to soil health. But he stresses the two aren't mutually exclusive.

On his farm, adopting farming practices that focused on soil care didn't result in a yield penalty. On the contrary, the productivity of his land improved over time to where his yields averaged five per cent over.

*Laura Rance is editorial director for Glacier FarmMedia.*  
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# FROM PAGE ONE



**“Removing a producer car site that is not being used is necessary to keep communities where we operate and our employees safe by removing a track switch, which can increase the risk of an incident.”**

CP RAIL

**CP RAIL** Continued from page 1

which can increase the risk of an incident,” CP Rail said.

Most of the sites being removed haven’t been used in years, CP Rail said. Some are inaccessible as CP Rail does not own the adjacent land, or the infrastructure itself is not owned by CP Rail.

“There are alternative locations available within a 20-km distance from the sites being removed,” CP Rail said.

The railways are reimbursed to maintain producer car loading sites, by the freight charges for shipping grain, Lewis and Mazier said. It’s part of the maximum revenue entitlement formula that annually sets the maximum amount the railways can collect shipping grain.

“They (railways) will shut them down because they are in poor maintenance,” Mazier said. “Well, we’ve been paying for that (maintenance).”

The railways are obliged to give 60 days public notice before discontinuing a producer car loading site, but KAP hasn’t found such notices, Mazier said.

“That’s a bit concerning that they can willy-nilly decide to shut down a site because they decide it’s not paying for them,” he said. “It seems backwards to me. They are supposed to be providing the service to all of Canada. That was part of the deal when they got the rail line. I think we need to re-evaluate what is the value of a producer car loading site.”

Western Canadian grain farmers have had the legal right to order and fill a rail car with their own grain and ship it to market for more than 100 years. Early in the last century grain com-

panies that built faster loading elevators, instead of so-called flat warehouses, received preferential access to cars. Farmers complained and the federal government amended the Manitoba Grain Act in 1902 making it law that cars be allocated on a first-come, first-served basis. When CP Rail ignored the law farmers took it to court and won, giving them access to cars and the ability to bypass elevator companies, or sell to those without elevators nearby.

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## SET FOR CLOSURE

CP Rail has announced it’s closing the following producer car loading sites:

**Foxwarren, Man.**

**Strathclair, Man.**

**Tompkins, Sask.**

**Midale, Sask.**

**Cupar, Sask.**

**Markinch, Sask.**

**Grand Coulee, Sask.**

**Wilcox, Sask.**

**Moosomin, Sask.**

**Tisdale, Sask.**

**Qu’Appelle, Sask.**

**Sedgwick, Alta.**

**Daysland, Alta.**

**Nobleford, Alta.**

**Red Deer, Alta.**

**Wetaskiwin, Alta.**

**Ponoka, Alta.**

## SMALL-BUSINESS

Continued from page 1

succession not more difficult,” said Keystone president Dan Mazier. “The average age of a farmer is 55 or 56 years old in Canada and in the next decade there is going to be billions of dollars’ worth of land and assets being transferred in some way, shape or form. So I think we need to get on and look at capital and tax structures and have that conversation, that’s a very healthy conversation, but that is not what this proposal is.”

He added it’s frustrating to hear farmers be lumped into a category with tax cheats or the ultra-wealthy, rather than recognized as small-business owners using the tools available to them. Income sprinkling is no more a tax loophole than an education rebate, Mazier said, adding the tax code should be set up to help businesses overcome the challenges faced by their respective industry.

“They are calling this a loophole; that’s not right, we all live within the taxation system and run our businesses within it and have tools available,” he said. “There is a whole system set up, not for loopholes, but to incentivize farmers to spend more money, or invest back into your business... that’s how businesses are built.”

Eichler noted that as small-business owners, producers don’t have a lot of safety nets.

“As you know we don’t have maternity leave for farmwives, we don’t have unemployment (insurance) we can rely on, this is a business all of its own, a unique business, but one that feeds the world, so we can’t put them at risk and we’re very concerned about that particular proposal that’s being brought forward by the federal government,” said the minister.

Producers have also been critical of how the changes were introduced and when consultations are taking place. With the 75-day-long consultation period falling during farmers’ busiest time of year, Mazier said it has been challenging for producers to get out and have their voices heard.

“Getting clarification has been really difficult as well...



Farmers busy with harvest are now simultaneously having to contemplate major changes to how they can use incorporation to manage their businesses.

PHOTO: THINKSTOCK

just trying to get to the bottom of what these proposed changes would mean has been really difficult,” he added.

In its analysis, the Canadian Federation of Agriculture has said that “if these changes are implemented as proposed, farmers will face higher costs with fewer options to manage business risks, and the complexity of the proposals could lead to other unintended consequences” and that the “added uncertainty could discourage business investments right at a time when farmers are making plans to position their operations toward meeting the ambitious targets outlined in the 2017 Federal Budget, which identified agriculture as a key growth sector.”

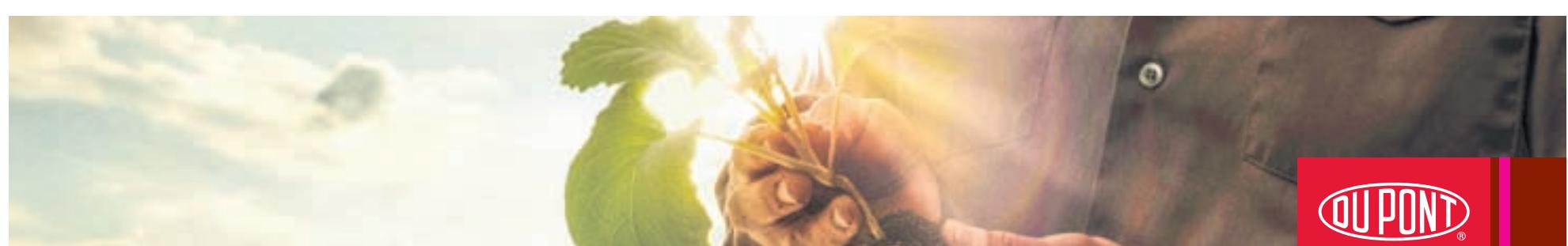
Dozens of business organizations have raised concerns over the proposed changes, which would be the largest tax code revision since the 1970s, and the 42-member Coalition for Small Business

Tax Fairness is pressuring the federal government to change course.

Eichler said that if those who drafted the proposal had a deeper understanding of agriculture and farm businesses, a better plan could have been brought forward.

“We need to have a clear understanding about the risks that are involved in running a family farm and whether they are incorporated or non-incorporated is really not important for the discussion — in my mind it’s about making sure they are sustainable long term in order to make sure that their family can come back to the family farm if they want,” he said. “They are proud of the fact the next generation may be able to take it over, but if this impact comes forward, it may limit the ability of the next generation to assume the family farm.”

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## NEWS

**Agco to ramp up Regina parts distribution**

STAFF / Prairie farmers using Massey, Challenger, Valtra and Fendt equipment can expect more types of parts to be in stock more often at their parent company's Regina warehouse.

U.S. farm equipment firm Agco's parts arm has announced a major expansion of its distribution centre in Regina, to be completed by early next year, adding 25,000 square feet to its current footprint of 51,000.

A dollar value on the expansion wasn't given, but the company, which held a groundbreaking at the site Aug. 24, said it will be "the largest Agco Parts investment in North America."

The Regina centre's addition is expected to provide 50 per cent more storage, 30 per cent more inventory, and an increase in "facing fill" to over 90 per cent, Agco said.

In supply chain management, "facing fill" is the term for the percentage of orders filled directly from the on-site inventory at a warehouse or distribution centre to which a dealer or customer is assigned.

A 90-plus per cent facing fill would be the highest of any regional Agco Parts distribution centre in North America, the company said.

"With more parts housed in Regina, we are able to get the right parts in the hands of the customer faster than ever before," Joe DiPietro, vice-president for Agco Parts' American division, said in a release.

"We understand that uptime is critical and that customers need to get parts as soon as possible."

Through this expansion, Agco said, it "improves its service level to Western Canada and reduces transit times on large and heavy parts."

Agco's Regina facility was upgraded and expanded to a full-stocking, full-service parts distribution centre (PDC) for the region in 2010.

The Regina site supplies the four western provinces and supports emergency orders from the U.S. with daily shipments into Minot, N.D.

**CFIA turns 20 with no fanfare**

Founding executive says he's surprised there wasn't at least some notice of the milestone

BY ALEX BINKLEY

Co-operator contributor

In this year of celebrating Canadian anniversaries, one has passed by with almost no notice.

Well at least until Ron Doering pointed out that the Canadian Food Inspection Agency, which he helped create, passed its 20th anniversary in April. Doering led the team of federal officials who drafted the plan in 1995 to extract food safety duties out of various federal government departments and agencies and place them into a new body.

"The CFIA has met most of our original expectations," Doering said. "While there have been bumps along the road, Canadians should be proud of the CFIA's many achievements. Its anniversary should be celebrated."

Doering said the 15th anniversary rated a press release; the 20th got zero recognition.

**"With an annual budget of over \$700 million and over 6,000 staff the CFIA is, by far, Canada's largest science-based regulatory agency."**

RON DOERING  
former CFIA head

I was surprised there was no press release pointing out the milestone.

"With an annual budget of over \$700 million and over 6,000 staff the CFIA is, by far, Canada's largest science-based regulatory agency, respected within the federal system, by the provinces and admired around the world as a model."

Doering, who served as president of the agency for several years before retiring, said there were five broad objectives for the CFIA. It has certainly met three of them and the other two could be advanced in the next couple of years.

It has improved the effectiveness and efficiency of federal food inspection, brought in integrated governance of food safety and plant and animal health, and enhanced international market access.

The two objectives still needing completion are improving federal and provincial food safety regulatory harmonization and modernizing food law in Canada.

Provinces still set their own standards rather than utilizing national ones for food processors operating solely within the province, he said. The Canadian Free Trade Agreement could finally push provincial govern-

ments into adopting national standards.

Meanwhile the integration of federal acts and regulations proposed under the Safe Food for Canadians Act, passed in 2013, is still under discussion with the food industry. Completion of that process could move food law ahead.

Contrary to Doering's praise, agri-food industry officials often bemoan the current state of the CFIA, largely run by executives with little knowledge of the agri-food industry, who treat their time at CFIA as a training ground for other postings in government. The consultation sessions on the Safe Food Act were more about being talked at by CFIA officials rather than asked for their views, executives complained.

Food safety inspections of processing facilities should be a joint company-CFIA exercise in making sure safety procedures are up to date and fully implemented rather than a search for a violation that be cited, they said.

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# Soils are not made equally when it comes to soaking up moisture

Mitchell Timmerman's rainfall simulation emphasized the role of perennial forages in increasing infiltration during the August 30 Manitoba Beef and Forage Initiatives Brookdale site tour

BY ALEXIS STOCKFORD  
Co-operator staff

**W**hich one will soak it up first? That was the question a recent demonstration at the Manitoba Beef and Forage Initiatives (MBFI) Brookdale site tried to answer. It was a head-to-head comparison of the ability of fields to soak up surface moisture by Mitchell Timmerman, the province's agri-ecosystems specialist, using a rainfall simulator that made the comparison before the eyes of attendees.

The simulation mimics a major weather event, with water flows upwards of six to 10 inches per hour. Run-off was collected for each sample and compared to the volume of water that soaked through to the bottom of the simulator, indicating moisture that would have seeped into the earth in the field.

Hydraulics controlled each sample's slope, allowing presenters to mimic a field's landscape or highlight the effect to topography during educational events like the MBFI field tour.

"What I'm illustrating here is how landscape and soil type and annual versus perennial (crops) can influence how much water management farmers can achieve, as well as (how) the activity of the animals on the surface can come into play," Timmerman said. "It's about integrating those factors together to come up with a site-specific strategy for a farmer to get the most out of the water resources that are available, whether they're too plentiful or in short supply, and building adaptability or a better buffer into the system."

Samples for the test were largely drawn from the same land that was on tour.

Clay loam was taken from MBFI Brookdale's annual forage stand, mob grazing experiment and continuous grazing pasture. Those samples were compared to clay loam lying fallow near Roblin, as well as the sandier soils and perennial grassland of MBFI's First Street pasture.

The First Street pasture sample soaked up more water, something Timmerman said was no surprise given its coarser texture. Between clay loam samples, both mob and continuously grazed fields pulled ahead of annual forage in the simulation, although Timmerman noted that the annual forage sam-



Mitchell Timmerman, agri-ecosystems specialist with Manitoba Agriculture, highlights root difference between crops during the Manitoba Beef and Forage Initiatives Brookdale tour August 30. PHOTOS: ALEXIS STOCKFORD



Run-off, collected in the top row of jars, is compared to the volume of water seeped through the earth after soil from five fields was exposed to the equivalent of a major rainfall event.

ple, grown on the former zero-till research farm that now houses MBFI, still soaked up the majority of water it was exposed to.

The summerfallow sample was the only one where run-off volumes outweighed infiltration.

"Considering how this growing season's gone compared to last year, farmers are interested both in now too much moisture and not enough," Timmerman said. "The beauty of perennial crops is that they offer advantages of both improving soil to drain away excess water but also to tap into water resources when water supplies are down."

In many ways, Timmerman said, perennial crops can be seen as a natural version of tile drainage.

Under tile drainage, piping is buried in a grid to draw excess moisture deeper and drain it out of the field while gates may control flows and water table levels, something advocates have argued can protect against drought.

Organizations such as the Manitoba Forage and Grassland Association argue that perennial root systems help break up compaction, allowing for more infiltration, while deeper roots can access deeper subsoil moisture during dry periods.

Research presented by Manitoba Agriculture has found much deeper roots in perennial crops. In mapping root traits between annual crops and perennial forages, the province noted that

**"... the beauty of perennial crops is that they offer advantages of both improving soil to drain away excess water but also to tap into water resources when water supplies are down."**

MITCHELL TIMMERMAN

alfalfa roots could reach up to 20 feet deep, compared to four feet in spring wheat or corn.

A 2011 study by Alberta Agriculture found that alfalfa used between 540-680 millimetres of water over three cuts in comparison to wheat's 420-480 millimetres. Corn used 580-650 millimetres of water, although both corn and wheat peaked water usage in mid- to late summer, while alfalfa peaked prior to each of the three cuts.

Alfalfa rated 22-24 inches of water uptake over a season, compared to 12-16 inches in wheat and 20-24 inches for corn, according to data presented by Timmerman.

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## WHAT'S UP

Please forward your agricultural events to [daveb@fbcpublishing.com](mailto:daveb@fbcpublishing.com) or call 204-944-5762.

**Sept. 22-24:** Scarecrow Days, Souris. Visit [www.sourismanitoba.com](http://www.sourismanitoba.com).

**Sept. 23:** 25th annual Teulon Pumpkinfest, Teulon Rockwood Centennial Centre, 14 Main St., Teulon. Call 204-467-9064 or visit [teulonpumpkinfest.com](http://teulonpumpkinfest.com).

**Sept. 23-24:** Manitoba Plowing Association's Plowing Days, two miles north and half a mile west of junction of Hwys. 1 and 5 near Carberry. For more info call 204-834-2659 (evenings).

**Sept. 25-28:** Agricultural Bioscience International Conference (ABIC 2017), RBC Convention Centre, 375 York Ave., Winnipeg. For more info or to register visit [www.abic.ca/abic2017](http://www.abic.ca/abic2017).

**Oct. 7:** Roland Pumpkin Fair. Visit [rolandpumpkinfair.pbworks.com](http://rolandpumpkinfair.pbworks.com).

**Oct. 14:** Manitoba Rural Women's Day: A Healthy Mind is a Treasure to Find, 9 a.m. to 4 p.m., Minnedosa Community Conference Centre, 63 Main St. N., Minnedosa. For more info visit [www.mbw.ca/manitoba-rural-womens-day-2017](http://www.mbw.ca/manitoba-rural-womens-day-2017).

**Oct. 18-19:** Wolf and Carnivore Conference, Riverlodge Place, Thompson. For more info visit [www.thompsonspiritway.ca/conference/](http://www.thompsonspiritway.ca/conference/).

**Oct. 25-28:** Manitoba Ag Ex, Keystone Centre, Brandon. Call 204-726-3590 or visit [manitobaagex.com](http://manitobaagex.com).

**Oct. 28:** Manitoba Rural Women's Day: A Healthy Mind is a Treasure to Find, 9 a.m. to 4 p.m., Community Hall, 76 Second Ave., Komarno. For more info visit [www.mbw.ca/manitoba-rural-womens-day-2017](http://www.mbw.ca/manitoba-rural-womens-day-2017).

**Nov. 1-2:** National Environmental Farm Plan (EFP) Summit, Westin Ottawa, 11 Colonel By Dr., Ottawa. For more info visit [nationalefp.ca/nefp-summit/about-the-nefp-summit/](http://nationalefp.ca/nefp-summit/about-the-nefp-summit/).

**Nov. 2:** Keystone Agricultural Producers fall advisory council meeting, 9:30 a.m., William Glesby Centre, 11 Second St. NE, Portage la Prairie. For more info call 204-697-1140.

**Nov. 8:** Manitoba Pork Council fall producer meeting, venue and time t.b.a., Steinbach. For more info visit [manitobapork.com](http://manitobapork.com) or call 204-237-7447.

**Nov. 9:** Manitoba Pork Council fall producer meeting, venue and time t.b.a., Portage la Prairie. For more info visit [manitobapork.com](http://manitobapork.com) or call 204-237-7447.

**Nov. 14-15:** Grain World conference, RBC Convention Centre, 375 York Ave., Winnipeg. For more info call 204-805-1284.

**Nov. 19-21:** Manitoba Farm Women's Conference, Victoria Inn, 3550 Victoria Ave., Brandon. For more info visit [www.manitobafarmwomensconference.ca](http://www.manitobafarmwomensconference.ca).

**Nov. 29-30:** Western Canada Cleantech Innovation Forum, RBC Convention Centre, 375 York Ave., Winnipeg. For more info visit [meia.mb.ca/event/127](http://meia.mb.ca/event/127) or call 204-783-7090.

**Dec. 5-7:** Western Canada Conference on Soil Health/Western Canadian Grazing Conference, Radisson Hotel Edmonton South, 4440 Gateway Blvd., Edmonton. For more info call 780-836-3354.

**Dec. 14:** Hog Days, 10 a.m. to 4:30 p.m., Manitoba Room and UCT Pavilion, Keystone Centre, 1175-18th St., Brandon. For more info visit [www.hogdaysbrandon.ca](http://www.hogdaysbrandon.ca).

# Watering cattle with solar power

Producers give solar-powered watering systems top marks despite their ups and downs

BY ALEXIS STOCKFORD

Co-operator staff

**I**t's been five years since Doug Northam traded in his sloughs for solar, and the Rapid City producer gives his remote watering system glowing reviews.

"Around here we don't have any wells or anything, so the cows just drink out of the sloughs and when they dry back a bit they tend to be three feet of mud for 20 or 30 feet before you get to water," he said. "In fact, we did lose one (animal) actually one time — it gets bogged down and can't get out."

Looking for solutions, Northam eventually turned to the Little Saskatchewan River Conservation District and its solar-powered remote waterer, on offer for farmers to demo. Northam was impressed with the results. The piping bypassed the muck that animals would have ordinarily had to wade through, instead bringing water within easy reach of the herd.

The difference was large enough that Northam started designing his own system soon after the demo ended.

Today, Northam's mobile system services 60 cow-calf pairs and between 55-60 yearlings at a time and is the hub of his mob grazing system. Paddocks are spread in a pie shape around the trough with the single drinking site accessible to all paddocks. The herd will rotate through the whole "pie" before the system must be moved.

"We've been rotational grazing for quite a while, but we started with this adaptive, high-density grazing," Northam said, referencing a grazing style with a large number of animals grazing a small area before moving quickly to a new area, allowing the land to recover. "We try and set the water up so that we can just fan out and we move the cows every day, but we hopefully only move the water about once a week."

That timeline might change, depending on the frequency of herd movements, he added. The herd is normally moved once a day, but Northam says he switched the schedule to twice-daily moves during some periods



Duane Kent of Beiseker, Alta., is 500 kilometres from both his herd near Biggar, Sask., and his solar-powered remote watering system. The producer has integrated cameras and internet controls to make up for the distance. PHOTO: DUANE KENT

this season. Most recently, the producer went through eight paddocks in a week.

"We've just sort of placed (the waterer) strategically," he said. "You sacrifice a small area around where they come back to all the time, but it's very slick to move. One person could probably pick it up and be out of there in 20 minutes to half an hour."

#### Reliable?

Northam has been overwhelmingly happy with his system, despite some experts, including Manitoba Agriculture livestock specialist Ray Bittner, identifying reliability issues with solar-powered waterers.

Duane Kent, who lives northeast of Calgary, agreed that reliability was a concern, but the Alberta producer has little option but to go solar.

Kent is over 500 kilometres away from his pasture near Biggar, Sask., a four-quarter area with no natural surface water that Kent estimates would take at least \$30,000 to run power to.

The well and piping were already in place when he bought the land, Kent said, but noted that the previous owners were at the mercy of their water pump, which only kicked in when trough levels were low and meant that water ran out quickly in the case of a problem.

He has since added 3,000 gallons of storage on site, enough for

**"Around here we don't have any wells or anything, so the cows just drink out of the sloughs and when they dry back a bit they tend to be three feet of mud for 20 or 30 feet before you get to water."**

DOUG NORTHAM

#### See related story page 31

a one-day grace period should he need to make the drive.

"It's been fairly reliable," he said. "You've got to realize it's not a walk-away system. You do have to pay attention to it, but at the cost, we couldn't even begin to run power there."

Today, Kent runs 100 cow-calf pairs on a two-paddock rotational grazing system, both accessible to the stationary watering system.

The phrase "remote" watering takes new meaning on Kent's farm. Faced with the need to keep watch over the system and the reality of distance, the producer outfitted his pasture with cameras and synced water system controls to his smartphone.

"One issue that we ran into is if we get too much solar, the pump doesn't like too high of voltage and it would lock up, so it was just a matter of flipping a switch on and off, which — a five-hour drive to take 10 seconds to flip the switch on and off is not a lot of fun," he said. "Now, this season, we've added a control system that has relays I can control over the internet."

Solar panels have also seen an upgrade this year. The system previously ran off 12 panels producing 750 watts at a given time. Improved solar technology has allowed Kent to improve those numbers. His system now boasts four panels and produces 1,000 watts.

The change will help deal with those hot but cloudy days when demand for water is high, but solar energy is low, he said.

A battery backup was also added this year and is able to run the system for two days without sunlight.

"The nice thing about the well is we're not worried about water quality," Kent said. "This year was bad. There were a lot of dry areas and salt in the water in the dugouts and that became pretty bad."

Over 200 cattle died in southern Saskatchewan this July due to water quality.

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## NEWS

### India increases pulse production outlook

CNSC / India's total pulse production outlook for 2016-17 has been increased by 550,000 tonnes to 22.95 million tonnes, a 40 per cent increase from 2015-16 (6.6 million tonnes more) and 5.32 million tonnes higher than the five-year average.

India released its fourth seasonal estimate for several crops with total food grains production at a record 275.68 million tonnes, up 2.3 million tonnes from the last estimate released in May and 24.1 million tonnes higher than 2015-16.

The latest estimate for the summer or kharif crop was projected to climb to 9.4 million tonnes, an increase of 300,000 tonnes from the May estimate. Harvest for many kharif crops is now starting to come in.

The estimate for the larger rabi (winter) crop was increased by 240,000 tonnes from the May estimate.

Data from the India government shows pulse plantings were currently at 32.3 million acres, down 3.5 per cent from the same date a year ago.

Meanwhile the Indian government also moved shipments of urad and moong dal under a restricted category, limiting imports to 300,000 tonnes. The government hopes to support domestic prices by limiting imports. Domestic prices have fallen below India's minimum support levels. India produced 2.07 million tonnes of moong dal in 2016-17, a record for the crop, compared to 1.59 the previous year.

India also put imports of pigeon peas and toor dal in the restricted category earlier this month.

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# LIVESTOCK MARKETS

## Cattle Prices

(Friday to Thursday)

### SLAUGHTER CATTLE

	Winnipeg	September 15, 2017
Steers	—	—
Heifers	—	—
D1, 2 Cows	78.00 - 84.00	
D3 Cows	68.00 - 76.00	
Bulls	97.00 - 104.00	

**FEEDER CATTLE** (Price ranges for feeders refer to top-quality animals only)

	Winnipeg	September 15, 2017
Steers	(901+ lbs.) 145.00 - 178.00	
	(801-900 lbs.) 165.00 - 187.50	
	(701-800 lbs.) 180.00 - 208.00	
	(601-700 lbs.) 200.00 - 216.00	
	(501-600 lbs.) 205.00 - 227.00	
	(401-500 lbs.) 210.00 - 238.00	
Heifers	(901+ lbs.) 130.00 - 164.00	
	(801-900 lbs.) 150.00 - 177.00	
	(701-800 lbs.) 158.00 - 182.50	
	(601-700 lbs.) 165.00 - 190.00	
	(501-600 lbs.) 175.00 - 204.00	
	(401-500 lbs.) 185.00 - 215.00	

SLAUGHTER CATTLE	(\$/cwt)	Alberta South	Ontario
Grade A Steers	(1,000+ lbs.)	\$ —	\$ 112.98 - 129.35
Grade A Heifers	(850+ lbs.)	\$ —	\$ 107.42 - 125.68
D1, 2 Cows	80.00 - 95.00	56.88 - 79.15	
D3 Cows	70.00 - 85.00	56.88 - 79.15	
Bulls	105.00 - 105.00	82.78 - 109.67	
Steers	\$ 173.00 - 186.00	\$ 156.07 - 182.05	
	(801-900 lbs.) 181.00 - 198.00	173.77 - 193.06	
	(701-800 lbs.) 193.00 - 210.00	163.33 - 211.16	
	(601-700 lbs.) 195.00 - 215.00	169.55 - 213.72	
	(501-600 lbs.) 200.00 - 217.00	177.55 - 237.44	
	(401-500 lbs.) 210.00 - 236.00	170.30 - 232.58	
Heifers	\$ 157.00 - 171.00	\$ 134.16 - 148.78	
	(801-900 lbs.) 166.00 - 180.00	144.46 - 157.55	
	(701-800 lbs.) 168.00 - 185.00	141.93 - 180.72	
	(601-700 lbs.) 171.00 - 188.00	135.65 - 182.47	
	(501-600 lbs.) 175.00 - 192.00	150.51 - 189.12	
	(401-500 lbs.) 183.00 - 207.00	148.83 - 206.01	

**Futures** (September 15, 2017) in U.S.

Fed Cattle	Close	Change	Feeder Cattle	Close	Change
October 2017	106.93	-4.20	September 2017	148.80	2.65
December 2017	111.78	-3.38	October 2017	149.60	3.67
February 2018	115.75	-0.33	November 2017	149.48	5.53
April 2018	117.65	8.10	January 2018	146.23	4.13
June 2018	111.43	3.52	March 2018	144.43	2.08
August 2018	109.20	0.08	April 2018	144.60	2.42

## Cattle Slaughter

Week Ending Sep 9th, 2017	Previous Year	Week Ending Sep 9th, 2017	Previous Year
Canada	56,634	53,976	Prime 619 1,100
East	11,622	11,185	AAA 27,332 32,439
West	45,012	42,791	AA 19,289 13,421
Manitoba	NA	NA	A 1,077 517
U.S.	555,000	529,000	B 1,514 1,375
			D 6,068 4,403
			E 364 284

## Hog Prices

(Friday to Thursday) (\$/100 kg)

Source: Manitoba Agriculture

E - Estimation

MB. (\$/hog)	Current Week	Last Week	Last Year (Index 100)
MB (All wts.) (Fri-Thurs.)	157E	167.46	162.03
MB (Index 100) (Fri-Thurs.)	145E	155.98	149.67
ON (Index 100) (Mon.-Thurs.)	145.53	156.39	150.99
PQ (Index 100) (Mon.-Fri.)	151.45	162.82	154.31

**Futures** (September 15, 2017) in U.S.

HOGS	Close	Change
October 2017	59.03	-2.43
December 2017	56.53	-1.75
February 2018	62.35	-0.92
April 2018	67.45	-0.70
May 2018	72.90	-1.00

## Other Market Prices

### Sheep and Lambs

\$/cwt	Winnipeg	Woolen Fats	Toronto	SunGold Specialty Meats
Ewes	Choice —	—	130.22 - 169.07	—
Lambs	(110+ lb.) —	—	199.96 - 222.42	—
	(95 - 109 lb.) Not Available		225.04 - 242.28	
	(80 - 94 lb.) This Week		208.30 - 244.08	
	(Under 80 lb.) —		151.79 - 266.19	
	(New crop) —		—	

### Chickens

Minimum broiler prices as of April 13, 2010

Under 1.2 kg.	\$1.5130
1.2 - 1.65 kg.	\$1.3230
1.65 - 2.1 kg.	\$1.3830
2.1 - 2.6 kg.	\$1.3230

### Turkeys

Minimum prices as of September 11, 2017

Broiler Turkeys (6.2 kg or under, live weight truck load average)	\$1.925
Grade A Undergrade	\$1.835

### Hen Turkeys

(between 6.2 and 8.5 kg live weight truck load average)

Grade A	\$1.915
Undergrade	\$1.815

### Light Tom/Heavy Hen Turkeys

(between 8.5 and 10.8 kg live weight truck load average)

Grade A	\$1.915
Undergrade	\$1.815

### Tom Turkeys

(10.8 and 13.3 kg, live weight truck load average)

Grade A	\$1.890
Undergrade	\$1.805

Prices are quoted f.o.b. producers premise.

### Eggs

Minimum prices to producers for ungraded eggs, f.o.b. egg grading station, set by the Manitoba Egg Producers Marketing Board effective November 10, 2013.

New</th

## GRAIN MARKETS

## COLUMN

# U.S. soy, Prairie weather help halt canola's skid

A new USDA report was briefly bearish for corn and soy

**DAVE SIMS**  
CNSC



**I**CE Future Canada canola contracts managed to halt their recent trek downward on the charts through a mix of weather issues, speculative buying and upward action in U.S. soybeans.

However, strength in the Canadian dollar and the continuing oilseed harvest throughout North America were still bearish forces for the commodity during the week ended Sept. 15.

Farmers were busy in the field sending roughly a million tonnes of canola into elevators during the first two weeks of September. Old-crop supplies continue to be tight, though, and demand is reasonably solid.

The main development over the past week was the release of the U.S. Department of Agriculture's supply-and-demand report on Sept. 12.

That report weighed on canola as it predicted a record 4.43-billion-bushel soybean harvest in the U.S. It also projected higher-than-expected yields, at 49.9 bushels an acre.

While some participants in the industry don't believe the crop will be that large, it's still evident this year's soybean crop will be massive.

One factor on the international front that helped support canola was the state of the canola crop in Australia. Although farmers Down Under planted roughly the same amount of canola as they did last year, the

Australian Grains and Oilseeds Federation predicts this year's crop will be just 1.68 million tonnes — the lowest amount since 2006-07, according to ABARES.

Most analysts feel a seasonal bump is coming for canola after harvest, though.

For the most part, corn futures on the Chicago Board of Trade held their own during the week ended Sept. 15. Prices fell on Tuesday when USDA released its monthly supply-and-demand report. The agency pegged the U.S. corn crop at 14.18 billion bushels, which was higher than expected. However, funds went bargain hunting the next day and the market returned to its pre-report trading range.

Soybeans were also pressured by the report, which estimated the U.S. soybean crop would be record large. However, after a momentary fall, the market took strength from ideas that USDA had overestimated the crop size and yield. Dry conditions in Brazil and a robust crush report also lent strength to soybeans.

The wheat market took strength from short-covering and weather problems in other countries. Crops in both Argentina and Australia have been stressed by poor weather, which was good news for U.S. exporters. The massive Russian crop, however, has been a bearish force on prices.

USDA's 2017-18 wheat estimates were mostly unchanged from the previous report, so the market didn't have to go through the same pressure as its corn and soybean counterparts.

*Dave Sims writes for Commodity News Service Canada, a Winnipeg company specializing in grain and commodity market reporting.*

## Manitoba Elevator Prices

Average quotes as of September 18, 2017 (\$/tonne)

	Future	Basis	Cash
E. Manitoba wheat	228.36	3.88	232.25
W. Manitoba wheat	228.36	-11.28	217.08
E. Manitoba canola	489.10	-25.69	463.41
W. Manitoba canola	489.10	-30.72	458.38

Source: pdqinfo.ca

## Port Prices

As of Friday, September 15, 2017 (\$/tonne)

	Last Week	Weekly Change
U.S. hard red winter 12% Houston	181.33	1.66
U.S. spring wheat 14% Portland	265.10	-9.27
Canola Thunder Bay	499.10	-0.60
Canola Vancouver	514.10	-0.60

## Closing Futures Prices

As of Thursday, September 14, 2017 (\$/tonne)

	Last Week	Weekly Change
ICE canola	489.10	-0.60
ICE milling wheat	223.00	-10.00
ICE barley	145.00	0.00
Mpls. HRS wheat	228.26	-3.22
Chicago SRW wheat	164.98	12.95
Kansas City HRW wheat	163.88	11.21
Corn	139.66	4.13
Oats	153.03	1.78
Soybeans	355.96	4.50
Soymeal	339.42	7.82
Soyoil	762.05	-0.66

## Cash Prices Winnipeg

As of Friday, September 15, 2017 (\$/tonne)

	Last Week	Weekly Change
Feed wheat	n/a	n/a
Feed barley	152.49	-3.67
Rye	n/a	n/a
Flaxseed	428.32	5.51
Feed peas	n/a	n/a
Oats	178.96	4.54
Soybeans	368.91	5.51
Sunflower (NuSun) Fargo, ND (\$U.S./CWT)	17.45	n/a
Sunflower (Confection) Fargo, ND (\$U.S./CWT)	Ask	Ask

**For three-times-daily market reports and more from Commodity News Service Canada, visit the Markets section at [www.manitobacooperator.ca](http://www.manitobacooperator.ca).**

# Prairie wheat bids continue on trek downward

MGEX December spring wheat futures dropped more than 25 U.S. cents on the week

**BY DAVE SIMS**  
CNS Canada

**H**ard red spring wheat bids in Western Canada softened yet again during the week ended Sept. 15, as downward action in U.S. futures dragged on values.

Depending on the location, average Canada Western Red Spring (CWRS) wheat prices were down \$5-\$6 per tonne across the Prairie provinces, according to price quotes from a cross-section of delivery points compiled by PDQ (Price and Data Quotes). Average prices ranged from about \$221 per tonne in western Manitoba to as high as \$240 in Alberta.

Quoted basis levels varied from location to location, with some improving by \$4-\$7 while others fell

anywhere from \$2 to \$10 when using the grain company methodology of quoting the basis as the difference between U.S. dollar-denominated futures and Canadian dollar cash bids.

When accounting for currency exchange rates by adjusting Canadian prices to U.S. dollars, CWRS bids ranged from US\$181 to US\$197 per tonne, unchanged on a U.S. dollar basis on the week. That would put the currency-adjusted basis levels at about US\$35-\$51 below the futures.

Looking at it the other way around, if the Minneapolis futures are converted to Canadian dollars, CWRS basis levels across Western Canada range from \$43 to \$62 below the futures.

Canada Prairie Spring Red (CPSR) wheat bids eked out tiny gains, with

**Average (CWRS) prices ranged from about \$221 per tonne in western Manitoba to as high as \$240 in Alberta.**

prices ranging from \$155 to \$171 per tonne.

Average durum prices were generally down \$1-\$3 per tonne, with bids in Saskatchewan coming in at about \$263-\$267 per tonne.

The December spring wheat contract in Minneapolis, off of which most CWRS contracts Canada are based, was quoted Sept. 15 at US\$6.215 per bushel, down 25.25 U.S. cents from the previous week.

Kansas City hard red winter wheat

futures, traded in Chicago, are more closely linked to CPSR in Canada. The December K.C. wheat contract was quoted at US\$4.46 per bushel on Sept. 15, up 4.5 U.S. cents compared to the previous week.

The December Chicago Board of Trade soft wheat contract settled Sept. 15 at US\$4.49, up 11.25 U.S. cents on the week.

The Canadian dollar settled Sept. 15 at 82.09 U.S. cents, down by roughly a third of a cent on the week.

# Pollinator seed mixes tailor made

Just like cattle and hogs benefit from the right rations, bees can benefit from the right mix of flowering plants

BY ALEXIS STOCKFORD

Co-operator staff

**W**hat's good for the bumblebee may not be good for the honeybee.

That was the message as the Manitoba Beef and Forage Initiatives dug into pollinator-friendly seed mixes Aug. 30 during its Brookdale site field tour.

"You want to have something that's going to grow and, depending on how much time they have, legumes in the mix would be good. Some native flowering plants would be great to make it diverse," said Kim Wolfe, Manitoba Agriculture research and development specialist. "It's a hard balance to find something that's going to grow well, but also be diverse and the more diversity you get, the more challenging it is to grow."

Colour and bloom size may also be considerations, particularly when multiple native pollinators, rather than just domestic honeybees, are in play. Research suggests there are 231 species of wild bees in Manitoba, some of which vary widely in size and may be unable to reach the nectar in larger flowers with deeper tubes. Wolfe argued that a range of flower sizes ensures both large and small bees have a food source.

Blue and purple flowers are the best draw for pollinators, the crowd heard, while yellow blooms are generally more attractive than white.

Wolfe pointed to research that showed yield benefits of pollination.



**"It's a hard balance to find something that's going to grow well, but also be diverse and the more diversity you get, the more challenging it is to grow."**

**KIM WOLFE**  
Manitoba Agriculture

In a 2014 study looking at the relationship between insect pollination and crop production in four regions of Europe, Dr. Ignasi Bartomeus found average yield increased between 18 and 71 per cent with insect pollination, depending on the crop, and quality was generally higher.

At the same time, Wolfe pointed to a 2006 study out of Simon Fraser University that found canola fields abutting uncultivated acres saw higher bee populations and seed set.

#### Pollinating for profit

For commercial beekeepers, sufficient pollinator habitat is crucial and it is not unusual to make arrangements for hives to be moved into neighbouring farmers' fields during flowering.

Some apiarists, however, are unwilling to leave things to nature or depend on their neighbours' land and are instead turning to custom mixes to manage their bees' diet.

Rhonda Chestnut, a sales agronomist for Northstar Seed based in the Interlake, has expe-

rience on both sides. A hobby beekeeper herself, the Northstar employee has also created bee-keeping seed mixes for customers.

"Part of it is when the flowers are maturing," she said. "Making sure that the mixture has diverse species that have different flowering times so you can have a constant 'something' in flower for the bees to feed on during the season."

A staggered planting time might be part of that, she added.

"I recommended that they planted it in six-week intervals," she said. "So, he would do half of his field in early May and then have the early flowering six weeks later, and then plant the next batch 21 to 30 days later so that he would have flowering into late August with this mix."

#### Corporate support

Manitobans had their choice between two corporate programs looking to grow wild pollinator habitat this year. Operation Pollinator, a program through Syngenta Canada and the Soil Conservation Council of Canada, is wrapping up its first year in Western Canada while General Mills Cheerios has teamed up with the Xerces Society to target oat growers.

Syngenta hoped to see 100 Prairie growers sign on with the program, which provides up to two acres of seed to producers, as well as agronomy advice and financial support to offset the cost of seeding.

It's the first year for the program in Western Canada and about 80 producers have joined so far, according to Dr. Paul Hoekstra, Syngenta Canada senior stewardship and policy manager.

The company was pleased by both the uptake and the success of Operation Pollinator stands, despite abnormally dry weather throughout the Prairies, Hoekstra reported.

"To me, it's a really great program that offers a way for farmers to increase and improve biodiversity on the farm as well as a way for us to refocus our efforts in looking at low-productivity lands as a way of using them differently," he said.

The seed mix includes phacelia, bird's-foot trefoil, timothy grass, alsike, red clover and sweet clover.

Producers may plant the seed in more than one location, although Syngenta has asked that patches cover at least one acre. The program also asks that Operation Pollinator acres are untouched rather than harvested for forage at the end of the season.

"It allows for a natural area for pollinator habitat for overwintering so a lot of those native pollinators can be sort of left and have a chance to survive the winter and have a population into the spring," Hoekstra said.



Attendees of an Aug. 30 field tour at the Manitoba Beef and Forage Initiatives site north of Brandon explore pollinator-friendly seed mix, including a swath of purple blooming phacelia. PHOTO: ALEXIS STOCKFORD

#### Supply chain integration

The Cheerios program is aiming for larger acreage. Non-oat-growing producers can access up to 10 acres of seed, while oat-producing farms can access up to a quarter section worth. All producers must commit to leaving the stand for at least three to five years.

"The program is primarily intended to provide free flowering seed for folks who are growing oats and this is intended to integrate pollinator habitat into the supply chain for Cheerios and oats is a primary ingredient of Cheerios," Jim Eckberg, Xerces Society plant ecologist, said. "Most of the acres really need to be on those farms that are producing oats, but we also recognize that not every farmer produces oats but they're still in those regions that grow oats and even if you do grow oats, they might not find their way into Cheerios."

The overwhelming majority of participants, about 99 per cent, have been on oat-growing farms, Eckberg said.

General Mills hopes to add 3,300 acres of pollinator habitat to the landscape by 2020. As of spring 2018, the program will have 1,200 acres committed at 35 locations in both the Prairies and northern United States.

Producers in the program may opt for a pure native wildflower blend or a pasture mix with legumes, although many users have integrated both, Eckberg said.

The wildflower mix was chosen from plants native to the tall grass prairie, including dotted blazing star, wild bergamot, slender beardedtongue and both warm- and cool-season grasses. The pasture mix integrates species like sainfoin, clover, alfalfa and cicer milk vetch.

#### Some variation

The list of species in each mix is fixed, but concentrations may be customized to include more or less of a specific plant.

"A farmer providing input to the seed mixture, that's a key part of our program," Eckberg said. "We want to both make a meaningful impact to pollinator conservation on the farm by increasing the amount of blooms, providing blooms through much of the year, but we want to integrate flowers onto the farm in a way that's going to add value to the farm."

Those opting for the pasture mix may use the land for rotational grazing or haying, although one to five per cent must be left after each cut.

"We specifically designed the mixture around forage legumes that are particularly tame,"

Eckberg said. "So we've excluded species like bird's-foot trefoil and yellow sweet clover. We've excluded crested wheatgrass, reed canarygrass, meadow foxtail — a lot of these species that we know have this track record of being invasive, we've excluded from the program and I think we are providing kind of a reduced-risk mixture in terms of potential invasive (species) compared to what is often used in forage production."

Operation Pollinator includes both bird's-foot trefoil and yellow sweet clover, although Hoekstra disputed the idea that any species in their seed might be considered invasive.

"We developed these mixes in consultation with a variety of stakeholders including our provincial partners and the mix is representative of a wide variety of species that are sort of checking off a number of boxes," he said. "They're developed to sort of look at coexistence with farming practices and habitat creation as well as commercial availability and scalability, as well as utility over a wide number of geographic areas. Bird's-foot trefoil, along with the other components of the seed mix, are commonly used as forage crops in the Prairies, including Manitoba."

Hoekstra added that the program will look at its initial results to determine any improvements for next year.

#### Good start

Wolfe, meanwhile, was optimistic about both programs.

"Both are good and they're both serving the purpose of creating pollinator habitat," she said. "It just depends on if you want to have a more diverse flowering mix. The Cheerios flowering mix is very diverse. Its pasture-legume mix is also flowering, but it's more similar to the Syngenta mix, which is grass-legume."

Producers looking to create their own native flowering mix, whether for native pollinators or beekeeping, may be in for a case of sticker shock. Wolfe started her own native flower plot at the MBFI Brookdale site this year, a project that cost about \$500 to plant 500 square metres.

Likewise Eckberg says the Cheerios project runs up to \$325-\$350 per acre for the flower mix, a cost that goes down to \$35-\$50 per acre in the pasture option.

Producers interested in either corporate program can contact Eckberg at [Jim.Eckberg@xerces.org](mailto:Jim.Eckberg@xerces.org) or join Operation Pollinator through their local conservation district.

Manitoba's Controlled Crop Residue Burning Program

**Always Call  
Before You Burn  
1-800-265-1233**

#### Stubble burning restrictions

Manitoba's crop residue burning regulation restricts daytime burning between August 1 and November 15. Burning at night is illegal. Burning within Burning Permit Areas requires a permit issued by Manitoba Sustainable Development.

If you do not comply, you may be fined as much as \$50,000.

#### If you must burn, be responsible

Before you burn straw, stubble or chaff this fall, call 1-800-265-1233 or visit [manitoba.ca](http://manitoba.ca) to find out whether burning is allowed in your area that day.

Burning is permitted only on days when the weather conditions allow for effective smoke dispersion.

It is essential that you make sure appropriate fireguards are in place during a burn and you must supervise your fires at all times.

#### Consider the alternatives

In most years, crop residue management practices can reduce or eliminate the need to burn. For more information, contact your local Manitoba Agriculture office or visit [manitoba.ca](http://manitoba.ca).

**Manitoba** 

[astockford@farmmedia.com](mailto:astockford@farmmedia.com)

# Farmers, grain companies deliver consistent message on rail legislation

They told the transport committee C-49 is an improvement but more needs to be done

BY ALLAN DAWSON

Co-operator staff

Pending transportation legislation has hit the target — but it's not a bull's-eye.

That was the message from western Canadian grain farmers, elevator companies and oilseed processors last week, when they spoke to the House of Commons transport committee on Bill C-49, the Transportation Modernization Act. They told legislators that there was still room for improvement.

"Our points have come across and it shows in the (proposed) act, but... there are still some loopholes," Norm Hall, vice-president of the Agricultural Producers Association of Saskatchewan and Canadian Federation of Agriculture, said in an interview Sept. 15.

Hall, Wade Sobkowich and Chris Vervaet, executive directors of the Western Grain Elevator Association and Canadian Oilseed Processors Association, respectively, testified on C-49 before the House of Commons Transport Committee Sept. 12 in Ottawa.

They emphasized in the absence of a truly competitive market for rail service, legislation is needed to compel the railways to be financially accountable when they fail to provide agreed-to service, Sobkowich said in an interview.

"We talk about things through the Crop Logistics Working Group... we share ideas and we're all very consistent and very much on the same page," he said. "We all know what we need to make sure that we have this balance between shippers and railways. It's just a matter of getting the ball over the goal line with the government."

## Early review

Although a review of the Canada Transportation Act was scheduled, following the grain-shipping backlog of 2013-14, Ottawa started it a year early. The costly backlog added to the urgency, galvanizing farm groups and grain companies into a rare show of solidarity.



Farmers, elevator operators and oilseed processors all say there is still room for improvement in pending transportation legislation. PHOTO: LAURA RANCE

In his formal remarks to the committee Hall emphasized that ultimately farmers pay for grain shipping — a bill that in the 2014-15 crop year totalled \$1.4 billion.

"While Bill C-49 is a great step in the right direction, it almost seems as if they are meant to look like improvements without real change, leaving railways far too much room not to comply with the intent and far short of emulating a competitive environment," Hall's written presentation says.

For example, the bill calls for more data collection but doesn't give the Canadian Transportation Agency (CTA), which administers the legislation, the authority to use all the data.

Sobkowich had a similar complaint, noting proposed data collection under the act doesn't include the number of cars grain companies order from the railways but don't get on time.

Hall, Sobkowich and Vervaet all said the CTA should have the authority to investigate and resolve grain-shipping problems as opposed to requiring a formal complaint.

They also agreed proposed long haul interswitching should be priced based

on competitive freight rates rather than historical ones.

They agreed long haul interswitching should also be more flexible. Sobkowich noted that under the proposal an elevator or processor couldn't access long haul interswitching — a provision the government says should increase competition among railways — if it was located within 30 km of a competing railway, even if that competing railway doesn't deliver where the shipper wants grain to go.

For example, the Red River South elevator on a CN Rail line is less than 30 km from an interchange with Burlington Northern Santa Fe (BNSF). But BN only delivers to American ports, not Vancouver or Thunder Bay — the destination for 75 per cent of that elevator's grain during the last three years.

Sobkowich told the committee the WGEA wanted to keep extended interswitching, a provision introduced as a temporary, emergency measure to stimulate railway competition.

"The extended interswitching order had been in effect for the last three growing seasons and had evolved into an invaluable tool for western grain shippers," Sobkowich told the committee.

## A few suggestions

Given C-49 is an improvement, Sobkowich said the WGEA is proposing only four small amendments to improve it. Three deal with long haul interswitching. One would give shippers more flexibility, another would ensure fair rates when used, and the third would list interchange sites and prevent railways from arbitrarily delisting them.

The WGEA's other proposed amendment is to add soybeans and soybean products to the maximum revenue entitlement (MRE) formula used to set the total amount the railways can earn hauling western grain.

The MRE was introduced to give the railways rate-setting flexibility to encourage system efficiencies, but protecting farmers by preventing the railways from charging what the market would bear.

Sobkowich pointed out that American grain moving through Canada to export through Thunder Bay or the West Coast, is covered by the MRE, but Canadian soybeans are not.

While Sobkowich and Hall welcomed the continuation of the MRE under C-49, Hall argued the railway costs of

**"While Bill C-49 is a great step in the right direction, it almost seems as if they are meant to look like improvements without real change, leaving railways far too much room not to comply with the intent and far short of emulating a competitive environment."**

NORM HALL  
APAS

shipping grain used in the formula need to be reviewed — something that hasn't happened for more than 20 years.

"As has been frequently stated, it is impossible to even do a credible impact analysis of legislative changes without actual current costing data," Hall said.

Level of service and compliance mechanisms have to prevent railways from being ambivalent about providing services because shippers have no other options, Hall said. To that end the transport minister should monitor rail service.

Hall also emphasized penalties against the railways must not be included in the MRE calculation, which would pass the cost back to farmers.

The CFA also wants C-49 to give the transport minister the power to set the amount of grain railways have to move if a backlog reoccurs.

Hall called for a moratorium on railway abandonment of producer car loading sites, which farmers pay to maintain through the MRE.

In separate interviews Hall and Sobkowich said they felt the committee understood their message.

"I think we put our best foot forward," Sobkowich said. "Now we'll see what happens."

*allan@fbcpublishing.com*

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# WEATHER VANE

"EVERYONE TALKS ABOUT THE WEATHER, BUT NO ONE DOES ANYTHING ABOUT IT." *Mark Twain, 1897*



## Expect more unsettled but mild weather

Issued: Monday, September 18, 2017 · Covering: September 20 – September 27, 2017

**DANIEL BEZTE**

Weather Vane



The first part of last week's forecast played out fairly close to what the weather models predicted. The main area of low pressure and the associated rainfall moved through our region late last Friday. Unfortunately or fortunately, depending on your perspective, the main rainfall stayed to our south and east, with most areas seeing between 10 and 20 mm. The area of low pressure also took a bit longer to move out, resulting in a fairly blustery day last Sunday.

It looks like this forecast period will begin with more unsettled weather as a large and deep area of low pressure develops to our west. We'll likely see showers and/or periods of rain on Wednesday as a warm front pushes through our region. The main area of low pressure will slowly move from the Alberta/Saskatchewan border on Wednesday, into northern Manitoba by Friday. This should place us in the warm sector of this system on Thursday and Friday. How warm it will be will depend on whether we see any sunshine.

Expect daytime highs to be in the upper teens, with some low 20s if there is some sun.

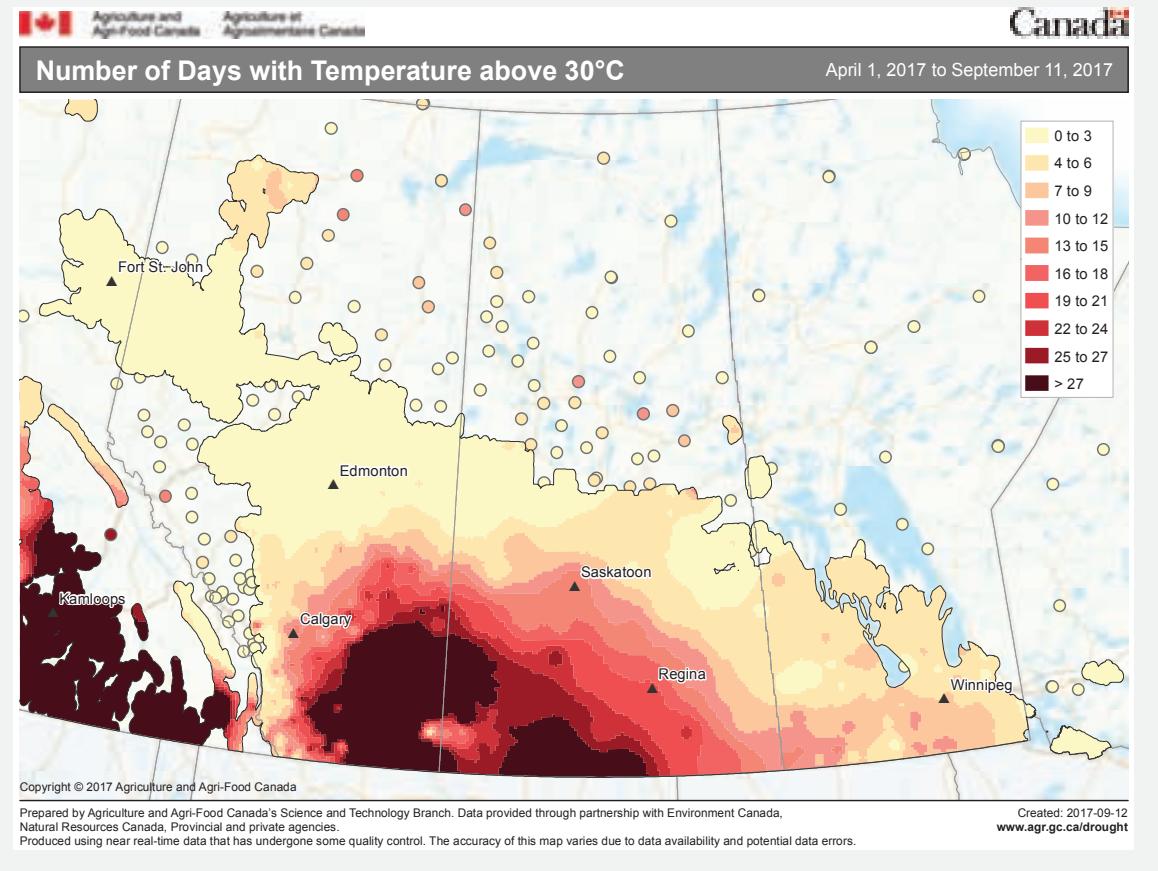
The next chance for rain will be late on Friday or early Saturday, as a piece of energy rotates through our region around the main upper low to our north. Weak high pressure is then forecast to build in on Sunday and Monday, bringing with it clearing skies but cool temperatures. Expect daytime highs to be in the low teens with overnight lows in the 2 to 5 C range. It doesn't look like there will be any widespread frost, but a few patchy areas of frost can't be ruled out.

Dry weather looks like it will continue for most of next week as the weather models show the western ridge of high pressure rebuilding. Expect temperatures to warm up by a couple of degrees each day, with daytime highs pushing back into the low 20s by late in the week.

Usual temperature range for this period: Highs, 12 to 22 C; lows, 1 to 10 C.

*Daniel Bezte is a teacher by profession with a BA (Hon.) in geography, specializing in climatology, from the U of W. He operates a computerized weather station near Birds Hill Park. Contact him with your questions and comments at daniel@bezte.ca.*

### WEATHER MAP - WESTERN CANADA



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Prepared by Agriculture and Agri-Food Canada's Science and Technology Branch. Data provided through partnership with Environment Canada, Natural Resources Canada, Provincial and private agencies.  
Produced using near real-time data that has undergone some quality control. The accuracy of this map varies due to data availability and potential data errors.

Created: 2017-09-12  
www.agr.gc.ca/drought

This issue's map shows the total number of days with daytime temperatures above 30 C this summer. The map really shows how the heat over the summer was concentrated over southeastern Alberta along with southwestern Saskatchewan. Over these regions temperatures soared, with most locations recording over 25 days with highs above 30 C.

## Lowest wind speeds in last 17 years

August's wind speeds were not only low, but remarkably consistent in how low they were

**BY DANIEL BEZTE**

Co-operator contributor

Not sure what the main topic for this week should be. I did overhear the past week or so that the big reason that August felt so warm, even though it was actually cooler than average, was because the winds were so light during the month. I then bumped into a few friends who like boating and they said August was one of the best months ever for boating because the winds were so light. So we'll take a look at wind data for the month of August to see just how light the winds were.

The trouble with wind data is that Environment Canada doesn't report it in a useful format. If you look at its website, it just reports the maximum wind gusts, but not the average wind speed. To check this out I looked at some of the private weather stations that do report average wind speeds, and came up with the following observations.

When we look at the last 17 years' worth of wind data for August, the average wind speed for the month ranged from a low of five km/h to a peak of nearly 10 km/h. These

**While it looks like we'll be going through a week or two of unsettled weather, I am not convinced we are seeing a change in our overall pattern.**

speeds might seem low, but you have to realize these are monthly averages and include overnight wind speeds. As most of us know, on most nights the wind speed usually drops down to near zero. This means, for the most part, you can probably at least double these values to get the speed during daylight hours.

Looking back at this August, the average wind speed for the month was a meagre 2.5 km/h. This is a remarkably low number, and what was even more remarkable was the consistency of the light winds. There were only three days during August that reported an average wind speed that was greater than five km/h, and there were an amazing 17 days with wind speeds less than two km/h. Now, due to thunderstorms and local topographical effects across our region, there were probably locations that reported higher winds, but overall,

there just wasn't much wind in August. In fact, during the past 17 years the previous lowest monthly wind speed was 3.8 km/h, back in September 2006. Since light winds help to make it feel warmer, this means the light wind speeds did indeed have an impact on how warm August felt, something we usually don't build into our discussion about how warm or cold a month is.

#### Open passages

Next on our weather discussion list is Arctic sea ice. We went into this summer with record- to near-record-low sea ice across the Arctic. Conditions this summer were not favourable for ice melt across a large portion of the Arctic as low pressure prevailed, bringing clouds, cool temperatures and winds that tended to spread out the ice. By the end of August, ice levels had fallen to 5.51 million square km, 1.77 million

square km below average and the third-lowest August ice levels since satellite records. Of note is the Beaufort Sea, which saw the ice edge retreat to the northernmost point on record.

Looking at the different passages, the northeastern passage was once again open to shipping, while the southern northwest passage opened up with some first-year sea ice present. The talked-about Northwest Passage was mostly open this year, but a thick concentration of ice at the western entrance blocked entrance into the passage.

Across the Antarctic, which is just entering its peak ice season, sea ice levels are still tracking over two standard deviations below the long-term average, but have just recently moved above last year's record-low level.

#### Changing patterns

To finish up this week's article I think we need to address the question that has been asked of me most often: How can we see record-breaking temperatures on one day, only to be followed by cool and rainy weather a couple of days later? My answer is, that's just fall weather, plain and simple. The other most frequently asked

question is whether this is the expected or anticipated change in the weather pattern. At this time of year it is a tough one to explain. As we work our way into fall, daily temperatures naturally drop, but most people seem to forget this. While it looks like we'll be going through a week or two of unsettled weather, I am not convinced we are seeing a change in our overall pattern.

This is going to sound wishy-washy, but when a change in the weather pattern tries to occur it will often bounce back and forth between the initial pattern and the new pattern. Sometimes this bouncing back and forth happens once or twice, then the original pattern moves back in. Other times it flips back and forth, then the new pattern takes hold. Then, of course, to cover all the bases, sometimes the weather pattern just does a quick flip. So far this fall we haven't seen a quick flip, and right now it looks like our dry and warm summer pattern is trying to hold on — although it's cooler since we're moving into fall. As usual, only time will tell whether this is just a quick flip or an actual change in the pattern.

# CROPS

HUSBANDRY — THE SCIENCE, SKILL OR ART OF FARMING

# Soybean harvest well underway

Once fields reach the R8 stage soybeans can be harvested in five to 10 days

BY ALLAN DAWSON

Co-operator staff / Morden

**S**oybeans are being harvested in the heart of Manitoba's traditional Soybean Belt, but as of Sept. 14, there were still fields a week or more away from the combine depending on the weather.

The variability underscores differences in maturity among varieties and seeding dates.

Dry, warm weather until now has helped ripen soybean crops across agro-Manitoba, according to Manitoba Agriculture's weekly crop reports.

Soybeans are fully mature at the R8 stage. That's when 95 per cent of pods are brown and rattle when shaken.

At R8, depending on the weather, the crop is five to 10 days away from harvest.

Manitoba Agriculture's website says to direct combine soybeans when the pods are dry and the seeds are hard.

Combining can be done when seed moisture is below 20 per cent, but soybeans must be stored at less than 14 per cent to avoid spoiling.

"Seed damage is high when soybean is harvested at less than 12 per cent moisture, and harvest losses can also be high under dry conditions," the site says. "Four beans per square foot represents a harvest loss of 60 pounds per acre, so caution is advised. A floating cutter bar is ideal to minimize harvest losses. Careful adjustment of cylinder speed and concave clearance is needed to minimize cracking and splitting of seed."

A small amount of green, puffy seeds in the harvested sample shouldn't be a problem if the soybeans are dry.



So long as soybeans are dry, a few green-coloured beans shouldn't be a concern as they will dry and change colour in storage, says Manitoba Agriculture farm production adviser Lionel Kaskiw. However, if delivered to an elevator there will be dockage. PHOTO: MANITOBA AGRICULTURE

**"Seed damage is high when soybean is harvested at less than 12 per cent moisture, and harvest losses can also be high under dry conditions."**

MANITOBA AGRICULTURE

Most times the green seeds will dry and turn colour in storage, Lionel Kaskiw, a farm production adviser with Manitoba Agriculture, said during the CropTalk Westman webinar Sept. 13.

However, if soybeans containing green seeds are delivered directly from the combine to buyers, farmers can expect to be docked, Kaskiw added.

Farmers who want to spray soybeans with glyphosate to kill green weeds and control perennial weeds should do so when soybeans have dropped 80 to 90 per cent of their leaves and pods are brown and dry, says the Sept. 7 issue of Manitoba Pulse & Soybean Growers' *Bean Report*.

"Note that pre-harvest glyphosate will not speed up maturity," the *Bean Report* says.

Farmers must also not harvest the crop earlier than the glyphosate label states and pay attention to the maximum residue levels.

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## Soybean harvest tips

From Manitoba Pulse & Soybean Growers' Sept. 7 Bean Report

- Monitor soybeans every other day once they begin to mature. Consult the Manitoba Pulse & Soybean Growers' (MPSG) *Soybean Maturity Guide* to help time your harvest.
- Soybean fields are ready for harvest at less than 14 per cent seed moisture. However, try to avoid harvesting soybeans at less than 13 per cent moisture to prevent seed damage.
- Direct combine soybeans with a flex header at four miles per hour or less. Slower combine speeds (two to four m.p.h.) have shown significantly greater yields compared to faster travel speed (five m.p.h.), according to research conducted by the Prairie Agricultural Machinery Institute (PAMI). Using an air reel can also result in significantly greater yield, according to PAMI.
- Adjust the cylinder speed and concave clearance carefully to prevent seed cracking and splitting.
- Aim to lower the cutter bar within two inches of the ground to capture the lowest pods, preventing stubble losses.
- Measure losses regularly during harvest to optimize combine settings and harvest practices.

## Measuring harvest losses

MPSG has an app for calculating soybean harvest losses (<http://mpgabeanapp.com/harvest-method.html>).

Eighty per cent of soybean harvest losses occur at the header. Understanding your losses and adjusting harvest practices accordingly can put more seed in the bin and more money in your pocket.

Soybean harvest losses can be easily calculated using the MPSG Bean App Harvest Loss Assessor.

This new app determines yield loss according to the number of seeds per square foot counted along the header or behind the combine, and estimated seed size.

Calculations are based on the rule that four seeds per square foot equals one bushel per acre of yield loss.

The app also provides pictures and definitions to account for the four types of header loss.

1. Shatter: seeds and pods shattered by the cutter bar.
2. Stubble: pods that remain attached to cut stubble.
3. Lodged: stalks that were lodged, rather than severed by the cutter bar.
4. Loose: stalks that were cut, but not delivered into the combine (similar to lodged).

Refer to the June 2017 *Pulse Beat* article, Reducing Soybean Harvest Losses in Manitoba, for more research results from PAMI.

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# Lots of advantages to desiccating sunflowers

The key is timing and determining if the crop is good enough to justify the additional cost

BY ALLAN DAWSON

Co-operator staff

Desiccating confection or oilseed sunflowers to speed up harvest can deliver profits and peace of mind, but timing is everything, says Anastasia Kubinec, Manitoba Agriculture's manager of crop industry development.

"There has been a move to more producers going to desiccating sunflowers because they do see the economic benefit to it," Kubinec said during the CropTalk Westman webinar Sept. 13.

"If your yields are going to be down because of weeds or disease maybe it's not going to be the thing for you to do."

Manitoba sunflowers are two weeks earlier than last year, she said.

Desiccation will cost \$16 to \$25 an acre depending on the desiccant, rate and cost of aerial application, she added.

Weather is another factor to consider. If a killing frost (-4 C for four to six hours) is in the forecast farmers can save money letting Mother Nature do the desiccating.

"Sunflowers are extremely hardy and with that fleshy head on the back of the sunflowers it needs to be cold for an extended period of time to really break those cells for the water to drain out and that desiccation to occur," Kubinec said.

Farmers shouldn't desiccate ahead of heavy rains, especially if the sunflowers are infected with head rot (sclerotinia). The combination speeds up the breakdown of infected sunflower heads making a bad situation worse, Kubinec said.

However, since desiccants kill by contact not systemically, a little bit of moisture, such as dew, can spread the chemical across the head providing better results, she added. That's why it's best to apply a desiccant in the morning or evening, Kubinec said.

Desiccation can get a good sunflower crop in the bin earlier. The longer it stands in the fields the more vulnerable it is



Desiccating sunflowers too early can cut yield and test weight. Ideally seed moisture at the time of desiccation will be 14 to 16 per cent, or at least under 20. The back of the sunflower head can be a guide. The bracts in the photo on the left are not fully brown to the bottom. Seeds in this head will be about 30 per cent moisture. The bracts on the right are brown to the bottom and the back of the head is tan coloured. The seeds will be 15 to 20 per cent moisture. PHOTO: ANASTASIA KUBINEC, MANITOBA AGRICULTURE

to breakdown if it's diseased or blackbird predation. There is no control or deterrent for blackbird feeding, Kubinec said.

"We probably lost 40 per cent to blackbirds (in one field that couldn't be desiccated)," said Kubinec, who also farms with her family. "Fields right across the highway from each other — one desiccated and one not — that is some of the difference if you are not desiccating. There is real potential that you could lose crop yields because of the blackbirds."

And then there is just the "sanity" factor.

"I never want to combine sunflowers in the snow," Kubinec said. "My father and grandfather quit harvesting sunflowers because they were always harvesting them in the snow. With a desiccant product we have been growing sun-

**"I never want to combine sunflowers in the snow."**

ANASTASIA KUBINEC

flowers for about eight years. We always seem to be able to get them off in September or October, which is great for everybody."

Earlier harvest generally also means improved crop quality. The trick is determining when to apply a desiccant. Applying too soon will reduce yield and test weight. Some confection sunflower buyers require a minimum test weight and pay less if it isn't achieved, she said.

Determining when to apply a desiccant is a matter of watch-

ing and waiting, watching and then acting.

It's best to apply a desiccant between the R8 and R9 stage.

"It's not a true R9 where the back of the (sunflower) head is that tan colour," Kubinec said. "It's really before that stage when the back of the head is really yellow and it's started to turn brown with that tan colour and the bracts are brown and brown all the way down... then your seeds are 14 to 16 per cent moisture, or maybe up towards 20 per cent, but that's the stage we want to be desiccating. You want to make sure that most of the field is 20 per cent (moisture) or less."

The back of the sunflower head and bracts are guides, but before desiccating farmers should shell out seeds from five or so heads and test the moisture level, Kubinec said.

If a moisture tester isn't available, or not calibrated for sunflowers, Kubinec recommends the microwave test:

1) Weigh, in grams, some seeds, then place the seeds in a safe container and microwave on high for two minutes.

2) Repeat at least twice, and until there is very little difference between the pre- and post-microwave weights.

3) Calculate the moisture level by subtracting the dry weight from initial weight, then divide by the initial weight and multiply by 100.

Here are some field aids for assessing moisture levels:

- If the seed coat can be scuffed or peeling it's more than 18 per cent.
- If it's soft and hard to crack it's around 18 per cent.
- If it's firm, but not always cracking it's 14 to 15 per cent.
- If it cracks easily it's under 13 per cent.

There are only two desiccants registered for use on sunflowers in Canada — diquat (Reglone) and Heat (saflufenacil).

Both work best when applied with lots of water and when temperatures are above 20 C. They take longer to dry down sunflowers when temperatures are cooler.

Diquat works in seven to 10 days, depending on the weather. The pre-harvest interval is 15 to 20 days. It's more expensive than Heat and may not always be available at local retailers, Kubinec said.

"The benefit is it's always consistent," she added. "It really does a good job."

Heat takes 10 to 16 days to desiccate sunflowers, but has a shorter pre-harvest interval of seven days.

Heat hasn't been used that long on sunflowers so more information is needed on how well it works, Kubinec said.

Glyphosate is not registered for pre-harvest use on sunflowers in Canada, she added.

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# Keep ditches mowed to keep birds moving

Blackbird flocks will reach maximum size near mid-September

BY SHANNON VANRAES

Co-operator staff

If you want to save your sunflowers, you need to make sure the blackbirds don't make them dinner.

Lower acres this year have served to concentrate the blackbird flocks into smaller areas where they can do more damage, according to Daryl Rex, an agronomist with the National Sunflower Association of Canada.

"I think it is definitely because of less acres, but it's also the locations of fields," Rex said. "If there are some reeds or bulrushes close to the fields they like to settle down in there and then feed on the sunflowers."

He reminded producers that getting into ditches and removing vegetation is the best way to deter blackbirds. No other effective deterrents are available.

"There really isn't anything else," he said. "Bangers have been used previously, but they are only good for a small area."

Blackbirds begin feeding on sunflowers shortly after they drop their petals and can form large flocks, which reach maximum size near mid-September. Because the birds prefer early-maturing fields, planting sunflower fields in tandem with neighbouring producers can help stop the pests from focusing all their attention on one field. Overall damage from the winged sunflower predators is on par with previous years, Rex said.

While 100,000 acres of sunflowers were planted in Manitoba last year, only about half as many acres were planted this year, bumping up the bird-to-sunflower field ratio. According to Statistics Canada, acres peaked in Manitoba at 190,000 in 2007 and dipped down to 35,000 in 2011.

Rex added that most blackbird damage has been reported in the southwest part of the province, but other areas have seen some issues with sclerotinia.

"There is some stalk and head rot damage showing up in central Manitoba, but out in the eastern part of the province things are looking fairly well," said Rex. "I'd say it's mostly weather related, there is always a low level out there."

He added that overall the crop is looking fairly normal.

Manitoba sunflowers are moving steadily towards harvest, but those in the know say it's still too early to say what yields might look like.

"Right now we are mostly at the R8 stage... a few fields just being desiccated now and those fields that are being desiccated now should come off in the next couple of weeks," said Rex. Backs of sunflower heads are yellow and bracts are starting to brown, with some basal stalk rot evident, according to Manitoba Agriculture.

## SLEEPING GIANTS



These tower tops for the new Bipole III line await lifting into place. PHOTO: SANDI KNIGHT



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# Fighting European corn borer? Manitoba Agriculture wants to hear from you

There's been no Bt resistance yet in Manitoba's European corn borer population, but entomologist John Gavloski is keeping a sharp eye out

BY ALEXIS STOCKFORD

Co-operator staff

**J**ohn Gavloski is back on the hunt for European corn borer (ECB).

The provincial entomologist hopes to collect 50-100 larvae from Carman-area fields this year, part of a long-standing project to monitor resistance to Bt (*Bacillus thuringiensis*), a toxin-producing bacteria and the most commonly cited ECB management method.

Bt is either used as a spray, much like other pesticides, or through Bt varieties, genetically modified to produce the toxic proteins. Larvae feeding on Bt corn die in short order.

"It's not a big study where I'm going to be having 20 different Manitoba fields or anything," he



European corn borer has been a sporadic problem in Manitoba since the pest was discovered here in 1948. PHOTO: MANITOBA AGRICULTURE

said. "I usually like to collect from two to three fields, but if I hit the jackpot with a particular field and the other fields don't have much, I'll do all my collecting from that one field."

The researcher has put out the call for producers growing non-Bt corn and who have preferably not sprayed for the pest to participate in the study.

Once collected, larvae will be sent to Guelph, Ont., to be

exposed to Bt corn in a controlled setting. Survival is then measured.

Pam de Rocquigny, general manager for the Manitoba Corn Growers Association, says the pest is a fluctuating concern for producers.

"It does vary and it tends to occur within pockets, almost, throughout the province in any given year," she said. "Infestations can be quite vari-

**"I usually like to collect from two to three fields, but if I hit the jackpot with a particular field and the other fields don't have much, I'll do all my collecting from that one field."**

**JOHN GAVLOSKI**  
Manitoba Agriculture entomologist

able from year to year, so in some areas they could have substantial issues whereas other areas you'll rarely see litter or no damage."

Central Manitoba reported high ECB populations in the previous three years, with levels rising above economic thresholds in both 2014 and 2015.

As its name suggests, the corn borer larvae buries into stalks, causing them to break easily.

"Another type of damage is

ear drop where cobs fall to the ground," Manitoba Agriculture states on its website. "The final type of damage may be the least obvious but can cause significant yield loss. By restricting nutrient flow in the plant, yield is affected by the production of smaller cobs."

Pinhole damage has also been noted on the plant's exterior and may be the first sign of infestation as the young larvae feed on the surface of the plant in the first days after hatching.

The pest overwinters in cornstalks and field residue before pupating and emerging as an adult moth in spring.

## Monitoring resistance

Manitoba's population shows no resistance at this time, Gavloski said.

The grain industry hopes to keep Manitoba's resistance-free record. Experts have advised farmers to include "refuges," sacrificial plants that do not produce Bt and provide limited habitat for the pests to lower resistance pressure.

"There's always some people who aren't complying, but I think for the most part people are aware that they need to have a refuge and most are doing it and nowadays a lot of the corn that people buy has what is called a blended refuge, where the susceptible variety is blended right in," Gavloski said.

Manitoba Agriculture notes that in-season treatment is only effective during the first two larval instars, a window that closes within seven to 10 days of eggs hatching. After that, larvae tunnel into the safe haven of the corn-stalk and will be unaffected by Bt sprayed on the surface of the plant.

In 2014, Bt varieties accounted for 42.9 per cent of grain corn acres and 15.1 per cent of silage corn. The next year, the Manitoba Agricultural Services Corporation reported that about 44.9 per cent of grain corn was a Bt variety, while silage acres dropped to 13.9 per cent.

That's a jump from the 2011-13 era, when resistant grain corn acreages dropped to a 26.8 per cent low, but remains low compared to acres planted in the late 2000s. From 2007-10, an average 58.5 per cent of grain corn acres went to Bt varieties, peaking at 63.9 per cent in 2007.

Silage corn climbed from 10.8 per cent of acres in 2007 to over 17 per cent for the next five years, peaking in 2011, when Bt varieties made up 21.2 per cent of acres.

Producers wishing to participate in the study can contact Gavloski at 204-745-5668, by email at john.gavloski@gov.mb.ca or contact the Manitoba Corn Growers Association main office.

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## CROP REPORT

# Rain delays harvest progress

Manitoba Agriculture crop report, issued September 18, 2017

## **Southwest Region**

Harvest activities were halted on the weekend due to rain amounting to 12 to 40 mm. Nighttime temperatures are cool, but no frost reported.

Spring cereal harvest is 95 to 100 per cent complete with just the odd field of barley or oats remaining. Yield and quality are very good to excellent.

Canola harvest is 60 to 70 per cent complete, with the majority remaining straight-cut canola. Canola yields are reported average to above average with good quality. Some reports of green seed due to dry weather after swathing.

Flax fields continue to be desiccated in preparation for harvest. Some flax has been harvested.

Soybeans are in the R7 to R8 (brown pod/mature) stage of development and most early varieties are mature. Some early varieties have been harvested.

Sunflowers are in the late-R8 to early-R9 stage. Corn silage harvest has begun with average to above-average yields.

Winter wheat and fall rye seeding is ongoing.

Some light field work and weed control measures continue in harvested fields.

Pastures that have deteriorated due to dry conditions will benefit from this past week's rainfall. Most producers have been moving cows to fall grazing. Some producers have begun to wean calves.

## **Northwest Region**

Warm daytime temperatures allowed harvest to progress well, although cool overnights and morning dew delayed morning operations. Over the past week Roblin received six mm of precipitation, Swan River 15 mm, Dauphin area 13 to 25 mm, and trace rainfall in The Pas. There was a hard frost in the northern part of the region on Sunday.

Spring wheat harvest is 90 to 100 per cent complete, with yields of 75 to 80 bu./acre around Roblin and 60 to 90 bu./acre around Swan River. Barley and oat harvest is generally complete with reports of oats yielding 150 bu./acre and barley yielding 100 bu./acre in the Roblin area.

Canola harvest has also been progressing steadily with 65 per cent of the fields combined around Swan River, and yields of 50 to 60 bu./acre. Canola is 85 per cent harvested around Roblin with yields of 50 to 60 bu./acre. There was good progress on the canola harvest this week around McCreary, Dauphin, and Ste. Rose with only a small amount remaining.

Soybeans and fababeans are approaching maturity with most fields still standing. Pea harvest is complete with yields ranging from 60 to 75 bu./acre in the Roblin and Swan River areas. The flax crop is ripening but harvest operations haven't yet begun. Field work on harvested fields is well underway.

Silage corn is in the dent stage.

Rainfall over the past weekend will benefit forage stands. Generally, pastures are adequate with minimal supplementation required to meet the nutritional needs of cows.

## **Central Region**

The first part of the week was sunny and warm with record-high temperatures. Rain at the end of the week and through the weekend resulted in 15 to 25 mm of precipitation. Topsoil moisture conditions have improved, but subsoil moisture remains low.

Cereal crop harvest is 95 to 100 per cent complete. Early yield reports: hard red spring wheat 55 to 100 bu.; northern hard red wheat 80 to 100 bu.; barley 75 to 120 bu.; oats 110 to 180 bu. Quality, test weight and falling numbers are generally reported as excellent. Protein in wheat is generally average to below average.

Swathing of canola is complete. Western areas report 95 per cent of the canola is harvested, while eastern areas are at 100 per cent complete. Canola yields range from 40 to 65 bu./acre, with very good quality. Harvested seed moisture levels are lower than normal given the dry harvest conditions.

Flax harvest is underway; early yield reports are 27 to 32 bu./acre. Straw is being baled and moved.

Corn is advancing rapidly with warmer weather conditions. Most fields are in the dent stage, with some early varieties approaching physiological maturity.

Field pea harvest is complete, with above-average yields ranging from 50 to 90 bu.

Brown pod has been reached in many soybean fields; a good number of fields have been harvested. Early yield reports range from 28 to 40 bu./acre. Moisture levels in harvested seed have been lower than normal causing some seed cracking.

Harvest has started in edible beans. Yields are reported to be 1,800 to 2,000 lbs./acre for pintos, and 2,000-plus lbs./acre for cranberries.

Backs of sunflower heads are yellow; bracts are starting to brown. Some basal stalk rot is evident.

Harvest preparation in potatoes continues; harvest will begin shortly.

Post-harvest harrowing and cultivating operations have begun, but in many cases are limited due to dry topsoil. Scraping for surface drain maintenance is underway.

Soil sampling is underway and early results show low soil nitrogen levels remaining given the high-yielding crop. Fall fertilization is starting.

Straw is being baled and stacked/hailed off fields; yields are above average.

Second-cut hay is complete. Yields are below average due to dry conditions. Wild hay harvest continues. Pastures continue to deteriorate.

Pastures on lighter-textured soils, and overstocked pastures are browning off.

## **Eastern Region**

Last week's weather was conducive to good harvest progress with seasonal to above-seasonal temperatures until Friday when daytime temperatures cooled significantly and sporadic showers began. Rainfall amounts over the weekend varied from 10 to 40 mm across the Eastern Region, delaying field operations. Average soil moisture conditions on cropland across the region were rated as 85 per cent adequate. Soil moisture conditions on hay and pasture land were rated at 10 per cent adequate, 40 per cent short and 50 per cent very short. The driest soil conditions are in the southern districts.

Spring wheat harvest is nearing completion in the region, with average yields in the 65 bu./acre range. Wheat protein is averaging between 11 and 13 per cent for the overall crop. Oat yields are in the 150 bu./ac range. Canola harvest is ongoing with approximately 95 per cent of the crop harvested. Yields are in the 45 to 55 bu./ac range.

Soybean harvesting continued last week but was sporadic with the presence of green seeds limiting which field could be done. In some cases, portions of fields have been harvested. Soybeans are currently in R8/drydown or late-R7 growth stages. Yields reported range from 20 to 36 bu./acre. Sunflowers were

in the R8 growth stage and remained in overall good condition. Corn stage ranges from dent to early physiological maturity depending on the hybrid and area it is being grown. Fall tillage and fertilizer applications were also ongoing last week until the weather put a stop to progress.

Pastures are in rough shape and livestock are being moved to hayfields or are being fed on pasture. Some producers are fencing hayfields to graze. Dugouts are low and a few producers are cleaning and making dugouts bigger.

## **Interlake Region**

Rain and cooler conditions have stalled harvest in the region. Rainfall this past week has varied from 11 to 21 mm. Very light frosts (-0.1 to -0.8 C) were reported overnight on Sunday at Moosehorn and Narcisse.

Cereal harvest continues with over 95 per cent harvested in the south Interlake. Some ergot, but levels are low. In the north Interlake, spring wheat harvest is 85 per cent complete, while oat and barley are 95 per cent complete. Yields of cereals there are quite good with wheat yielding 65-plus bu./acre, barley 120-plus bu./acre, oats 125-plus bu./acre, fall rye 100-plus bu./acre.

The majority of canola is harvested in the south Interlake with combining approximately 95 per cent complete and yields ranging from 40 to 65 bu./acre. A few

fields left for straight cutting remain. In the north Interlake canola harvest is near 75 per cent complete, with yields from 30 to 50 bu./acre.

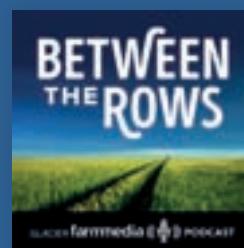
Leaf colour change and leaf drop are noticeable in many soybean fields, and change is rapid with dry conditions/frost. In the south Interlake soybeans are yielding around 30 bu./acre with some green seeds showing up in the sample. Very little soybeans have been harvested in the north Interlake. There appears to be some frost damage on some fields. Most fields in R6 to R7+ stage.

Sunflowers are maturing, backs of heads are yellowing and bracts are starting to brown. Sunflower desiccation has started.

Desiccation of alfalfa seed fields is ongoing. Seed set seems variable, and late vegetative growth is minimal which should help with desiccation results and harvest. Some forage seed fields are being taken out of production due to abundance of supply in the marketplace.

Little post-harvest weed control is being done as there is little green growth. Soils are working up lumpy, so tillage is being delayed. No reports of fall fertilization to date.

Soil moisture conditions across the region on cropland are rated as 25 per cent adequate and 75 per cent short, while conditions on hay and pasture are rated as 15 per cent adequate and 85 per cent short.



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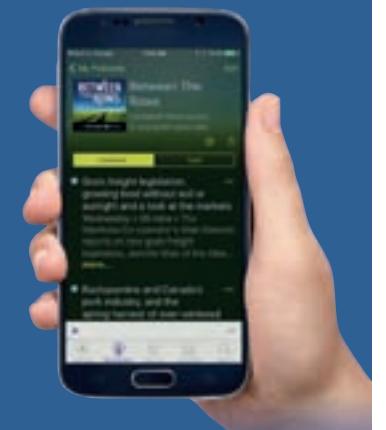
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# Choosing the right inoculant strategy

After some disappointing results this season, one pulse crop specialist says it's time to take a hard look at these practices

BY DON NORMAN  
Co-operator contributor

**M**anitoba Agriculture pulse crop specialist Dennis Lange says it's a good time to think about just what's the right approach regarding inoculants for pulses.

"This year I've had a few calls on peas and soybeans from western Manitoba where they are finding very poor nodulation," Lange told the *Co-operator* in a recent interview.

He says that while it is fresh in the minds of farmers, they should think about what will work best for them to avoid this in the future.

"Nodulation," for the uninitiated, refers to the bacterial growths (nodules) on the roots of crops that have been infected with inoculants (a live rhizobia bacteria treatment). The rhizobia feed off the plant roots, and the process takes nitrogen from the air and carbohydrates from the root to create fertilizer that in turn feeds the plants.

When the nodules are functioning properly during the growing season they are blood red inside. The roots usually start nodulating in the second or third trifoliolate and once they hit full flower, there should be lots of nodules on the plant (approximately 10 per root).

"But the number of nodules is not as important as if they are functioning," Lange said. "You can have five nodules on a plant and if they're nice and pink inside and

the field is nice and green then you're good. But we've had years when you start digging up roots and you're not finding any," he says. "That becomes a problem because the plant eventually runs out of nitrogen."

Avoiding poor nodulation requires a well-thought-out strategy that starts with determining which treatments or treatment is best for a given field. There are a number of things that growers must consider while developing their inoculants strategy.

Firstly as most farmers know, the same rhizobia that creates nodules on soybeans, will not create them on fababeans, or lentils. So, it's important that farmers make sure the bacteria are matched up to the crop that's being grown.

The next consideration is the method of delivery. There are three different methods to apply inoculants: a liquid application, a peat application and a granular application.

"Typically the applications are done at seeding time," Lange said.

The peat is a sticky powder that adheres to the seed. The liquid is sprayed on the seed and it dries. The granular inoculant is poured in the furrow beside the seed and eventually it will find the roots and infect them. Each has its benefits and its drawbacks in terms of cost, durability and ease of use.

Liquid inoculant scores high in the ease-of-use category because it can be applied to the seed before planting, but it can also be more prone to desiccation. The

**"This year I've had a few calls on peas and soybeans from western Manitoba where they are finding very poor nodulation."**

DENNIS LANGE  
Manitoba Agriculture

peat and granular methods are less prone to desiccation and offer higher rhizobia survival rates. Peat is a little messier to apply. Granular is the most expensive, but most durable of the three. Deciding which formulation to use will depend on soil moisture, nitrogen levels, field history and economic factors.

The final consideration is whether multiple applications are advisable.

"The biggest thing that I encourage growers to do, is to know your history," says Lange. "Once you've grown soybeans multiple years on a field, the bacteria become more natural."

The bacteria are not normally found in Manitoba but when applying these bacteria every year you plant soybeans, you get some natural carry-over. If you have grown soybeans multiple times on a piece of ground, you can probably use a liquid, single-treat inoculant."

Lange recommended that farm-



Growers of soybeans and other pulse crops need to know both if nodules are present in acceptable number, and if they're functioning properly.

PHOTO: UNIVERSITY OF NEBRASKA

ers check the *Soybean Fertility Fact Sheet*, that can be downloaded from the Manitoba Pulse & Soybean Growers Association website. It has a checklist that will determine whether any given field is a candidate for single inoculation or not.

"If you use just a liquid on seed and it's a really wet year and you don't have a history of soybeans on the field, you will see some nodulation failures on some fields," says Lange. "It's never widespread. But every year, I always get a few calls."

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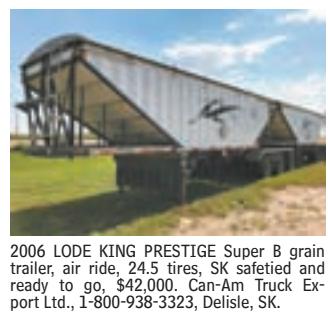
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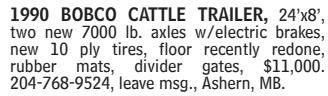
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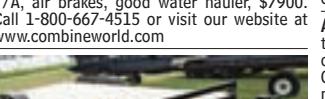
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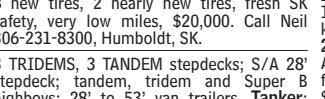
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1677



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2012 FREIGHTLINER CASCADIA day cab, DD15-505 HP, 13 spd., 798,000 kms., \$42,900. Norm 204-761-7797 Brandon MB.

1999 KENWORTH W900. Online Only Unreserved Auction Oct. 11-17th. Info call 306-865-7660. [www.championassets.ca](http://www.championassets.ca)1998 PETERBILT 379. Online Only Unreserved Auction Oct. 11-17th. Info. call 306-865-7660. [www.championassets.ca](http://www.championassets.ca)

2005 KENWORTH T800, Cat C13, 425 HP 13 spd Jake, diff lock, wet kit, 500,000 kms, fresh safety, ready to go! 59,900s Cam-Don Motors 306-237-4212 Perdue SK



2015 INTERNATIONAL LONESTAR, eng./emission warranty till 2020, 270,000 kms, 550 ISX Cummins, 46 rears, 3.90 ratio, 4-way lockers, much, much more, incl. 2.5 yrs warranty left. No reasonable offer refused, \$130,000 OBO. More info. Dan 306-233-7488, Wakaw, SK.

SANDBLASTING AND PAINTING of heavy trucks, trailers and equipment. Please call for details. Can-Am Truck Export Ltd., 1-800-938-3323, Delisle, SK.

TWO 2007 IHC 9400, Cat 500, 18 spd., 46 rears and lockers, 51" sleepers; (2) 2009 Mack, 485 HP 18 spd., 46 rears and lockers, 51" sleeper; 2008 Freightliner, 515 HP, 18 spd., 46 rears and lockers, wet line kit. Yellowhead Sales 306-783-2899, Yorkton.

**CONSULTING**

2901

**SEMI TRUCKS**

1677

**KENWORTHS:** 2007 T800 500 Cat 18 spd., 46 diff. lockers; 2009 T660, new pre-emption, 525 ISX, new 18 spd. and clutch, 46 diff. lockers; 2008 T800 **daycab**, 500 Cat, 18 spd., lockers, new clutch and trans; 2014 Western Star 4900, 46 diff. Detroit, 18 spd., 4-way locks; 2008 Freightliner Cascadia, **daycab**, Detroit 515, 18 spd., lockers; 2007 IH 9900i, 525 ISX, 18 spd., 3-way lockers; 2007 IH 9200 **daycab**, 450 ISX, 13 spd., 1996 T800, Cat, 13 spd., rebuilt trans., diff. and injectors; 2006 Pete 379, **daycab**, 500 Cat, 18 spd., lockers, new rebuilt eng., new clutch; 2005 Mack CH613, 18 spd., lockers, wet kit, 450,000 kms; 2-1996 FLD 120 Freightliners, 425 Cat, 430 Detroit, lockers. Ron Brown Implements, Delisle, SK, 306-493-9393. DL 905231. [www.rbisk.ca](http://www.rbisk.ca)BAILIFF SEIZURE AUCTION, 2008 48' Great Dane, Thermo King Reefer, 19,240 hrs., excellent condition. Saskatoon, SK. [bailiffservices@sasktel.net](mailto:bailiffservices@sasktel.net)**NEED LEASING OR FINANCING** for all types of equipment? Call Horizon Leasing at 306-934-4445. Saskatoon, SK.**SPECIALIZED TRUCKS**

1680

1975 GMC TREE Spade truck, 350 auto, with Vermeer TS44T, clean unit, 73,000 kms, \$21,000. 306-276-2080, Nipawin, SK.



2007 KW T800 Boom Truck, 40 ton, WBA Unit Model WHL-40T C97, 14,670 hrs., 5th wheel, new MB safety, crane has new inspection, state DOT, headache rack, wet kit, knuckle boom crane, excellent cond., \$249,500. 204-743-2324, Cypress River.

DECKS, DRY VANS, reefers and storage trailers at: [www.Maximinc.Com](http://www.Maximinc.Com) or call Maxim Truck & Trailer, 1-888-986-2946.1994 WESTERN STAR 4964F Crane truck, 584,000 kms, T/A, Cat 3406, Eaton 18 speed, Ferrari 8300 Kg crane, fresh weight, \$19,800. Call 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)**CONSULTING**

2901

2003 FORD F750 Refuse truck, 169,642 kms, side load, 25 cubic yd. A/T, Cummins 5.9L, \$13,800. Call 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)**CONSULTING**

2901

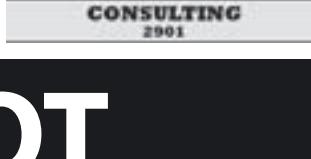
2000 FORD F550 XL S/A, 579,720 kms, 7.3L, 5 speed standard, 16' van body with powered tailgate, \$9980. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)**CONSULTING**

2901

Syd

**SPECIALIZED TRUCKS**

1680

1998 GMC T6500 COE, 686,000 kms, S/A, 3116 Cat, Eaton manual, 16' van body, excellent condition, \$9980. 1-800-667-4515. [www.combineworld.com](http://www.combineworld.com)2008 IH 7600 tandem 24' van body, power tailgate, 10 speed ISX; 2007 Freightliner auto. trans., 24' flatdeck. Ron Brown Imp. 306-493-9393, Delisle, SK. DL #905231. [www.rbisk.ca](http://www.rbisk.ca)**DECKS, DRY VANS, reefers and storage trailers at: [www.Maximinc.Com](http://www.Maximinc.Com) or call Maxim Truck & Trailer, 1-888-986-2946.**2000 FORD F550 XL S/A, 579,720 kms, 7.3L, 5 speed standard, 16' van body with powered tailgate, \$9980. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)**DECKS, DRY VANS, reefers and storage trailers at: [www.Maximinc.Com](http://www.Maximinc.Com) or call Maxim Truck & Trailer, 1-888-986-2946.****CONSULTING**

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2003 FORD F750 Refuse truck, 169,642 kms, side load, 25 cubic yd. A/T, Cummins 5.9L, \$13,800. Call 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)**CONSULTING**

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2000 FORD F550 XL S/A, 579,720 kms, 7.3L, 5 speed standard, 16' van body with powered tailgate, \$9980. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)**CONSULTING**

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2000 FORD F550 XL S/A, 579,720 kms, 7.3L, 5 speed standard, 16' van body with powered tailgate, \$9980. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)**CONSULTING**

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2003 FORD F750 Refuse truck, 169,642 kms, side load, 25 cubic yd. A/T, Cummins 5.9L, \$13,800. Call 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)**CONSULTING**

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**CONSTRUCTION EQUIP.**

CAT 435 HYDRAULIC Scraper, 15 cubic plus yards, very good condition, \$32,000. Call 204-638-1722, Dauphin, MB.

**2003 JD 310 SG BACKHOE.** Online Only Unreserved Auction Oct. 11 - 17. Info. call 306-865-7660. [www.championassets.ca](http://www.championassets.ca)

**CAT 966E w/WBM QA** wheel loader. Online Only Unreserved Auction Oct. 11- 17. 306-865-7660. [www.championassets.ca](http://www.championassets.ca)

**CAT D8H DOZER.** Online Only Unreserved Auction Oct. 11- 17th. Info. call 306-865-7660. [www.championassets.ca](http://www.championassets.ca)

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**1998 CAT D6R** twin tilt angle dozer and ripper, good undercarriage. Phone 306-278-7740, Prairie River, SK.

**SKIDSTEER ATTACHMENTS:** Buckets, rock buckets, grapples, weld-on plates, hyd. augers, brush cutters and more large stock. Top quality equipment, quality welding and sales. Call Darcy at 306-731-3009, 306-731-8195, Craven, SK.

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**2006 JD 270C LC** hyd. excavator, 10,464 hrs., 12' stick, Q/C bucket, \$69,800. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)



**2006 KOBELCO SK290LC** excavator, 5708 hrs., tracks and undercarriage 75%, digging bucket, nice condition, \$59,800. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)



**1986 GRADALL G660C** wheeled excavator, 7605 mi./4404 excavator hrs, GM 8.2L ft/4.7L rear engines, air brakes \$14,900. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)



**2005 NH LV80** Skip loader, 1477 hours, 75 HP, 2 WD, FEL, 3 PTH, 7' box scraper with scarifier, canopy, \$19,800. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)



**2008 GENIE S45** Boom Lift, 4048 hrs., 45' lift, Deutz diesel, 8' platform, 500 lbs. capacity, \$23,800. Call 1-800-667-4515 or visit: [www.combineworld.com](http://www.combineworld.com)



**2000 BOMAG BW90AD-2**, vibratory roller, 1100 hrs., Kubota diesel, 36" drums, \$11,900. Phone 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)



**1997 CAT D6M LGP DOZER**, UC 80%, 28" pads, 3 shank hyd. ripper, ROPS w/cage, 19,274 hrs., don't let the hrs. scare you, very nice unit! \$74,800. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)

**CONSTRUCTION EQUIP.**

**3600**



**1978 CHAMPION 740** motor grader, Detroit 6 cylinder, showing 2568 hours, 14' Moldboard, scarifier, cab, new rear tires, \$19,800. Call 1-800-667-4515, or visit: [www.combineworld.com](http://www.combineworld.com)



**2013 VOLVO L50G-TP/S** wheel loader, 1323 hrs., 117 HP hyd. quick attach, auto leveling, excellent condition, \$89,900. 1-800-667-4515, [www.combineworld.com](http://www.combineworld.com)



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**LEON 550 SCRAPER**, good cond., \$12,000 OBO. 306-931-2587, 306-260-3407, No Sunday Calls. Martensville, SK.



**HYDRAULIC PULL SCRAPERS** 10 to 25 yds., exc. cond.; Loader and scraper tires, custom conversions available. Looking for Cat cable scrapers. Quick Drain Sales Ltd., 306-231-7318, 306-682-4520 Muenster SK

**HYDRAULIC SCRAPERS:** LEVER 60, 70, 80, and 435, 4 to 30 yd. available. Rebuilt for years of trouble-free service. Lever Holdings Inc. 306-682-3332 Muenster, SK.

1980 D6D DOZER, wide pad, winch; 1993 D37 P6 6-way dozer, cab. 306-304-1959. Goodsoil, SK.

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**1990 CHAMPION 740** Grader, exc. cond., new rubber, new AC system, perfect glass. [baillifservices@sasktel.net](mailto:baillifservices@sasktel.net) Saskatoon, SK.

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4160**

**1991 CASE 1680**, Cummins engine, specialty rotor, hopper topper, new rear tires, all updates, very good condition, c/w 1015 PU and 1020 30' Flex Header, \$19,500 OBO. 204-746-5671, Arnaud, MB.

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**2005 CIH AFX 8010**, 2378 eng. hrs., 1855 sep. hrs., fully loaded, mint cond., shedded \$110,000. 204-751-0046, Notre Dame MB.

**2013 CASE 8230**, duals, ext. auger, fine cut chopper, 640 sep. hrs., \$320,000. Trade or financing. 306-563-8765, Canora

**1994 CIH 1688** with specialty rotor, hopper topper, internal chopper and 1015 PU, \$15,000. Call 306-483-8323, Carnduff, SK.

**2000 CASE/IH 2388** w/1015 header, \$55,000; **2004 2388** w/2015 PU header, \$115,000; **2006 2388** w/2015 PU header, \$130,000. A.E. Chicoine Farm Equipment, 306-449-2255, Storthoaks, SK.

**2007 CASE/IH 7010**, dual wheels, w/2016 header, \$170,000. Call A.E. Chicoine Farm Equipment, 306-449-2255, Storthoaks, SK.

**1998 2388**, 4200 eng. hrs., 3200 threshing hrs., \$26,000; **2002 30' 1020 flex header**, \$9500, 306-567-3128, Bladworth, SK.

**1997 CASE/IH 2188**, 3000 sep. hrs., auto HHC, chopper plus ready cut chopper, hopper extension, very good tires, rock trap, long auger, 2015 Swathmaster PU header, excellent condition, \$29,500. 306-861-4592, Fillmore, SK.

**2012 CIH 8230**, 1301 eng. hrs., 868 rotor hrs., exc. field ready, **\$245,000 OBO**. 780-872-8209, 306-823-4456, Neilburg SK

**2006 CASE 2388**, w/straight cut header, 2409 original hrs., new eng. 3 yrs. ago, currently serviced Dec./16. Have WO records, one owner, field ready, \$80,000 firm. Ph 306-861-1015, Weyburn, SK

**2002 CASE/IH 2388**, PU, long auger, hopper topper, chopper, field ready, priced to sell! Call 306-654-7772, Saskatoon, SK.

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4160**

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**FORD/IH  
4172**

**2004 FORD/NH CR960 SP** combine, good and cheap, 1800 engine hrs. Everything works, used this year. Includes 36 Honeybee flex header and pickup head, Rake-Up pickup, very good condition, \$75,000. 406-765-7568, 406-765-1568, Plentywood, MT. Email: Campbellgrain@hotmail.com

**2011 CR9070 NH** combine, 1318 thres/1656 eng., 15' Swathmaster PU, \$30,000 in maintenance since harvest 2016, excellent condition, \$185,000. Call for details, 306-497-7511, Blaine Lake, SK.

**BOOKING NORCAN SOYBEAN Common #1**. Keep the gold in your tank, buy a bigger NH combine! Discounts on now! Call Norcan Seeds at 204-372-6552 Fisher Branch, MB.

**NH TR85, ONE OWNER**, 3600 hrs., hydro, electric stone trap, big tires, excellent condition, 204-867-5363, Minnedosa, MB.

**1995 TR97, 2471 threshing hrs.**, NH/Ford eng., Super 8 PU, good working cond., \$18,500. 204-546-2299, Grandview, MB.

**1994 TR97, 2681 thres/3630 eng. hrs.**, intake & exhaust valves done, Swathmaster PU, Redekopp chopper, hopper topper, \$15,500 OBO. 306-929-4580 Albertville SK

**NEW HOLLAND TR96**, shedded, MAV, Swathmaster, new rotors (\$5000), field ready, \$12,900. Cam-Don Motors Ltd. 306-237-4212, Perdue, SK.

**GLEANER  
4175**

**1985 GLEANER N7**; 1984 Gleaner N7 and 1984 Gleaner N6. All 3 combine are in excellent field ready condition. Phone 306-675-4419, Ituna, SK.

**GLEANER S77 SALVAGE**, duals, pickup and many good low hour parts still available. Call us now! 1-800-667-4515 or visit: www.combineworld.com

**2 GLEANER R7's** complete with PU, both work well. \$15,000 and \$10,000. 403-556-2609. Olds, AB.

**JOHN DEERE  
4178**

**1990 JD 843 Corn Head**, new rollers, shedded, good condition, \$7000 OBO. Please call 204-324-4240, Altona, MB. Email: Rschwartz4240@icloud.com

**2016 JD 5680 PRWD combine**, 372 hrs., 580/85R42s with duals, high wear pkgs., chopper w/PowerCast tailboard, 26' auger, PowerGard Warranty till September 2021, \$319,500 USD. www.ms-diversified.com Call 320-848-2496 or 320-894-6560.

**WRECKING: JD 8820** combine for parts. J M Salvage 204-773-2536, Russell, MB.

**JOHN DEERE  
4178**

**2011 9870**, loaded w/options, only 700 sep. hrs., \$214,500 Cdn OBO; **2010 9770**, loaded w/options, only 690 sep. hrs., \$209,500 Cdn OBO. Both excellent & only used on small grains. Call 218-779-1710.

**LATE MODEL S670, 680 & 690** combines, various hours and options. Starting at \$230,000 Cdn OBO. Call 218-779-1710. Delivery available.

**2 JD 8820 TURBO'S**: 1 with long auger, Rake-Up PU, chopper and spreader, asking \$14,500; 1 w/short auger, JD PU chopper and cyclone spreader, \$9500 OBO. Both shedded. 204-476-6907, Neepawa, MB.

**2005 CIH AFX 8010**, 2378 eng. hrs., 1855 sep. hrs., fully loaded, mint cond., shedded \$110,000. 204-751-0046, Notre Dame MB.

**2013 CASE 8230**, duals, ext. auger, fine cut chopper, 640 sep. hrs., \$320,000. Trade or financing. 306-563-8765, Canora

**1994 CIH 1688** with specialty rotor, hopper topper, internal chopper and 1015 PU, \$15,000. Call 306-483-8323, Carnduff, SK.

**2000 CASE/IH 2388** w/1015 header, \$55,000; **2004 2388** w/2015 PU header, \$115,000; **2006 2388** w/2015 PU header, \$130,000. A.E. Chicoine Farm Equipment, 306-449-2255, Storthoaks, SK.

**2007 CASE/IH 7010**, dual wheels, w/2016 header, \$170,000. Call A.E. Chicoine Farm Equipment, 306-449-2255, Storthoaks, SK.

**1998 2388**, 4200 eng. hrs., 3200 threshing hrs., \$26,000; **2002 30' 1020 flex header**, \$9500, 306-567-3128, Bladworth, SK.

**1997 CASE/IH 2188**, 3000 sep. hrs., auto HHC, chopper plus ready cut chopper, hopper extension, very good tires, rock trap, long auger, 2015 Swathmaster PU header, excellent condition, \$29,500. 306-861-4592, Fillmore, SK.

**2012 CIH 8230**, 1301 eng. hrs., 868 rotor hrs., exc. field ready, **\$245,000 OBO**. 780-872-8209, 306-823-4456, Neilburg SK

**2006 CASE 2388**, w/straight cut header, 2409 original hrs., new eng. 3 yrs. ago, currently serviced Dec./16. Have WO records, one owner, field ready, \$80,000 firm. Ph 306-861-1015, Weyburn, SK

**2002 CASE/IH 2388**, PU, long auger, hopper topper, chopper, field ready, priced to sell! Call 306-654-7772, Saskatoon, SK.

**2005 CASE/IH 8010**, chopper, PU header, duals, very nice condition, priced to sell! Call 306-654-7772, Saskatoon, SK.

**2014 FORD LEXION 4160**

**2014 760TT**, loaded 700/1000 hrs., \$325,000 Cdn OBO; **2014 760**, 600/900 hrs., RWA duals, exc. cond., \$285,000 Cdn OBO; **2011 750**, 900/1400 hrs., duals exc. cond., \$189,500 Cdn OBO; **2010 560R**, only 500 sep. hrs., exc. cond., field ready, \$159,500 Cdn OBO; **2006 590R**, 1800/2900 hrs., loaded, duals, RWA, \$99,500 Cdn OBO; **2013 MacDon FD75**, 35' flex draper, exc. cond., \$65,500 Cdn OBO. Delivery available. 218-779-1710.

**CAT LEXION 580R**, 1377/1909 hrs. Sunnybrook impeller in Aug 2017, CEBIS/laser guide, Outback steering, loaded module, 36' MacDon 974FD Header, \$218,000. 306-268-7400, 306-268-7550, Bengough.

**LEXION 400 & 500 Salvage**, wide & narrow body, walker & rotary. Lots of parts! 1-800-667-4515, www.combineworld.com

**FORD/IH  
4172**

**2004 FORD/NH CR960 SP** combine, good and cheap, 1800 engine hrs. Everything works, used this year. Includes 36 Honeybee flex header and pickup head, Rake-Up pickup, very good condition, \$75,000. 406-765-7568, 406-765-1568, Plentywood, MT. Email: Campbellgrain@hotmail.com

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**BOOKING NORCAN SOYBEAN Common #1**. Keep the gold in your tank, buy a bigger NH combine! Discounts on now! Call Norcan Seeds at 204-372-6552 Fisher Branch, MB.

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**1995 TR97, 2471 threshing hrs.**, NH/Ford eng., Super 8 PU, good working cond., \$18,500. 204-546-2299, Grandview, MB.

**1994 TR97, 2681 thres/3630 eng. hrs.**, intake & exhaust valves done, Swathmaster PU, Redekopp chopper, hopper topper, \$15,500 OBO. 306-929-4580 Albertville SK

**NEW HOLLAND TR96**, shedded, MAV, Swathmaster, new rotors (\$5000), field ready, \$12,900. Cam-Don Motors Ltd. 306-237-4212, Perdue, SK.

**2 JD 8820 combines**, one w/new motor, one has been shedded, both field ready, 780-205-8100 leave msg., Lashburn, SK.

**2011 JOHN DEERE 9870 STS** - used, Stock #192087, \$207,000. 306-773-9351, Swift Current, SK. www.pattisonag.com

**2013 JD S690 w/615P**, 713 sep. hrs., Stock #10070, \$389,500. 306-682-2572, Humboldt, SK. www.pattisonag.com

**2014 JOHN DEERE S690**, Stock #187781, \$385,000. 306-542-2815, Kamsack, SK. www.pattisonag.com

**2009 JD 9870 STS**, sep. hrs. as is, 1560 sep. hours, \$175,000. Call 306-334-2492, Balcarres, SK. cpctrichuk@maplefarm.com

**2007 JD 9660 combine**, Stock #187362, \$125,000. 306-542-2814, Kamsack, SK. www.pattisonag.com

**2011 JOHN DEERE 9870 STS** - used, Stock #192085, \$207,000. 306-773-9351, Swift Current, SK. www.pattisonag.com

**2013 JD 9770** used, 1629 sep. hrs., Stock #9403, \$182,500. 306-375-2302, Kyle, SK. www.pattisonag.com

**2019 NH TR97**, great condition, \$15,000. Call 306-254-1799, Altona, MB. Email: Campbellgrain@hotmail.com

**2014 NH CR960**, 2378 eng. hrs., 1500 sep. hrs., \$175,000. Call 306-334-2492, Balcarres, SK. cpctrichuk@maplefarm.com

**2011 NH CR960**, 2378 eng. hrs., 1500 sep. hrs., \$175,000. Call 306-334-2492, Balcarres, SK. cpctrichuk@maplefarm.com

**2013 NH CR96**



**AIR SEEDERS**  
4253

2009 SEEDMASTER, 4 product VR, 50', 12" 8370XL 440 bu Morris TBH, 1600 lqd cart, Raven monitor, \$195,000. 306-335-7494.

**HARROWS/PACKERS**  
4256

2013 RITE-WAY heavy harrow, 90', 20"-24" x 5/8" tires, adjustable pressure and angle, \$31,900. 306-948-7223, Biggar, SK.



2017 MORRIS 70' & 50' heavy harrows, 9/16x28" tires. Lease and financing available. Call Cam-Don Motors Ltd., 306-237-7667, Perdue, SK.

**TILLAGE EQUIPMENT**  
4262

2006 SUMMERS SERIES 10 38' diamond disc, bought new in 2008, \$49,500 OBO. 204-461-0192, St. Francois Xavier, MB. Seanbraun1@gmail.com

AERWAY CCT 15' tool bar, new bearings, field ready, good condition, \$25,000 OBO. 306-690-8105, Moose Jaw, SK.

JOHN DEERE 210 tandem disc 15', good condition, \$3000. 403-870-0091, Prince Albert, SK. Email: gleia@wolffleia.ca

JOHN DEERE 230 tandem disc 23', good condition, \$4000. 402-870-0091, Prince Albert, SK. Email: gleia@wolffleia.ca

MAGNUM I MORRIS chisel plow, 43' shanks, 1 brand new \$246, 4 used \$123. \$738 takes all. 204-537-2455 Belmont, MB



2015 FARM KING 29' Disc, 10" spacing, used on 1000 ac., blades like new, \$49,500 can deliver. 204-743-2324, Cypress River.

BREAKING DISCS: KEWANEE, 14' and 12'; Rome 12' and 9'; Towner 16'; Wishek 14' and 30'. 2- DMI 7 shank rippers; 1-866-938-8537.

PARTING OUT: John Deere 1610 deep tillage. Shank assemblies \$25. For info. call 306-896-2845, Churbridge, SK.

IHC 6400 54' chisel plow, 12" spacing, new NH3, boots and openers, new hoses, new walking beam shafts. 306-862-7138 or 306-862-5993, Nipawin, SK.

2015 DEGELMAN PRO-TILL, 33', notch discs front & back w/rubber rollers; 2012 Degelman 70' Strawmaster, ext. wear tips, 3255 Valmar w/tarp, Valmar platform, only seeded 60 ac. canola, Odessa Rock-picker Sales, 306-957-4403, 306-536-5097

JOHN DEERE MODEL 337 disc, 35', very good condition, \$32,500. 306-643-2763, 306-648-7595, Gravelbourg, SK.

IHC #55 CHISEL plow, 37', NH3 attachment; IHC #55 chisel plow, 15'; IHC 4700 vibra chisel 31'. 306-369-7794, Bruno, SK.

MORRIS MAGNUM CULTIVATOR 45', \$5650. 306-946-7923, Young, SK.

COMPLETE SHANK ASSEMBLIES: JD 1610, Morris Magnum, \$135; JD 610, Morris Magnum II, \$185. 306-946-7923, Young, SK.

JD 1650 DT 51' Cultivator, \$3000+ on tires, hyd. rams, bearings, etc., 3-bar Degelman harrows. \$18,000. 306-493-7871, Harris, SK.

**TRACTORS****CASE/IH**  
4266

2001 MX120 w/loader; 2000 MX135; and 2008 Maxim 140 w/loader. 204-522-6333, Melita, MB.

2013 140A FARMALL Case/IH w/loader, 1800 hrs., \$82,000. A.E. Chicoine Farm Equipment, 306-449-2255, Storthoaks, SK.

2009 CIH 435, Outback guidance, 710/70 tires, rear weights, std. trans., 4 hyds., 1700 hrs., shedded, asking \$163,000. Phone 306-862-7138, 306-862-5993, Nipawin, SK.

2007 CIH STX380, powershift, PTO, deluxe cab w/leather, fully loaded, every option, 710x42 rubber, 3700 hrs., very clean, \$170,000. Curtis 306-873-7822, Tisdale, SK.

LIZARD CREEK REPAIR and Tractor. We buy 90 and 94 Series Case, 2 WD, FWA tractors for parts and rebuilding. Also have rebuilt tractors and parts for sale. 306-784-7841, Herbert, SK.

QUAD TRACK UNDERCARRIAGE parts in stock. Bogies, idlers, bearing, seals, tracks... in stock, factory direct, 1-800-667-4515, www.combineworld.com



2008 CIH 535 Quad Trac, 535 HP 5204 hrs., 16 spd. PS, weights, 30' tracks, new front tracks, nice cab, \$182,800. 1-800-667-4515, www.combineworld.com

2015 CASE/IH QT580 - as is, Stock #170699, \$435,000. 306-448-44687, North Battleford, SK. www.pattisonag.com

**JOHN DEERE**  
4295

2013 JD 9410R, 4WD, PS, 1480 hrs., 1000 PTO, high flow hyd. w/5 remotes, leather trim, premium HID lights, 620/70R42's, \$199,500 USD. www.ms-diversified.com Call 320-848-2496 or 320-894-6560.

BOOK NORCAN SOYBEANS Common #1 so you keep more green. Buy a bigger JD with the savings! Early discounts. Norcan Seeds at 204-372-6552, Fisher Branch, MB.

2003 JD 6920 MFWD, 160 HP front suspension, IVT transmission, 5700 hours, \$50,000. 204-648-7129, Grandview, MB.

**JOHN DEERE**  
4295

STEVE'S TRACTOR REBUILDER specializing in rebuilding JD tractors. Want Series 20s, 30s, 40s, 50s, 7000s to rebuild or for parts, pay top \$\$. Now selling JD parts. 204-466-2927, 204-871-5170, Austin, MB.

WRECKING FOR PARTS: JD 8850 4WD, c/w (8) 24.5x32 Goodyear Dyna Torque tires 80% tread, very good sheet metal. 1-877-564-8734, Roblin, MB.

2000 JD 7710, 5130 hrs; 2000 JD 8310; 2001 JD 7810; 2008 JD 7830, 5200 hrs. All MFWD, can be equipped with loaders. 204-522-6333, Melita, MB.

UTILITY TRACTOR: JD 6200, 2 WD, open station with loader. Call 204-522-6333, Melita, MB.

2010 JD 9630, 530 HP Michelin 800/70R38 tires, JD AutoSteer, \$239,000. 306-563-8765, Canora, SK.

2009 JOHN DEERE 9430, 4WD, 425 HP 24 spd., 4 hyds., 710/70R42 duals, 4257 hrs., original owner, nice condition, asking \$185,000. 306-725-4286, Bulyea, SK.

1995 JD 8100, MFWD, 840 loader, powershift, new tires, 9043 hrs., exc. cond., \$76,000. 306-472-7704, Woodrow, SK.

2007 9620 W/PTO, 4060 hrs., leather, 800 tires, 48 gal/min. dozer to sit avail. \$189,000. 306-948-7223, Biggar, SK.

1983 JD 4450 MFWD w/Eze-On FEL 2130 grapple, 15 spd PS, 3 hyds., 7925 hrs showing, 14.9-26F, 20.8832, duals avail. 306-283-4747, 306-291-9395 Langham, SK

1983 JOHN DEERE 8450 4WD, quad shift, PTO, 8200 hrs., \$22,250 OBO. 306-275-4446, St. Brieux SK.

1978 JD 8430, 4 WD, CAHR, big 1000 PTO, 18.4x34 duals, QuadShift, triple hyds. runs exc. \$10,800. 306-238-4590, Goodsoil, SK.

2015 JOHN DEERE 9570R tractor, Stock #187808, \$450,000. 204-734-3466, Swan River, MB. www.pattisonag.com

2015 JOHN DEERE 9470R - SPI Stock #168556, \$405,000. Call 306-547-2007, Preeceville, SK. wjaeb@maplefarm.com www.pattisonag.com

2015 JOHN DEERE 9570R tractor, Stock #187808, \$450,000. 204-734-3466, Swan River, MB. www.pattisonag.com

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## SWINE

## SWINE WANTED 5625



## POULTRY

## POULTRY VARIOUS 5740



## SPECIALTY

## ELK 5760

**NORTHFORK- INDUSTRY LEADER** for over 15 years, is looking for Elk. "If you have them, we want them." Make your final call with Northfork for pricing! Guaranteed prompt payment! 514-643-4447, Winnipeg, MB.

**BUYING ELK** for local and international meat markets. Paying up to \$12 per kg FOB plant. Phone Ian at 204-848-2498 or 204-867-0085.

**WANTED:** 400 plus bull elk and reindeer bulls. Shewchuk Seeds, Blaine Lake, SK. 306-497-3576 or text 639-317-4645.

## GOATS 5765

**BUCKLING'S** 4 MONTH to 1-1/2 yr. PB reg. Kiko and Boer crosses avail. 204-324-7941, St. Joseph, MB. Email: julisebr@sdnet.ca

## SPECIALTY LIVESTOCK EQUIPMENT 5783

**ELMER** 9000 HYDRAULIC Elk squeeze, self-contained. 306-862-5207, Nipawin, SK

## LIVESTOCK VARIOUS 5785

**COWS** WANTED for winter feeding, feed and space for 300 head. Call for details 306-360-7000, Guernsey, SK.

**CUSTOM FEEDING CATTLE:** Shortage of hay? Winter feeding for cows or finishing and backgrounding available. Organic or conventional. Please call Clem for prices, 306-862-7416, 306-767-2711, Tisdale, SK.

## LIVESTOCK EQUIPMENT 5790

**PRECAST FEED BUNK:** 10' long, large capacity, slick finish w/chamfered corners allows cattle to clean up feed while high back cuts down on feed waste. High quality, high strength rebar reinforced concrete for years of trouble free feeding! If one gets backed into and breaks it's easily replaced with a new 10' section, unlike poured in-place troughs. Will deliver anywhere in Sask and Alberta! \$315. Neilburg, SK. 306-823-3519, tracy@lconindustries.com www.lconindustries.com

**ONE SET EMASCULATOR,** \$150 OBO; One set of castrators, \$100 OBO. Both in very good cond. 204-782-6135, Arborg, MB.

**CRATE STYLE ELECTRONIC LIVESTOCK** Scale, with wheels that can be towed, like new condition; Also, bandsaw for cutting meat and a meat slicer. 204-383-5802, 204-383-0100, Woodlands, MB.

**KELLN SOLAR SUMMER/WINTER WATERING** System, provides water in remote areas, improves water quality, increases pasture productivity, extends dugout life. St. Claude/Portage, MB. 204-379-2763.

**SCHWARTZ SILAGE FEED WAGON,** working scales, excellent condition, \$12,000. 204-828-3483, 204-745-7168, Stephenfield, MB.

**WANTED: PORTABLE GRAIN** roller mixer with tank. Call 204-842-3692, Birtle, MB.

**SVEN-APOLLO ROLLERMILLS,** NEW and used, electric and PTO, all sizes, can deliver. Manitoba distributor direct. Call Randy 204-729-5162, Brandon, MB.

**RENN 12' 10 HP** rollermill, large rolls, new style, vg cond., half price of new, \$6500, can deliver; **Farmplex** PTO rollermill, vg cond., \$2950. 204-729-5162, Brandon, MB.

**1001 NDE VERTICAL** cutter mixer, good condition, \$25,000 firm; Vermeer 605M round baler, monitor, kicker, new PU, good condition, field ready, \$12,000 OBO. 306-335-7875, Lemberg, SK.

**2011 HIGHLINE 8100** Bale Processor, all ways shedded. 306-577-1956, Arcola, SK.

**FREESTANDING PANELS:** 30' windbreak panels; 6-bar 24' and 30' panels; 10', 20' and 30' feed troughs; Bale shredder bunks; Feeder panels; HD feed bunks; Feeders; All metal 16' and 24' calf shelters. Will custom build. 306-424-2094, Kendal, SK.

## LIVESTOCK EQUIPMENT 5790

**GREG'S WELDING:** Freestanding 30' 5 bar panels, all 2-7/8" drill stem construction, \$450; 24"x5.5' panels, 2-7/8" pipe w/5' 1" sucker rods, \$340; 24"x6' panels, 2-7/8" pipe with 6' 1" rods, \$365; 30' 2 or 3 bar windbreak panels c/w lumber. Gates and double hinges avail. on all panels. Beltng troughs for grain or silage. Calf shelters. Del. avail. 306-768-8555, Carrot River, SK.

**FFS - FUCHS FARM SUPPLY** is your partner in agriculture. Stocking mixer, cutter, feed wagons and bale shredders. We are industry leaders in Rol-Oyl cattle oilers. 306-762-2125, Vibank, SK. www.fuchs.ca

**CATTLE SHELTER PACKAGES** or built on site. For early booking call 1-800-667-4990 or visit our website: www.warmanhomecentre.com

**STEEL VIEW MFG.** Self-standing panels, windbreaks, silage/hay bunks, feeder panels, sucker rod fence posts. Custom orders. Call Shane 306-493-2300, Delisle, SK. www.steelviewmfg.com

**SVEN ROLLER MILLS.** Built for over 40 years. PTO/elec. drive, 40 to 100 bu./hr. Example: 300 bu./hr. unit costs \$1/hr. to run. Rolls peas and all grains. We regrove and repair all makes of mills. Call Apollo Machine 306-242-9884, 1-877-255-0187. www.apollomachinandeproducts.com

2002 521DXT CASE payloader with grapple fork. Call 306-773-1049 or 306-741-6513, Swift Current, SK.

**HI-HOG CATTLE SQUEEZE.** Call 306-773-1049 or 306-741-6513, Swift Current, SK.



## NOTICES 5925

## NOTRE DAME USED OIL &amp; FILTER DEPOT

**Southern, Eastern and Western Manitoba**

Tel: 204-248-2110

## ORGANIC PRODUCTS

## CERTIFICATION SERVICES 5943

**WANT THE ORGANIC ADVANTAGE?** Contact an organic Agrologist at Pro-Cert for information on organic farming: prospects, transition, barriers, benefits, certification and marketing. Call 306-382-1299, Saskatoon, SK, or info@pro-cert.org

## GRAINS 5947

## Bioriginal

Bioriginal Food & Science Corp. is actively purchasing:

- Organic Flax Seed
- Organic Hemp Seed and;
- Borage Seed

(from the 2016 crop year)

We are also contracting for the upcoming growing season.

For more information please contact:

Sandy Jolicoeur at (306) 975-9251 or email crops@bioriginal.com



## PERSONAL

## PERSONAL ADS

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# LIVESTOCK

HUSBANDRY — THE SCIENCE, SKILL OR ART OF FARMING

## BEYOND THE DUGOUT: The making of a watering system

Manitoba Beef and Forage Initiatives is testing the waters on a solar-powered pump system in both continuous and rotational grazing

BY ALEXIS STOCKFORD

Co-operator staff

Dugouts aren't always ideal, and farmers who run rotational grazing or lack surface water are looking for options to get their herd a drink.

For many, that means pipelines, although designing the details may quickly become complex. Will the system draw on nearby open water? Will it be piped from a yard site or pumped from a well? Will the pipes be buried or above ground? How will it be powered? How much area must it cover and how many animals will it service? How many outlets should the pump source?

The answers, according to researchers at the Manitoba Beef and Forage Initiatives (MBFI), will be largely farm specific.

MBFI tackled the problem in its latest round of research at the Brookdale site north of Brandon when it designed a solar-powered pipe system drawn from a nearby slough.

"In a wet cycle, we've had expanding wetlands in low areas on the farm, and so there's lots of surface water, but we weren't always able to access it or we've decided not to access it and fenced areas off. We needed an option that would deliver water to all corners of the pastures for us to be able to uniformly graze the farm," Glenn Friesen, industry development specialist with Manitoba Agriculture and one of the leads at MBFI, said.

Friesen added that producers might also opt for a pump system to maintain water quality.

Ranchers in Saskatchewan made headlines in July after dugout water quality was linked to more than 200 animal deaths, an estimated loss of \$300,000.

The deaths occurred at the height of this year's drought in southern Saskatchewan. Tests later showed that the water contained lethal levels of sulphate and high levels of dissolved solids.

### Comparing performance

This year, the MBFI waterer sourced about three-quarters of the Brookdale farm's 640 acres, including an ongoing study comparing continuous grazing to planned grazing (also called rotational grazing, adaptive grazing or mob grazing). The more intensive system drastically increases stock density within small paddocks. Animals move paddocks often to let land rest.

Depending on the system's intensity, paddocks can range from less than an acre to several acres, stock densities vary, and cattle may remain in a paddock for several days or only a



Manitoba Agriculture livestock specialist Ray Bittner explains the remote solar watering system at the Manitoba Beef and Forage Initiatives Brookdale site. PHOTOS: ALEXIS STOCKFORD

**"One of the biggest benefits of that watering system is that it's so flexible in terms of hooking up another line to go to a different paddock or, if it's already near a paddock, we can just drill a quick hole and put in a spigot and we can hook up a waterer within, like, 10 minutes."**

**PAM IWANCHYSKO**  
MBFI planned grazing project lead

few hours before being moved. The implications carry over into water management, as paddocks must all have a drinking source.

Pam Iwanchysko, research lead on the grazing system comparison, says MBFI's above-ground pipes are well suited to the frequent paddock moves.

"One of the biggest benefits of that watering system is that it's so flexible in terms of hooking up another line to go to a different paddock or, if it's already near a paddock, we can just drill a quick hole and put in a spigot and we can hook up a waterer within, like, 10 minutes," Iwanchysko said.

MBFI planned this year's paddock system and watering system alongside each other and laid lines where there was an anticipated need.

The plan hit a number of roadblocks once livestock arrived, however.

Researchers quickly found that the smaller watering troughs, while sufficient for short-term paddocks, did not meet the needs of the continuously grazed herd.

"The continuous cows, they

tend to travel more as a herd so they come all at once and one of the things that we did find was that the small watering trough wasn't sufficient enough for them because they were coming all at once," Iwanchysko said.

Two waterers were installed in 89 acres of continuously grazed land in an effort to mimic real-world circumstances.

"We were just trying to mimic, say, a dugout-in-one-big-pasture scenario," Iwanchysko said. "What we found was that if we had a small waterer there they would drink all of the water out of it and then tip it over and then we'd have water spewing all over the place."

Her team eventually upgraded the troughs in the continuous pasture to add more capacity and weight.

The number of solar panels, likewise, had to be tweaked as the pipeline system grew and it became apparent that more power was needed.

**Other sources**  
Ray Bittner, livestock specialist with Manitoba Agriculture and speaker at an MBFI field day Aug. 30, urged producers



Research co-ordinator Kristelle Harper (l) takes tour attendees through the Manitoba Beef and Forage Initiatives' planned grazing, one of the grazing systems fed by a remote solar waterer.

to weigh other options before jumping in on a solar system.

In particular, he noted, pipelines may be run from an existing yard.

"Generally, if you're trying to pasture on the same quarter section or even section of where your house is — if you can organize a system of underground pipelines, whether shallow or eight feet deep, it's probably a better idea because of lower maintenance, lower upkeep costs and more certainly that there is actually going to be water for the animals where you want to water them because the pipelines are more dependable," he said.

"I still support the use of solar, but it's better off in remote areas rather than close to the yard."

Bittner warned that large herds require larger systems and may quickly become expensive.

"You have to do a lot of calculating before you make the decision on what you're going to do," he said.

Piping at MBFI could have easily been attached to the Brookdale site's main water supply rather than using solar, Bittner said, but added that the research farm wanted to test out solar power for interested producers.

Ready to do your homework? It took most of the winter to plan the MBFI watering system, Iwanchysko said.

The researcher advised farmers to carefully consult with their solar equipment dealers to ensure the pumps, number of panels and overall system will meet their needs.

"I would basically present a farmer with the idea of actually getting an aerial photo and drawing and redrawing where you want to put those lines, because it wasn't a one-step process," she said. "We basically had to put some plans on paper, review them, (and then) replan out those lines."

*astockford@farmmedia.com*

## LIVESTOCK AUCTION RESULTS

Weight Category	Ashern	Gladstone	Grunthal	Heartland	Heartland	Killarney	Ste. Rose	Winnipeg
<b>Feeder Steers</b>	Sept. 13	Sept. 12	Sept. 12	Sept. 12	Sept. 13	Sept. 11	Sept. 14	Sept. 15
<b>No. on offer</b>	280	215*	110	661	1,291*	223*	275	660
<b>Over 1,000 lbs.</b>	n/a	n/a	120.00-160.00	n/a	n/a	n/a	n/a	145.00-168.00
<b>900-1,000</b>	166.00-178.50	174.50-177.75	130.00-168.00	170.000-183.00	169.00-180.50	n/a	n/a	155.00-183.00
<b>800-900</b>	176.00-189.50	150.00-188.50	140.00-185.00	178.00-190.00	184.00-194.00 (197.00)	n/a	180.00-192.50	170.00-196.00
<b>700-800</b>	185.00-206.00	100.00-200.75	140.00-176.00	195.00-208.00	188.00-207.00	180.00-192.00	193.00-207.00	180.00-205.00
<b>600-700</b>	197.00-206.00	155.00-208.00	150.00-179.00	197.00-214.00	192.00-214.00 (218.00)	195.00-209.00	195.00-212.00	190.00-207.00
<b>500-600</b>	n/a	129.00-214.50	190.00-205.00	200.00-218.00	200.00-220.00	200.00-212.00	200.00-217.00	205.00-218.00
<b>400-500</b>	200.00-216.00	190.00-244.00	208.00-239.00	215.00-230.00	210.00-228.00	210.00-225.00	n/a	200.00-245.00
<b>300-400</b>	n/a	241.00-247.00	212.00-278.00	n/a	n/a	n/a	n/a	230.00-270.00
<b>Feeder heifers</b>								
<b>900-1,000 lbs.</b>	n/a	n/a	n/a	155.00-172.00	150.00-169.00	n/a	n/a	130.00-167.00
<b>800-900</b>	165.00-178.25	131.00-175.50	n/a	165.00-177.00	165.00-176.00	160.00-170.00	172.00-178.00	150.00-175.00
<b>700-800</b>	173.00-181.25	172.00-179.50	n/a	173.00-186.00	173.00-186.25	165.00-176.00	176.00-185.00	158.00-186.00
<b>600-700</b>	171.00-184.00	151.00-180.50	n/a	180.00-191.00	175.00-188.50	170.00-180.00	179.00-186.00	165.00-192.00
<b>500-600</b>	n/a	n/a	150.00-170.00	175.00-185.00	176.00-189.00	175.00-185.00	175.00-189.00	175.00-201.00
<b>400-500</b>	n/a	157.50-208.75	173.00-204.00	185.00-201.00	183.00-204.00	185.00-205.00	n/a	182.00-205.00
<b>300-400</b>	n/a	n/a	210.00-232.50	n/a	n/a	n/a	n/a	195.00-216.00
<b>Slaughter Market</b>								
<b>No. on offer</b>	50	n/a	27	37	n/a	n/a	65	125
<b>D1-D2 Cows</b>	72.00-77.00	70.00-76.00	65.00-80.75	78.00-85.00	78.00-84.00	75.00-85.00	78.00-86.50	78.00-84.00
<b>D3-D5 Cows</b>	n/a	60.00-64.00	n/a	70.00-77.00	65.00-77.00	n/a	70.00-76.00	65.00-76.00
<b>Age Verified</b>	78.00-85.00	76.00-84.50	n/a	n/a	n/a	n/a	n/a	80.00-100.00
<b>Good Bulls</b>	90.00-100.00	n/a	78.00-96.50	90.00-100.00	94.00-104.00	95.00-103.00	90.00-109.00	92.00-98.00
<b>Butcher Steers</b>	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
<b>Butcher Heifers</b>	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
<b>Feeder Cows</b>	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
<b>Fleshy Export Cows</b>	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
<b>Lean Export Cows</b>	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
<b>Heiferettes</b>	90.00-100.00	n/a	94.00-103.00	n/a	95.00-125.00	n/a	85.00-102.00	n/a

\* includes slaughter market

(Note all prices in CDN\$ per cwt. These prices also generally represent the top one-third of sales reported by the auction yard.)

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## SHEEP &amp; GOAT COLUMN

# Feeder lambs dominate at latest auction

With fall's imminent arrival the sale was smaller and quieter

BY MARK ELLIOT  
Co-operator contributor

A mild early-fall day greeted sellers and buyers at the Winnipeg Livestock Auction sheep and goat sale Sept. 6. In keeping with the day, the auction itself was quiet and peaceful, with 152 animals passing through the ring, noticeably fewer than the last sale.

The sheep sale saw far fewer ewes than the last sale day. There appeared to be no price differences between wool and hair ewes. The price ranged from \$1.02 to \$1.13/lb. An exception was a group of nine 138-pound Rideau-cross ewes which brought \$1.21/lb.

A 155-pound Suffolk-cross ram represented the ram classification for this sale, bringing \$1.37/lb.

There were no heavyweight lambs delivered.

The lamb class was represented by five 93-pound Cheviot-cross lambs, bringing \$208.55 (\$2.15/lb.).

Feeder lambs dominated the sale, with good quality. The price ranged from \$2.15 to \$2.21/lb. An exception was an 80-pound Cheviot-cross lamb which brought \$2.30 per pound. However, buyers had little interest in any exotic lambs. This determined the fate of a group of Icelandic lambs which brought \$1.99/lb.

A group of 74-pound lambs brought \$2.15/lb. The 75-pound Rideau-cross lamb brought \$1.50/lb.

Nine 66-pound Dorper-cross lambs brought \$2.19/lb.

**Thin or fat lambs were not receiving the bidding that, in a few past sales, they had received.**

A 50-pound Cheviot-cross lamb brought \$2.18/lb.

Goat does that were slightly thin, were so judged by the buyers with their lower bidding. A Saanen-cross goat doe represented the dairy doe classification. No goat bucks were delivered.

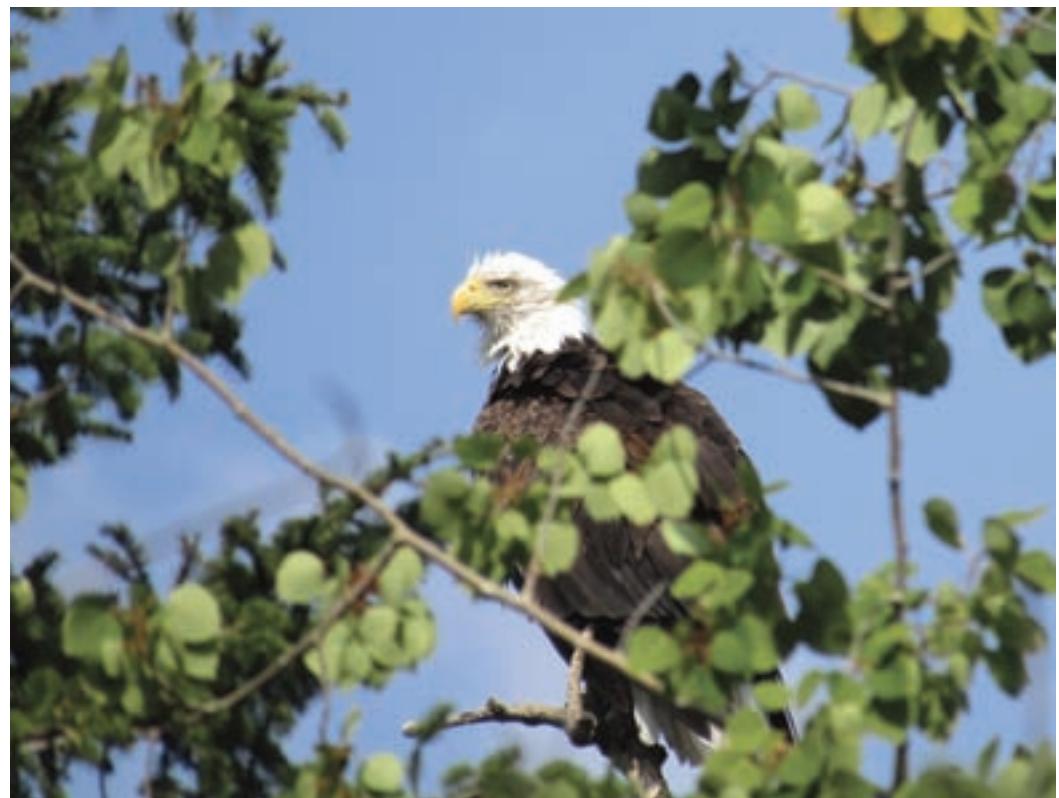
Smaller-weight goat kids were delivered for this sale but the bidding remained exciting and strong. The 54-pound Boer-cross goat kids did not greatly change the bidding. The price was \$2.56 and \$2.57/lb. The 50-pound Alpine-cross goat kid brought \$1.50/lb. A group of 55-pound Alpine-cross and Saanen-cross goat kids brought \$2.29/lb.

Three 43-pound Boer-cross goat kids brought \$2/lb. and a 45-pound Boer-cross goat kid brought \$1.72/lb.

Three 30-pound Alpine-cross goat kids brought \$1.67/lb. A group of eight 35-pound Alpine-cross goat kids brought \$1.46/lb.

The Ontario Stockyard Report indicated buyers were only interested in lambs that were of average weight in each classification. Thin or fat lambs were not receiving the bidding that, in a few past sales, they had received. The bidding on goats remained constant.

## SURVEYING THE SCENE



This bald eagle keeps a clear eye out above a campsite on Hecla Island in August. PHOTO: DONNA GAMACHE

## NEWS

### Saputo boosts dividend

REUTERS / Saputo, one of Canada's largest dairy producers, boosted its dividend and reported a larger quarterly profit on Tuesday, citing higher year-over-year dairy prices.

The dividend will edge up to 16 cents per share from

15 cents, payable on Sept. 15.

For its fiscal first quarter, net income rose 13 per cent to \$200.3 million or 51 cents a share, from \$176.7 million, or 44 cents, a year earlier.

Revenue during the quarter, which ended June 30, rose 9.9 per cent to \$2.9 billion.

Analysts were expecting Saputo to earn 52 cents per

share on revenue of \$3 billion, according to Thomson Reuters I/B/E/S.

Saputo's shares rose 2.3 per cent to \$43.25 in Toronto.

The Montreal-based company, whose brands include Dairyland milk and Armstrong cheese, is also among the biggest cheese producers in the United States.

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## COLUMN

# Ringbone in horses

Abnormal and repetitive stresses are frequent causes of this source of lameness

**CAROL SHWETZ DVM**  
Horse Health



**R**ingbone is one of the most common forms of arthritis diagnosed in the horse and is a "catch-all" term used to describe an osteoarthritis that afflicts the coffin joint (low ringbone) or the pastern joint (high ringbone).

Degeneration of the joint interferes with function, mobility and flexibility of the lower limb and ultimately leads to varying degrees of pain and non-weight-bearing lameness.

The first joint from the ground up in a horse's limb is the coffin joint. It is located within the hoof capsule and lies between the coffin bone (P3) and the short pastern bone (P2). It is a large high-motion joint. The next joint up is the pastern joint. The pastern joint exists between the long pastern bone (P1) and the short pastern bone (P2) and is located between the top of the hoof and the fetlock. Although it is a low-motion joint, the minor degree of motion is very important as it softens weight bearing upon loading of the limb. Ringbone can arise from damage within the joint itself (articular) or from damage to structures such as the joint capsule or ligaments which surround and support the joint (periarticular). Non-articulating ringbone is typi-



The joints of the lower legs of horses don't move much, but they perform an important function and are a frequent source of lameness. PHOTO: THINKSTOCK

cally less painful and so considered less serious. Ringbone can begin as non-articulating and advance into articulating and vice versa.

Ringbone generally arises from abnormal and stressful forces placed upon the working joints of the lower limb. Optimal function and movement of the joints necessitates proper alignment and even loading of their working surfaces. Therefore alignment flaws such as toed in or toed out or unnatural hoof angles such as those associated with upright pasterns or long toe-low heels place undue stress on the joints through improper movement dynamics.

It is also equally important to recognize that certain sporting activities predispose a horse to ongoing injury through repetitive strain forces to the lower

joints. Such examples include the torque placed upon the limbs of a barrel horse during sharp turns, the sudden hard stops with twisting when a rope horse is dallied up, the landing of a hunter/jumper horse upon unforgiving surfaces, or the concussive forces incurred during the work on pavement of a carriage horse or police mount. Whenever the lower limb is subjected to repetitive or ongoing stress and strain, rotational forces or torque, or concussive forces, the tissues are prone to varying degrees of damage.

If the damage exceeds the body's abilities to repair itself then disease is a likely result. The rate of damage is compounded when the horse's body weight exceeds its ideal or when horses travel in poor posture. Work on unforgiving surfaces which are hard, uneven, or overly deep fur-

**Ringbone generally arises from abnormal and stressful forces placed upon the working joints of the lower limb.**

ther amplify stress to the joints. Horses under five years of age are particularly vulnerable to excessive stressors and concussive forces. Oftentimes ringbone that seemingly appears later in the horse's life can be attributed to activities during the early years of a horse's development when the joints are overtaxed before the horse reaches physically maturity.

The symptoms of ringbone are often insidious and easy to miss in the beginning. The horse may seem reluctant to go forward, refuse certain work, and/or his gait may become short, choppy or shuffling. As with most arthritic conditions the degree of pain can vary from day to day. Symptoms are further confusing as often both legs are affected to varying degrees so the lameness can appear to shift between legs. Commonly heat and swelling can be detected on the pastern and bony ridges may begin to form on the pastern where before it was smooth and sleek. Rest may temporarily resolve the lameness only to return when the horse goes back to work.

A thorough lameness examination by a veterinarian generally involves a historical accounting of the lameness, a clinical evaluation of gait on both hard and soft ground and in straight lines and in circles. Flexion tests, diagnostic nerve blocks, radiographs and more advanced imaging may be undertaken to further define the nature of the ringbone. Ringbone in the coffin joint is much more significant since this is the higher-motion joint.

Once a diagnosis of ringbone is made efforts to manage and preserve the horse's soundness are multimodal. Maintaining a healthy weight and giving a horse proper rest when needed is important to the healing process. Horses will do best with the consistent low-impact movement such as while on pasture. The moderate movement stimulates circulation and decreases inflammation of the joint and so pain. The amount of activity asked of the horse varies on the degree of ringbone and the tolerance of the individual horse. Oftentimes the job of the horse will need to be reassessed and reassigned in order to reduce wear and tear on the joint. Successful management of ringbone will address the specifics of hoof balance. Although corrective shoeing may be suggested to ease break-over of the lower limb, it is equally important to recognize that improper shoeing practices can be a contributing factor to the development

of ringbone since iron shoes strongly influence the movement dynamics of the lower limb.

Medical management is aimed at reducing the pain and inflammation associated with the condition. Anti-inflammatories like phenylbutazone ("bute") or the new generation of non-steroidal anti-inflammatories firocoxib (Previcox or Equioxx) are used to decrease inflammation associated with acute flare-ups of the condition and to manage horses on a long-term basis. Oral joint supplements that contain glucosamine, chondroitin sulfate, hyaluronic acid, MSM, and other herbal ingredients may benefit some animals. Legend I.V. (intravenous hyaluronic acid) and Adequan I.M. (polysulfated glycosaminoglycan) can also be used to support the joint. Legend addresses the quality of the joint fluid and acts as an anti-inflammatory. Adequan works at the joint surface to heal the cartilage. Alternative therapies such as acupuncture and chiropractic work have varying degrees of efficacy often addressing the compensation patterns in the body caused by the ringbone. Due to the nature of the disease there is tremendous variability with regards to how an individual horse will respond to medications, supplements, injections, regenerative, and complementary therapies.

In some cases of high ringbone the deteriorating joint undergoes a natural progression to the end point whereby the joint collapses and fuses. During the process, the horse is often severely lame. However, once the joint fuses, motion is no longer present and the lameness may resolve to some extent.

Surgical treatment of high ringbone may be an option in certain horses. Essentially the goal of surgery is to complete the body's attempt of bridging the joint and stop the joint from moving. By preventing motion, joint fusion reduces the pain of ringbone and may allow some horses to return to use. While this procedure involves a major surgery, it offers the possibility of complete return to work and relief from pain. The surgery tends to be more successful on affected hindlimbs than forelimbs. Recently a newer procedure using alcohol to fuse the pastern joint is showing promise and advantage over the surgical technique. Unfortunately, low ringbone remains very difficult to treat and carries a poor prognosis for soundness.

Carol Shwetz is a veterinarian focusing on equine practice in Millarville, Alta.



9:00 - 4:00 (Registration 8:30)

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Saturday October 14, 2017

**East:** Komarno, Community Centre (76 2nd Ave.)  
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# COUNTRY CROSSROADS

CONNECTING RURAL FAMILIES

## Argyle set to serve its 135th annual fall supper

The Brant-Argyle local history book talks about the popular community meal that began in 1882

BY LORRAINE STEVENSON

Co-operator staff

The number of potatoes peeled in the village of Argyle for its annual fall supper can probably circle the planet by now.

Several hundred pounds are served every year and 2017 marks the 135th year since this tiny southern Interlake community began its yearly fall tradition.

Organizers know for sure their annual fall tradition is only 15 years shy of being as old as Canada itself.

"It's actually in our (local) history book," said Tracy Dunstan, a community volunteer organizing the meal.

The account records how local women began hosting the meal in 1882 and how it has been "... held every year with the exception of one, we think."

It was once called "the anniversary supper," then became a "fowl supper" and finally "fall" supper after they switched to serving turkey instead of chickens local farmers used to donate.

"Everyone from far and near would attend. It was one of the social events of the year," the history book says.

Not much has changed in all those years, says Dunstan.

The main difference is volunteers from the whole community assumed looking after it, following the closing of the Argyle United Church a few years ago.

Fay Dunlop was one of the church women helping out the United Church Women (UCW) while they ran it.

About 10 people would plan it. Then they'd rally everyone else to make it happen, she said.

"It became a community affair. Otherwise we wouldn't have been able to do it."

Dunstan was chair of the Parent Council Committee when their group agreed to take over the planning role.

"That's probably been the biggest change I've seen, is when we took it over from the church," she said. "The ladies wanted to see the supper go to another group."

Today they still serve upwards of 700 and the roughly \$5,000 raised at the event is a fundraiser for community groups.

It's also now held in the curling rink after a long stint at Argyle's Memorial Hall.

Years before that, fall supper was served in the school base-



The standard fare of a fall supper remains unchanged over decades: chicken or turkey, mashed potatoes, vegetables and, later, pie for dessert. PHOTO: LORRAINE STEVENSON



Sandy Jamault, (left) Francine Snell and Tracy Dunstan break bread for turkey stuffing as they prepare one of Argyle's annual fall suppers. PHOTO: SUPPLIED



The Argyle curling rink awaits visitors for the 2016 fall supper. PHOTO: SUPPLIED

ment where, according to the Brant-Argyle history book "... many ladies would be in the tiny kitchen, cooking and preparing food over a hot wood stove... (and) the men had full-time jobs too, carrying wood and water and pouring tea and coffee..."

### The menu

What hasn't changed is the food. Turkey has long been the mainstay after the switch from chicken, alongside mashed potatoes and gravy and veggies and pie, although desserts are more varied than they used to be.

During the handover from the church there was talk of serving store-bought pickles, said Dunstan. But that didn't fly.

"It was, 'oh, no, you have to make the pickles,'" said Dunstan with a laugh. "So

**"It's that one time of the season where we know we're going to see our neighbours, even if we don't see them all year."**

TRACY DUNSTAN

we had a pickle-making workshop."

Food-handling practices were stepped up a notch over time. They worked with Manitoba Agriculture staff on how to take a new approach and today keep food before it's served in what's called 'thermals.' It keeps food at proper temperatures, said Dunstan.

"They're basically a big heavy plastic insulated box," she

said, adding that they shared the cost of buying them with nearby towns.

"We ended up with a joint fall supper community group with Grosse Isle and Warren and Balmoral and Stonewall," she said. "We each bought units and then we lend them to each other."

Those communities, of course, also have long-standing fall suppers.

One can only speculate how Argyle's lengthy history compares to other fall suppers around the rest of the province, says local teacher Rolly Gillies.

"I would say it would have to be one of the earlier fall suppers at 1882," he said. "But I imagine there would be older suppers or events like this connected to some of the Métis and French Canadian communities that were established back in the early 1800s."

What's absolutely unchanged here is the special bond this meal creates for the community, said Dunstan.

They still serve a huge crowd and volunteers continue to come forward to help out. That shows how much everyone wants this meal to continue, she said.

"It's that one time of the season where we know we're going to see our neighbours, even if we don't see them all year."

"It just brings the community together."

And they'll be together for many more meals to come.

One hundred and thirty-five more?

"I may not be there," she jokes. "But I'm pretty sure it'll still be running."

Argyle's 135th fall supper will be held Sept. 24 from 3 p.m. to 6 p.m.

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## COUNTRY CROSSROADS

## Prairie fare

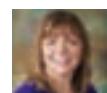


## In a pickle over a side dish?

Pickles can be made from almost any vegetable or many fruits

BY JULIE GARDEN-ROBINSON

NDSU Extension Service



**P**lease enjoy these fresh pickles. Your food will be out shortly," the server said as she placed a plate of cucumber slices in front of us. They were sprinkled with dill weed and had a nice crunch.

I was in a restaurant in another state, and the somewhat sweet yet vinegary flavour and crisp texture made me nostalgic for home. The pickles were very tasty and soon the serving plate was empty.

When I was young, we used to have fresh-from-the-garden cucumber slices and onions marinated in a vinegar and sugar brine. I would place a couple of slices on my plate to appease my parents, who wanted me to enjoy different foods. I wasn't always keen on trying "different" foods back then.

When guests came over, pickles or relishes of some sort always were served as a side item. I gradually grew to like the various renditions of pickled vegetables that were on our menus regularly.

However, despite their coaxing, pickled pigs' feet did not make it on my plate. I had to put my own foot down on some things.

Our pantry was stocked with a wide variety of canned pickles and relishes, from beet pickles to watermelon pickles. Some pickles were sweet because the brine contained a lot of added sugar and other pickles were quite sour.

Cabbage was fermented to form sauerkraut in a crock with a heavy cover in a cool room in our basement.

Preserving food by fermentation predates all of us by thousands of years. Pickles can be made from almost any vegetable or many fruits, and their history dates back to 2000 BC.

In the absence of refrigeration, early people figured out that salt helps prolong the shelf life of foods. Perhaps someone dropped vegetables in salty seawater and a couple of days later, they noticed some bubbling as the vegetables began to ferment. The salt prevented the dangerous bacteria from growing and allowed the beneficial bacteria an opportunity to grow.

We aren't sure what happened next in history because no one had Facebook or Twitter to post photos.

Evidently, someone was brave enough to have a taste of the sour vegetables. Or perhaps they noticed that an animal ate the vegetables in the salty brine and survived.

These early food scientists set the stage for a wide range of foods that have become very popular throughout the world. Lactic acid bacteria on the vegetables convert natural sugars to acid, and salt helps the process. Acidic foods stay safe longer.

Fermented foods are a growing trend in our food supply, and different countries have introduced various fermented or pickled foods to world cuisine. Kimchi, which is a spicy fermented cabbage, originated in Korea. Pickled daikon radishes have long been popular in Japan, and pickled eggplant is one of the signature items from Italy.

**In the absence of refrigeration, early people figured out that salt helps prolong the shelf life of foods.**

Sauerkraut, by the way, originated in Europe. To make sauerkraut, you just need salt, chopped cabbage and a covered container. Then natural fermentation takes over. On the other hand, most "pickled" vegetable recipes contain vinegar, salt and spices.

Eating fermented foods may have some health benefits. You may have heard the term "probiotics," which literally means that the food supports life because it contains some beneficial lactic acid bacteria. Probiotic-rich fermented foods may offer some health benefits to our immune system and digestive system. They may help restore levels of healthy bacteria in our gut.

The fermentation process also may enhance the ability of our bodies to use the nutrients in food. Besides fermented vegetables, foods with "live and active cultures," such as some types of yogurt, sour cream and buttermilk, are sources of probiotics.

If you are inspired to try making sauerkraut or a wide range of pickled foods, visit <https://www.ag.ndsu.edu/food> and click on "Food Preservation," then "Ferment" or "Pickle."

As we complete our fall harvest of fresh local vegetables, here's a tasty recipe for fresh pickles to try.



Almost any vegetable can be successfully pickled to preserve it for later. PHOTO: THINKSTOCK



This recipe lets you make use of fresh produce and could provide you with some health benefits. PHOTO: NDSU

### Quick pickled cucumbers, peppers and onions

- 1/2 c. vinegar
- 1/2 c. water
- 1-1/2 tbsp. sugar
- 1-1/2 tsp. mustard seed
- 1-1/2 tsp. salt
- 1 tsp. minced garlic
- 1-1/2 tsp. dill weed (or 4 tbsp. chopped fresh dill)
- 5 c. cucumber slices
- 1/2 small onion, sliced into rings
- 1/2 red bell pepper, sliced into 1-inch strips

Heat vinegar, water, sugar, mustard seed, salt and garlic until sugar dissolves. Rinse cucumbers, then peel and slice. Prepare onion and red bell pepper as described. Mix vegetables in bowl and add dill weed, stirring gently to coat. Pour vinegar mixture over vegetables. Refrigerate for at least two hours, stirring at least once to submerge vegetables in brine. Remove pickled vegetables with a slotted spoon to a serving dish and return the remaining vegetables to the refrigerator. (Note: This is not a tested recipe for canning. Enjoy it fresh.)

Julie Garden-Robinson is a North Dakota State University Extension Service food and nutrition specialist and professor in the department of health, nutrition and exercise sciences.

## COUNTRY CROSSROADS

Andrew Jackson dropped his newspaper to the floor beside his chair and sat for a moment staring out of the glass walls of the sunroom. Rain fell steadily outside and gusts of wind set the oak trees swaying in the backyard. A single yellowing leaf let go of its hold on a branch and was carried away quickly out of sight. "Noooooo!" Andrew imagined a tiny voice fading away in the distance.

"I wonder if leaves are horrified when they fall off of trees," he said to Rose, who sat nearby, her attention focused on the tablet in her lap.

Rose did not respond immediately, clearly engrossed in whatever she was looking at. "Huh?" she said eventually, without looking up. "Did you say something? Were you talking to me?"

"Ah, not really," said Andrew. "Just talking to myself."

"Good," said Rose. "Because I wasn't listening."

"I can tell," said Andrew. He watched his wife for a moment. "What are you looking at?" he asked.

"A video," said Rose.

"You don't say!" said Andrew drily. "A video of what?" he added when it became clear that Rose wasn't going to elaborate without prodding.

"A three-year-old kid climbing up the steps of a slide at the park, after his older sister," said Rose.

"Sounds riveting," said Andrew.

"It is," said Rose. She watched for a few seconds. "It's one of the most amazing things I've ever seen."

Andrew gave her a doubtful look which she completely failed to see. "I get the feeling there is some important aspect of that video you are not sharing with me," he said. "Either that or today is officially Hyperbole Day and someone forgot to tell me."

"Oh, yes," said Rose. "The kid in the video. He has no arms or legs."

"So it's not Hyperbole Day then?" said Andrew.

"Not that I'm aware," said Rose.

"Good," said Andrew. "My life would be totally ruined forever if it was."

Rose chuckled but didn't look up from her screen. "I see what you did there," she said. "Funny."



## The Jacksons

By Rollin Penner

"If it wasn't so far," said Andrew, "I would be inclined to walk over there to where you are and see this video for myself. In my imagination I picture climbing steps when you have no arms or legs as being somewhat more difficult than otherwise."

"A lot of things are more difficult when you have no arms or legs," said Rose.

"True," said Andrew. "Some things might even be impossible."

"Some things," said Rose. "Not climbing the steps to the slide when you're three years old though. That's not impossible."

"In all fairness though," said Andrew, "when you're three years old you have a very limited understanding of what's impossible and what isn't. I'll bet if you're a three-year-old with no arms and legs, you do six impossible things before breakfast every day just because you have no idea they're impossible."

"This is ridiculous," said Rose, her eyes still glued to the screen. "I don't even know how to process what I'm watching here. I just turned on the tablet to see what our kids were up to on Facebook, and now all my assumptions about what is and isn't possible are crumbling, courtesy of a cheerful, happy three-year-old who just wants to go down the slide."

"The internet ruins my assumptions every day," said Andrew. "And most of the time, not in a good way."

"Oh my God! He made it!" Rose's eyes widened. "I think I'm going to cry," she said.

"The internet makes me cry every day," said Andrew. "And most of the time, not in a good way."

"Down he goes!" said Rose. "You should see the smile on this kid's face!"

"I can see it on yours," said Andrew.

Rose looked up from her tablet, at long last, and stared at her husband across the room. "I can't even imagine," she said.

"I know what you mean," said Andrew. "People are amazing."

There was a brief silence while Rose stared out of the window at the wind and rain.

"Is it bad," she said eventually, "that after watching that amazing kid in that amazing video, I am overwhelmingly grateful that all of our kids and grandkids have all their arms and legs?"

"No," said Andrew.

"If that kid from the video was ours we would still be totally grateful wouldn't we?" said Rose.

"Totally," said Andrew.

"We are very lucky though," said Rose.

A leaf from one of the trees outside let go of its branch, flew through the air, and plastered itself against the rain-slicked window.

"Winter is coming," said Andrew.

"Even yet still," said Rose. "Very lucky indeed."

# Daylilies — a variety for everyone

With over 45,000 cultivars it won't be difficult to find one that is just right for your garden

BY ALBERT PARSONS

Freelance contributor

During August and September, daylilies provide much of the colour in our perennial borders. Their popularity is due to the fact that they are versatile and easy care, requiring minimal maintenance. Another reason that daylilies are becoming more popular is that some gardeners have stopped growing Asiatic and Oriental lilies because of the infamous lily beetle, which does not attack daylilies. Thankfully it has not reached southwestern Manitoba yet, but has been found not that far away. I know of gardeners in Winnipeg who have simply torn up all their lilies because they were tired of fighting the beetle.

Daylilies are not actually members of the lily family and are officially called Hemerocallis. They are native to Asia and most commercial cultivars are hybrids derived originally from the species which are commonly seen in roadside ditches in some parts of the province — they have buff-orange blooms. The flowers of hybrid daylilies can be any colour except pure white or blue — two colours that the hybridizers have yet to create. The hybrids have wider leaves, tend to be more compact in their growth habit, and their blooms are large and magnificent.

One way daylilies are classified is by height, which can range from the mini-

atures that only grow 18 cm high to the larger types which will grow over a metre tall. The miniatures are popular with those who create fairy gardens. Daylilies are also categorized by bloom time; often labelled early, mid-season or late. Recently added to this list is a class called ever blooming or repeat blooming — daylilies that bloom when most others do then supposedly put forth a second burst of bloom later in the season. So far these daylilies bloom only intermittently for the remainder of the growing season, so are not truly ever blooming.

Many gardeners group daylilies according to colour, the whites — which always have a cream or green tint — and yellows composing one group, and the pinks, purples and reds another. Flower type is also used to differentiate groups as the blooms can have different shapes and structure. There are trumpet-shaped single blooms, and also double, ruffled, or recurved ones. Single or trumpet daylilies have a single row of six petals while double cultivars have two rows.

Blooms last but one day — hence the name daylily — opening in the morning, flagging by nightfall, and by the following morning the flower is totally past. However, the blooms are very beautiful, many with colourful eyes and petals edged in contrasting colours. They have a lot of substance; the petals are thick and not at all delicate as one would expect of a flower that lasts only a day. They are held aloft of the grassy foliage



The grassy foliage of daylilies adds contrast and texture to a mixed border and the foliage remains attractive all growing season. PHOTO: ALBERT PARSONS

on sturdy stems each of which might hold over a dozen buds, which provide a continuity of bloom over several weeks.

While daylilies are undemanding perennials, they do require lots of sun to produce bloom. They prefer soil that contains lots of organic matter that drains well. They don't demand fertilization and will be quite happy in ordinary garden soil. Daylilies are drought

tolerant once they are established, are not prone to attack by insects or diseases, and will only need to be divided infrequently, usually about every four or five years. Division of daylilies can be done in spring or fall by separating the clumps and choosing healthy pieces (called fans), and planting these with their crowns just three cm below the soil surface. The new plants should be watered regularly if no rain occurs and it is a good idea to mulch the plants for the first winter — particularly if they are divided in the fall. Many new plants can be created from one mature plant.

With over 45,000 named cultivars in existence, it is not difficult to find a daylily for every purpose in the garden. They can be used as specimen plants, as blocks of colour in a border, or to accent a focal point such as a lamp standard or bird bath by underplanting it with daylilies. They are often used as tall ground covers, and can be mass planted along fences or in large beds. They can also be used in rows along walkways, and some of the smaller cultivars are now used in large mixed containers (these must be planted in the ground in the fall if they are to survive the winter).

If you are planning to add some perennials to your landscape this fall, consider adding some daylilies. With so many wonderful cultivars to choose from, you won't have trouble finding varieties that are just right for your garden.

Albert Parsons writes from Minnedosa, Manitoba

# COUNTRY CROSSROADS

## Planting in the fall?

This time of year is usually seen as the end of the growing season but don't put that gardening equipment away just yet

### RRBC RELEASE

In this region, we tend to look at fall as the end of the growing season, and begin to think about getting our gardens, yards, trees, etc. ready for cold temperatures and snow. Yet there is a considerably large window of time where fall planting is good if not better than spring planting.

September to November are ideal times to begin your planting for fall, so now is the time to get your plans together. It's important that you schedule your planting at least six weeks prior to the first signs of a hard frost. This is not always easy to predict but there are few indicators that a hard frost is getting closer. The *Old Farmers Almanac* ([www.almanac.com](http://www.almanac.com)) is a great resource to look at average frost dates for where you live.

The key to fall planting is root growth and planting in the fall allows the root growth long before the soaring summer temperatures return. Cool, wet fall weather is the perfect time for tree planting and less watering is needed. The stable air temperatures also help promote rapid root development along with warmer soil temperatures from the summer months. This also gives grass, trees and other fall-planted items to get a head start in the growth process.

A few other benefits provided by *Better Homes and Gardens* to fall planting include:

- Fall has more good days for planting than spring does, when rain and other unpredictable weather can make working the soil impossible. And there's



Don't put away all the gardening tools just yet. PHOTO: THINKSTOCK

a lot more free time for gardening in autumn than in always-frantic spring.

- The late season is usually bargain time at garden centres that are trying to sell the last of their inventory before winter.
- Pests and disease problems fade away in the fall. You don't need fertilizer, either. Fertilizer promotes new, tender growth that can be nipped by winter weather; stop fertilizing by late summer.
- Many tree species can be planted in the spring or the fall, however, there are some that recommend fall planting such as maple, ash, crabapple, spruce, pine, and elm.

For specific recommendations on what to plant where you live, contact your local conservation district, university extension office or [www.almanac.com](http://www.almanac.com).

*The Red River Basin Commission (RRBC) is a grassroots organization that is a chartered not-for-profit corporation under the provisions of Manitoba, North Dakota, Minnesota, and South Dakota law. Contact the Winnipeg office at 204-982-7254, or you can check out the website at [www.redriverbasincommission.org](http://www.redriverbasincommission.org).*

### READER'S PHOTO



Interesting sky in the Miami, Manitoba area. PHOTO: RONNIE HOFER

## RCMP emphasize fraud prevention measures

### RCMP RELEASE

Numerous types of scams and frauds operating on global, national, and local levels undermine the confidence of Manitobans by stealing their hard-earned money. These crimes are often borderless and have no specific target demographic group.

Over the past several months, the RCMP have received several reports from residents who have had money withdrawn from their accounts. The withdrawals look to be coming from various locations in the United States. The incidents appear

to be in the form of card skimming, where the victim's debit card numbers are captured along with the PIN number, which then allows the fraudster to withdraw funds unsuspectingly from the account.

If you believe you've been a victim of fraud, there are several things you should do:

- Gather all information you have about the fraud, including documents, receipts, emails and/or text messages.
- Report the incident to your local police and obtain a police report number that may be requested by your financial institution and/or credit card company.
- Contact the Canadian Anti-

Fraud Centre at 1-888-495-8501 and complete a report.

In terms of fraud prevention, we encourage everyone to do the following:

- Monitor your bank accounts and financial statements regularly and report any suspicious transactions.
- Update your PIN number and any online financial institution passwords you use on a regular basis.
- Monitor your credit history on an annual basis through either Equifax Canada or TransUnion.

Prevention is key and every Manitoban needs to do their part in recognizing the signs, reporting it, and stopping it.



## This Old Elevator

In the 1950s, there were over 700 grain elevators in Manitoba. Today, there are fewer than 200. You can help to preserve the legacy of these disappearing "Prairie sentinels."

The Manitoba Historical Society (MHS) is gathering information about all elevators that ever stood in Manitoba, regardless of their present status. Collaborating with the *Manitoba Co-operator* it is supplying these images of a grain elevator each week in hopes readers will be able to tell the society more about it, or any other elevator they know of.

MHS Gordon Goldsborough webmaster and Journal editor has developed a website to post your replies to a series of questions about elevators. The MHS is interested in *all* grain elevators that have served the farm community.

Your contributions will help gather historical information such as present status of elevators, names of companies, owners and agents, rail lines, year elevators were built — and dates when they were torn down (if applicable).

There is room on the website to post personal recollections and stories related to grain elevators. The MHS presently also has only a partial list of all elevators that have been demolished. You can help by updating that list if you know of one not included on that list.

Your contributions are greatly appreciated and will help the MHS develop a comprehensive, searchable database to preserve the farm community's collective knowledge of what was once a vast network of grain elevators across Manitoba.

Please contribute to This Old Grain Elevator website at: <http://www.mhs.mb.ca/elevators>.

You will receive a response, by email or phone call, confirming that your submission was received.

Goldsborough is interested in hearing all sorts of experiences about the elevators — funny, sad, or anything in between. Readers willing to share their stories can leave messages at 204-474-7469.



A 35,000-bushel wooden elevator at Kelwood, on the CNR Neepawa Subdivision in the Rural Municipality of Rosedale, was built in 1929 for Western Canada Flour Mills. In August 1940, it was taken over by the newly-formed Kelwood Co-operative Elevator Association. Initially handling just grain, the Co-operative began to sell coal in 1950 and farm supplies such as fertilizer, pesticide, and baler twine in 1963. A balloon annex was built beside it in 1969, increasing its capacity to 68,300 bushels. The facility was closed in December 1971, shortly before this photo was taken, and traded to United Grain Growers which, in turn, closed it in December 1979. The elevator and annex were sold to the community, along with UGG's other elevator built in 1927. Both elevators were removed from the site sometime before 2000. Does anyone know when? PHOTO: UNIVERSITY OF MANITOBA ARCHIVES & SPECIAL COLLECTIONS