

Inside Barley Country

New revenue = new producer opportunities + value	2
Crop Sector Working Group hires coordinator	2
The unpredictability of fall frost	3
Check-off dollars	3
How will you harvest this year's crop?	4
Knowing what bonding can and can't do for you	4
Finding better value in fibre	5
New resource focuses on nitrogen use	6
Storing practices as important as growing practices	8
Farmer follows nature and tradition	9
Feed grain research update 2009	9
Using barley protein—on a very small scale	10
Keeping producer priorities alive during an Ottawa summer	11
News and events	12
Key contacts	12



Alberta Barley Commission delegate Richard Mueller (foreground in cowboy hat) and director Albert Wagner (foreground in ball cap), both of Region 5, were among the more than 125 people who attended the 2009 Lacombe Field Day at the Alberta Field Crop Development Centre and Lacombe Research Centre on July 30. See coverage of the event on page 5.

marketing

Selling barley has its complexities

Markets are notoriously fickle and unpredictable. Signals are fleeting and elusive. Demand comes in rogue waves. And prices often appear to be under pressure.

So just where, when and how should you sell your barley? If you have a production contract, the question barely begs asking, as you have fixed your price. But if you're selling into the Canadian Wheat Board pool or to a feedlot, the answers have several shades of complexity and opportunity.

Barley Country asked several people from throughout the industry for their insight and opinions for this fall.

Bob Cuthbert, Senior Marketing Manager for barley, Canadian Wheat Board

While demand from domestic maltsters remains more or less steady over 2008, demand for export malting barley is more uncertain due to quality of competing countries' crop and the as-yet unknown quality of the Canadian crop. Total malting barley sales (domestic and export) are to be below last year's total of 2.65 million tonnes (pool and CashPlus), Bob Cuthbert says.

Typically, about half of export malting barley is moved by the end of January; Cuthbert says it's hard to be specific about export demand at this time of the year.

Europe has produced a smaller, but good quality barley crop and Australia is on track to produce its largest barley crop in four years. China's lower production could mean the country imports up to 1.6 million tonnes (up from 1.2 million tonnes) of malting barley, although if Canada hopes to capture a share of this increased demand market it will have to compete against Australia and Europe.

The Canadian Wheat Board's (CWB's) current PRO rate for two-row malting barley is \$245 a tonne in-store Vancouver.

On the feed side, the CWB is not currently accepting feed barley deliveries. "The tradable value offshore is below the domestic value," Cuthbert says. The CWB's PRO rate for feed barley is \$158 a tonne FOB in-store Vancouver and the current selling price in Saudi Arabia is \$150 a tonne FOB in-store. Japan's tradable values are higher for limited volumes but still below domestic values.

Given current values, he says a significant export feed barley program is unlikely.

Continued on page 10...

New revenue = new producer opportunities + value

On Aug. 1, 2009, Alberta's barley industry reached an important milestone: that was the day the check-off rate for barley became \$1/tonne (or about two cents a bushel).

For some time, the Alberta Barley Commission has realized this change was needed to keep our industry vital and competitive. All kinds of critical thinking went into the decision. When I say critical thinking, I don't mean criticism. I mean purposeful and reflective examination and analysis of the topic, which is something that comes as easily to farmers as worrying about the weather.

Criticism often comes almost as easily, although we have had little as we moved toward the new rate change. Sure, a few farmers always ask for their check-off dollars back. They do no matter what the rate is. It's their prerogative.

But the vast majority of barley producers are behind the new rate and the concept of check-off dollars to advance the entire industry. A motion at our annual general meeting for the rate change was passed unanimously. As well, we've seen a significant jump in the number of licensed barley buyer locations. Thanks primarily to the efforts of our office administrator, Mandi Tilleman, we now have more than 160 licensed locations compared to 119 locations earlier this year.

The revenue we expect the new

check-off rate to generate will equal new opportunities and value for Alberta's barley producers and customers.

For example, we estimate the new check-off rate will result in between \$500,000 and \$625,000 in new research funds. This past April, the Commission's Board of Directors agreed to allocate these new funds as follows: 28.2 per cent to bioproduct development; 22.5 per cent to barley agronomy and production; 18.75 per cent to feed barley development; 16.25 per cent to malting barley advances; and 14.4 per cent to food and nutritional uses of barley. The Board also agreed to continue its ongoing support of regional varietal trials for barley varieties.

Check-off dollars become even more valuable considering their leverage ability. In 2008/2009, every \$1 the Commission invested attracted an additional \$5 in partner funding.

The overall impact on the industry as a whole is even more dramatic: a study by the Western Grains Research Foundation found barley producers get 12 times the value in benefits for their check-off dollars, a pretty good return for two cents a bushel. For the average producer, who pays \$300 in check-off dollars a year, that means an impact of \$3,600.

This year's poor crop conditions may play havoc with our revenue

projections in the 2009/2010 year, but eventually the additional check-off dollars will give the Commission the ability to invest directly in projects to develop barley varieties and agronomic practices that reduce the amount, or improve the efficiency of the fertilizers, pesticides and herbicides farmers apply to their crops. Additional breeding research can decrease pesticide use through the development of disease-resistant barley cultivars, resulting in higher yields and lower costs.

~
Check-off dollars become even more valuable considering their leverage ability. In 2008/2009, every \$1 the Commission invested attracted an additional \$5 in partner funding.
~

I've said on numerous occasions the new check-off rate is a small price to pay for eventually decreasing the input costs of barley production across the province and raising barley's selling price at the farm gate.



Terry Young

This same message is true for several other crops and livestock products in Alberta, and is why we've teamed with the Alberta Pulse Growers Commission and the Alberta Winter Wheat Producers Commission to tell our respective producers and customers about the value of check-off dollars. See the story on page 3 and the ad on page 7.

Check-off dollars are the single most important way producers can invest in their industry. And if our industry isn't willing to invest in itself, why should we expect anyone else to invest in it?

Terry Young is the 2009 chairman of the Alberta Barley Commission and a Lacombe barley producer.

environment

Crop Sector Working Group hires coordinator

The Alberta Crop Sector Working Group has hired its first employee, Sharon McKinnon, to represent the interests of farmers as they relate to environmental issues and initiatives. She will work closely with agriculture industry producers, government staff and other organizations.

"It is ineffective for every crop-producer group to try and deal with, and to have the expertise needed to deal with every environmental issue," McKinnon says. "There needs to be a lot of input from Alberta's crop sector in (environmental) planning and it's my job to make sure ag producers' interests and concerns are represented and heard."

The environmental issues facing crop producers include the Province of Alberta's Land Use Framework and its

associated regional planning process, its engagement strategies advisory team and the fragmentation and conversion of agricultural land. Just weeks into her new job, McKinnon is already working on those files and is also preparing to address other issues such as stewardship, biotechnology (including biofuels), wetlands, climate change and water use.

In her first update in August to the producer groups she represents, McKinnon raised three other issues: traceability, best practices and sustainability. For example, she pointed out that Wal-Mart's move to creating a sustainability index for every product it sells is sure to affect farmers.

McKinnon has bachelor's and master's degrees in agriculture and specializes in resource economics.



Sharon McKinnon

Prior to joining the Crop Sector Working Group, she worked with the Western Canadian Wheat

Growers Association and the policy secretariat of Alberta Agriculture and Rural Development.

The Crop Sector Working Group is an inclusive partnership of Alberta crop sector organizations that addresses and aligns agriculture and environmental policies and priorities in Alberta. Its members include producer groups for potatoes, sugar beets, winter wheat, soft wheat, canola, barley and pulses. The Alberta Barley Commission, the Alberta Canola Producers Commission, the Alberta Pulse Growers and the Alberta Crop Industry Development Fund jointly fund McKinnon's position.

Sharon McKinnon can be reached by phone at (780) 994-2862 or by email at sharon.cswg@gmail.com.

The unpredictability of fall frost

Late frosts took a chilling bite out of barley crops across the province this past spring. And they threaten to do the same again during harvest.

For some farmers, frost could be the final assault against crops that have battled trying weather since seeding started.

Like many other unpredictable and damaging weather conditions, not much can be done to stave off the effects of frost during harvest, says Steve Larocque, an agronomist who runs Beyond Agronomy in Three Hills.

“You could swath a little early,” he says. This will help lower the moisture content faster compared to crop left standing. Frost warnings, however, are usually just a day or two before the event and, logistically, it’s impossible for most producers to get everything swathed and dried down before a frost hits.

Given frost’s sporadic nature, long-range forecasting of it is nearly impossible, Andrew Nadler, an agricultural meteorologist with the



Manitoba Agricultural Weather Program, says. Probable dates based on historical records give a general idea of when frost could hit, but seldom pinpoint the exact arrival of the first frost.

For example, in Vermillion, historically the first fall frost is Sept. 9, although it has varied for the past four years. In 2008 it was Sept. 2; in 2007 Sept. 13; in 2006 Sept. 18; and in 2005 Sept. 21.

“I know my grandfather used to say if the temperature was 48° F (11° C) at sundown there would be frost overnight,” Larocque says, “and I don’t think he was far off.”

Predicting the extent of frost damage can be equally vexing, as a number of factors are at play. They include the barley variety, its growth stage, soil type and moisture and humidity as well as how quickly the temperature drops and rises.

Nadler says when the air temperature drops to 0° C, cereal and other crops may not sustain damage. For

many cereals a killing frost can occur when the mercury drops to -2° C. Larocque says many barley varieties can often withstand temperatures as low -4° C, depending on moisture content.

Larocque advises farmers to check their barley 24 to 48 hours after a frost, although the full extent of frost damage won’t emerge for seven to 10 days.

After the inevitable first frost, barley usually experiences rapid dry down and heads may start to break off. From Larocque’s point of view Conlon is particularly prone to weathering damage including frost. He says swath a variety like Conlon soon after a frost can save you bushels and help you avoid a volunteer barley problem the following year.

Depending on the frost’s severity, farmers growing barley for malting or seed may want to test their grain to determine if germination has been affected.

More about frost

Air temperature is routinely measured at a height of 1.25 to 2.0 metres above the ground, which can be several degrees different than the temperature nearer to the ground or at the crop canopy height. One study found that minimum temperatures between May and October at grass height were on average 4.5° C cooler than those at standard measuring height.

The extent and severity of frost vary with topography, elevation, landscape, and proximity to other features such as bodies of water.

Radiation frosts occur on calm, clear nights when there is no cloud cover to stop the loss of radiant heat into the sky; these frosts can be sporadic and localized over the landscape.

Advection frosts are caused by large-scale cold air masses that tend to affect a region relatively uniformly. Advection frost can often allow unobstructed heat flow from the soil, leading to both types of frosts at once.

—Source: Andrew Nadler, agricultural meteorologist, Manitoba Agricultural Weather Program



Alberta is Barley Country.

This province grows more barley than any other province, and Alberta’s output typically accounts for half of Canada’s annual crop. Barley production for feed, malt and food is an important economic activity in Alberta.

See past issues *Barley Country* at www.albertabarley.com

Barley Country is published quarterly by the Alberta Barley Commission to inform producers of new technology and developments affecting barley production and to promote new markets for Alberta barley growers.

Barley Country is circulated to more than 30,000 producers, agronomists, researchers and grain industry representatives. One year subscription rates for non-members are \$15 within Canada and \$20 outside Canada.

Barley Country is printed on recycled paper using canola-based inks. Printed in Calgary, Alberta.

Editor: Terry Bullick, Bullick Communications Co. tbullick@telusplanet.net

Design/Layout: Sherry Mumford, Connections Desktop Publishing

Contributors: Robyn St-Hilaire, Richard Phillips, Lingyun Chin, Audrey Kirtzinger and Keiran Brett

Alberta Barley Commission
#200, 3601A – 21 Street NE
Calgary, AB T2E 6T5
1-800-265-9111

ISSN: 1188-8911

Getting more than one issue?
Please call 1-800-265-9111
and let us know.

support

Check-off dollars

The Alberta Barley Commission, the Alberta Pulse Growers Commission and the Alberta Winter Wheat Producers Commission are partnering in a campaign to promote the value of check-off dollars.

The campaign will emphasize the ongoing benefits pulse, winter wheat and barley growers—and their customers—realize from voluntary check-off dollars.

For the Alberta Barley Commission, the campaign coincides with its recent check-off rate change to \$1/tonne, effective Aug. 1, 2009.

The three commissions use check-off dollars to leverage government and industry funding; in barley’s case every \$1 of check-off funds is matched by \$5. In turn, these funds are used to develop new crop varieties, improve and refine agro-

nomics practices and disease and pest resistance, and develop new domestic and export markets.

While the remittance rate of check-off dollars to the Alberta Pulse Growers Commission is high, the Alberta Barley Commission and the Alberta Winter Wheat Producers Commission estimate that last year almost 50 per cent of potential check-off dollars were not submitted on barley and winter wheat. By law, pulse, barley and winter wheat buyers (as well as canola and soft wheat buyers) must, by law, deduct check-off dollars from their payments to producers and submit the funds to the respective commissions.

It is important to note that less than 10 per cent of producers request refunds for their check-off dollars. The vast majority see benefits be-

yond immediate returns.

“We know some people don’t agree with check-off dollars and we respect their opinions,” Greg Stamp, a barley seed grower in Enchant, Alta. and the Alberta Barley Commission director for Region 1.

“But I also ask them if the barley varieties they grow were developed in Alberta and where they go for information about regional varieties and disease control, or if they’ve sold their barley to a feedlot or maltsters. The Alberta Barley Commission uses check-off dollars to support all of those areas.”

The campaign will run from August and into the early part of 2010. It includes ads in each of the commissions’ newsletters and materials for distribution at trade shows, regional meetings and other industry events.

How will you harvest this year's crop?

To say it's been a challenging crop year, so far, is a gross understatement. The big question to be answered is whether there is enough of a crop to leave it to maturity and take it as grain or take it earlier as forage. When it comes to answering the when and how of harvest many producers are finding that they have fields where at least two crop stages are growing.

"Poor germination this spring, repeated frost events followed by a dry spell then rains in July, have led to multi-staged crops growing on most fields," Harry Brook, a crop specialist with Alberta Agriculture and Rural Development in Stettler, says. "This will make it a challenge to harvest as the first crop will be mature while second growth will just be coming into head or in full flower. Swathing this mixed-bag will probably not be an option as immature second growth will extend the time it takes to dry down the crop. Other issues include the date of the first killing frost. Crops are still almost two weeks behind on maturity compared to the long-term average."

The moisture received in early July did not, for the most part, completely fill the existing crop. A regular supply of moisture is needed to fill the crop. If hot and dry weather continues for the rest of early



August, promising crops will dry up and produce very little.

"Without additional moisture, the greater part of this year's provincial cereal and oilseed crops will go to salvage as forage," Brook says. "If crops are to be salvaged or written off, and the crop is under moisture stress, it is best for feed value purposes to harvest it earlier rather than later. Currently in the province, there is a definite market for salvaged annual crops to be harvested as silage or baled feed."

When salvaging a crop for stored forage or grazing, it's important to be aware of the fertilizer program that was used. High inputs of fertilizer,

~
If a crop will still provide sufficient yield potential to warrant harvest, the multiple stages of crop growth will have to be dealt with
 ~

especially nitrogen, can lead to potentially toxic levels of nitrates accumulating in the crop. Nitrates in high enough levels can result in the death of cattle by suffocation.

Nitrates can be dealt with through dilution with other feeds and by acclimatizing the livestock to the feed. Grazing animals can adapt to low to moderate levels of nitrates on pasture given time to adjust.

"If a crop will still provide sufficient yield potential to warrant harvest, the multiple stages of crop growth will have to be dealt with. Any second growth that started growing after June 15 has very little chance of making it to maturity. Second growth will only complicate harvest, as it will be too immature to add to yield. Immature seeds, if harvested, will downgrade quality and cause delays in drying down the ripe crop."

"This year's harvest is going to be a challenge," Brook says. "There is still some time before harvest and it is good planning to look at all contingencies prior to harvest beginning. If the crop is going to be written off, using it for forage may be the best alternative."

This article was originally published in the Aug. 10 edition of Alberta Agriculture and Rural Development's Agri-News. For further information, contact Harry Brook at 310-FARM (3276).

A word on desiccants

This fall, malting and shochu barley farmers with harvestable crops could well be looking at fields with varying growth stages. Bill Chapman, who is with Alberta Agriculture and Rural Development's Crop Business Development Branch, Rural Extension and Industry Development Division, warns against using desiccants to even out crop quality.

"Malting and shochu customers will not buy barley that's been treated with desiccants—

and they check for residues," Chapman says. "International customers that are building value chains want to ensure the best possible quality for their customers. They do not want any residue on their products and desiccants can affect germination in malting barley."

He offers two alternatives to using desiccants. The first is turning up the air on a combine to blow out green material; the method works best when crops are 90 mature. When using a

dryer, the maximum air temperature should not exceed 45° C (113° F) for seeding and malting barley; for feed barley, 80° to 100° C (176° to 212° F).

The second method is using aeration fans and/or heated air drying after harvest to shrink green material, then cleaning or processing the grain so it can be selected for shochu or malt. The cleanout will vary accordingly with samples.

managing

Knowing what bonding can and can't do for you

Bonding is to selling barley what crop insurance is to growing it: added protection. The first step in getting the most out of this risk management tool is to understand how it works—and its limits.

The Canadian Grain Commission's bonding, or payment security program exists to compensate farmers if licensed buyers (elevators and grain dealers) can't or don't pay for grains, oilseeds and pulses covered by the Canadian Grain Act.

The crops covered are: barley, beans, buckwheat, canola, chickpeas, corn, faba beans, flaxseed, lentils, mixed grain, mustard seed, oats, peas, rapeseed, rye, safflower seed, solin, soybeans, sunflower seed, triticale and wheat.

Producers are urged to make sure their buyers are licensed; a current list of licensed dealers is posted on the Grain Commission's website (www.grainscanada.gc.ca). These grain buyers must submit monthly

reports to the Grain Commission showing they have sufficient security to pay outstanding producer liabilities.

"We review their monthly liability reports and if we see their liabilities are exceeding the amount of the securities they have with us, we get them to increase it," says Catherine Jaworski, the manager of Policy, Planning and Producer Protection for the Grain Commission.

Companies do, however, go under

and farmers don't always receive 100 per cent of what they're owed. Payment is limited to the amount of the security posted with the Grain Commission.

It's at this point farmers may learn that bonding doesn't give them the coverage they think it will," says Albert Wagner, a barley farmer in Stony Plain and the Region 5 director for the Alberta Barley Commission.

Continued on page 5...

Finding better value in fibre

Mary-Lou Swift's current research project on forage barley is focused on finding the relationship between fibre content and fibre digestibility.

"High fibre content doesn't necessarily mean a variety has lower digestibility," Swift, a feed quality research scientist at the Alberta Field

Crop Development Centre (FCDC), says. "That's a misnomer."

The digestibility of dry matter intake, or feed, has significant implications for feedlots. Their number one concern boils down to getting as much energy as possible into the front end of an animal—and having as little as possible come out the back end.

Small grain cereal silages such as barley, triticale, winter wheat or oat silage are not a large part of a feedlot animal's diet as they are considered to be low in energy. Swift is studying fibre digestibility in all four grains and hopes to show cattle feeders they can substantially increase the forage content of the ration and decrease their overall feeding costs.

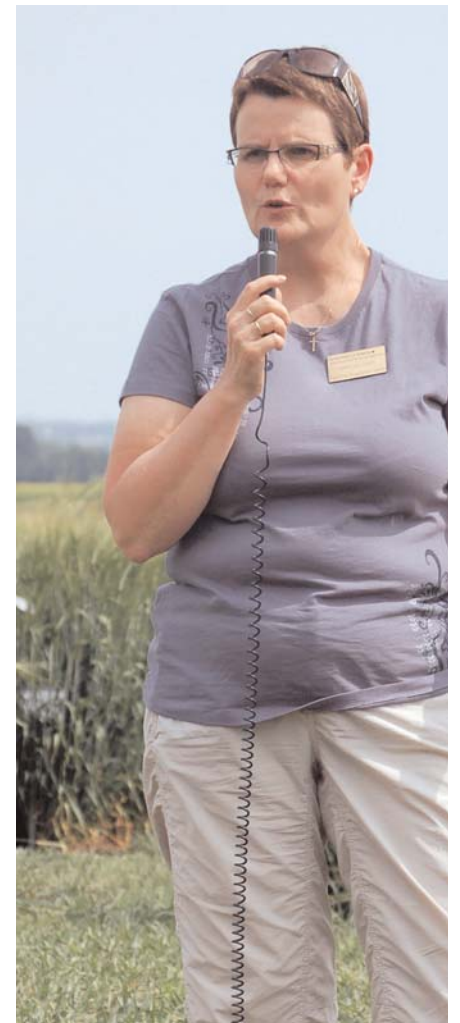
"It used to be that dairy cows got a much higher ratio of grain than they do today," Swift says. "We want to see if we can make the same kind of advance in cattle feeding."

The project's main goal, she says, is to give producers the ability to capture better value from barley forage by knowing its fibre digestibility. As well, with increased market demand, Alberta farmers could potentially harvest two crops of barley forage a season.

To date, Swift and her research team, which includes members from the FCDC and the University of Alberta's Faculty of Agricultural, Life and Environmental Sciences, have shown the fibre digestibility of hulled and hullless barley varieties ranges as much as 20 per cent.

Swift says the research team has yet to determine the exact in vitro fibre digestibility of each variety. They do know, however, that at about 50 per cent (and as high as 68 per cent), barley's overall fibre digestibility is comparable to corn silage's at 44 to 52 per cent.

Swift's project has captured widespread attention: more than 40 people attended her presentation with



Mary-Lou Swift (above) hopes her research project shows livestock feeders that they can increase their barley forage rations.



Masahito Oba of the U of A at the Lacombe Field Day on July 30. Their work was recently presented at the annual meeting of the Association of Animal Scientists recently held in Montreal and has resulted in enquiries from as far away as the United Kingdom and Norway.

Knowing what bonding can and can't do for you

Continued from page 4...

For example, if a failed company has a \$300,000 security posted and \$500,000 in liabilities (payables), farmers will only be eligible for 60 cents on the dollar.

Since 2002, Jaworski says, 10 grain companies have failed. Farmers subsequently received 100 per cent payment from six of the companies and from 28 to 98 per cent payment on the remaining companies.

"It's not 100 per cent coverage, but bonding has worked and we do everything in our power to ensure we have enough security in place," Jaworski says.

"It's like any business," Wagner warns, "buyers and sellers should be aware . . . My biggest concern with bonding is that it gives a sense of security that's not necessarily there. You need to be cautious."

Wagner would like to see alternatives to bonding and supports the government's proposed Bill C-13, which would end bonding by the Grain Commission. For now, however, bonding is the best way to reduce risk on grain transactions.

Quick (and important) tips on bonding

Deal only with grain dealers and elevators that are licensed by the Canadian Grain Commission. Bonding does not cover sales to unlicensed companies. An exception is feedlots, which are not licensed through the bonding program.

Ask grain companies for credit references; follow-up and/or conduct a credit check through Equifax (www.equifax.ca) or Dun & Bradstreet Canada (www.dnb.ca).

Always, always document your grain transactions. Understand and sign contracts; get receipts noting the grain, grade, weight, price and delivery date.

Ask for payment on delivery. Not always possible, but the longer you wait to be paid (or defer payment for tax reasons), the greater the risk of non-payment.

Do not deliver more grain until you've been paid for the first shipment.

Cash your cheque immediately; waiting is akin to loaning money or your barley to your buyer.

Contact the Grain Commission sooner rather later. The Canadian Grain Act provides security protection for up to 90 days from the delivery date only. If you wait 90 days to exchange your elevator or grain receipt for a cash purchase ticket or cheque, you are not covered.

Remember, bonding does not necessarily provide 100 per cent coverage of outstanding purchases. Payment is based on the value of the security the company has with the Grain Commission.

Contact the Grain Commission (toll free) with questions or concerns at (800) 853-6705.

New research focuses on nitrogen use

“Nitrogen is one of the major essential elements for crop growth and development and it is heavily used in modern agriculture to maximize yields,” research scientist Yadeta Anbessa Kabeta writes in his paper *Genetic variability in nitrogen use efficiency of spring barley*, published in the July/August 2009 edition of *Crop Science*.

While nitrogen is heavily used by farmers, it is not heavily utilized by barley crops. Barley plants take up only about a third of the nitrogen applied to them. The other two-thirds is lost through leaching, run-off and release into the atmosphere.

Kabeta is working on a research project with Patricia Juskiw at the Alberta Field Crop Development Centre and Allen Good at the University of Alberta to find out which varieties take up nitrogen the most effectively. He presented his initial findings at the Lacombe Field Day on July 30.

Project researchers are examining nitrogen efficiency (NUE) in barley and how it is affected by genetics and environment. Currently they're evaluating over 750 barley lines obtained from Canada, the United States, Australia and the International Center for Agricultural Research in the Dry Areas (ICARDA).

“We pull the plants at the anthesis (flowering) stage and send them to a lab to see how much nitrogen is in the leaves, stalks and heads,” Kabeta says.

The amounts may be minute on a plant-by-plant basis, but nitrogen is a huge cost for Alberta farmers. In 2008, Canadian farmers used about 3.6 million tonnes of nitro-

gen fertilizer; Alberta farmers used an estimated 450,000 tonnes. Statistics Canada estimates that fertilizer and fuels are 16.9 per cent of farmers' input costs, more than any other input cost.

“We're really looking to find a variety that takes up 10 or 20 per cent more nitrogen, so we could save barley producers about 10 to 20 per cent on their nitrogen costs,” Kabeta says. “And we don't just look at nitrogen use in isolation, we also look at the yield and protein and starch content.”

The project could also have an environmental benefit. Nitrous oxide (N₂O) emissions are 300 times more potent than carbon dioxide (CO₂, better known as greenhouse gas) emissions.

“We want the plants to use nitrogen more efficiently so these emissions can be reduced,” Kabeta says.

To date, his study has confirmed that Vivar, Xena and two other numbered varieties (H96014002 and H97097001001) are “superior in NUE” across high and low nitrogen applications. It is plausible, Kabeta says in *Crop Science*, that these varieties “perform well on low nitrogen environments because of their inherent nature; while at the same time these varieties can make good use of high nitrogen availability in environments where it is provided.”

The study, which is funded by the Alberta Crop Industry Development Fund and the Alberta Barley Commission, concludes in December 2009. Researchers hope to secure additional funding to further their crop development work.



Research scientist Yadeta Anbessa Kabeta (above) is leading a project that could ultimately reduce the amount farmers spend on nitrogen fertilizer. Below a test plot at Lacombe; Kabeta and his team are examining nitrogen use efficiency in 750 barley lines.



check-off dollars



REAL VALUE FOR YOU

Want the best value from the crops you produce?

Dollar for dollar, year in and year out, no other production cost is more affordable or generates more value than your check-off dollars. So for just pennies a bushel, your check-off dollars leverage government and industry funding, which together help breed new varieties, fine-tune agronomic practices, improve disease & pest resistance, develop new markets and much, much more.

An independent research study* says producers get a 300% to 1,200% return on their check-off dollars. And when producers sell their crop to licensed dealers (who, by law, must collect and submit check-off dollars on your behalf), the return on investment extends up and down the value chain to feedlots, livestock producers, maltsters, seed growers, food processors and ag suppliers. That means your check-off dollars work—creating **real value for you**—and for everyone in Alberta's agricultural sector.

A joint message from:



* Western Grains Research Foundation study, 2005

Storing practices as important as growing practices

With overall margins tighter and yields lower this year, good storage equipment and practices are more important than ever for barley growers to get the full value from their crops.

Bin or bag?

The Canadian Grain Commission recommends storing all grains, oilseeds and pulses in steel bins.

“Well-constructed, weather-proofed bins are essential to prevent infestations and to preserve crop quality during long-term storage,” the Grain Commission advises. “Bins on high, well-drained land protect the crop from heavy rainfall and spring floods. Steel bins, when empty, provide fewer places for insects to breed than empty wooden granaries, but residual insects can be present in dust and chaff under perforated floors.”

Prior to storage, bin floors and walls should be swept or vacuumed and any collected grain that’s spoiled or contains insects or excreta should be burned or buried. Check the bin for cracks and seal any openings to protect against rain, snow and pests. Do not spray bins with a contact insecticide if they are going to be used to store malting, food or shochu barley.

A growing number of farmers are avoiding bins altogether, opting for plastic grain bags instead.

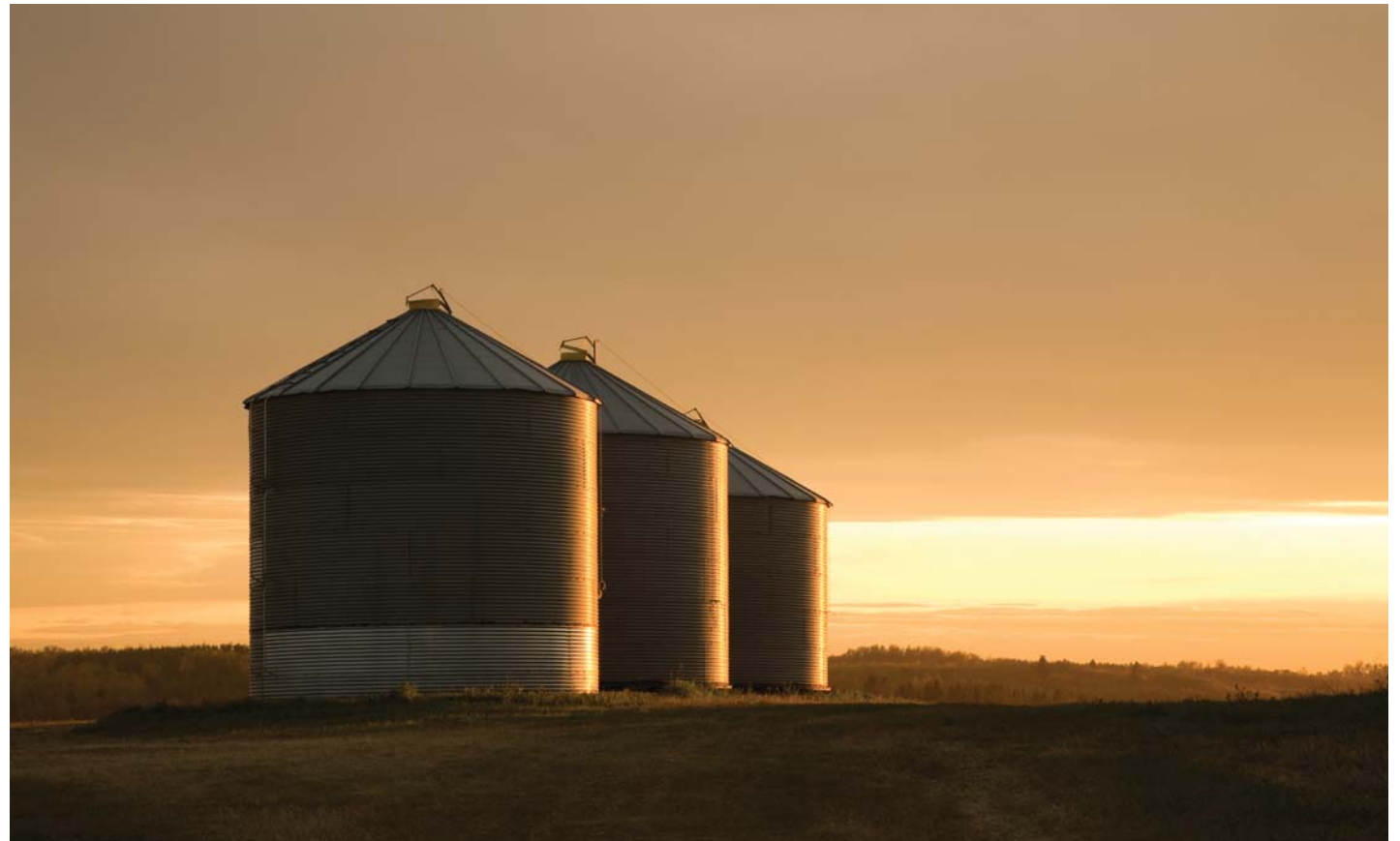
Aaron Yeager’s company, Silobags in Lake Lenore, Sask., sells plastic grain storage bags to producers across the prairies. He estimates the company’s bags were used to store about 18 million bushels of grains, oilseeds, pulses and other agricultural products in 2008. Yeager used the bags on his own farm to store malting barley.

“A lot of it went in the bags tough (moist) at 17 per cent moisture and we had no problems,” Yeager says. He explains the airtight bags are made of two layers of low-density plastic bonded together; the outside layer is white and the inside layer is black, providing protection from ultraviolet light. Grain is blown into the bag; vents at the front and rear force out much of the remaining air and then the bags are sealed. The grain consumes any air left in the bag, replacing it with CO₂ and pulling the bag tighter.

Grain Bags Canada, Silobags’ manufacturer, says grains stored in the long plastic tubes retain their quality, including colour. Yeager says grain can be stored in the bags for up to two years for about eight cents a bushel.

While grain bags may offer value, not everyone is convinced about their effectiveness.

Bill Chapman of Alberta Agriculture and Rural Development’s Crop Business Development



Branch, Rural Extension and Industry Development Division says the problem with bags is that grain has an airflow pattern depending on the season.

“There’s no way if you put grain in a bag that it’s going to respire so it has to be bone dry at a lower temperature going in because it goes through sweat after you harvest it,” Chapman says. “I know bag storage is becoming a popular thing especially with rented land here, there and everywhere, but from my own experience I’d feel safer piling grain on the ground and covering it with a tarp than with putting it in a grain bag—but that’s just my opinion.”

Mike Leslie, the CEO of the Alberta Barley Commission, says: “It is important to make sure your malting or shochu barley buyer is satisfied with the quality of your crop regardless of how it is stored. Some maltsters have not yet decided if bagging is an acceptable storage option for malting barley.”

At different times and for different reasons, farmers may have to use other short-term or emergency grain storage. This includes covered piles and suction fans; snow fencing and paper; woven wire bins; plank bins; baled straw or hay and wire ties; plywood bins; commercial storage and other farm buildings. All can be effective when properly maintained and monitored.

Two other notes: grain stored temporarily on the ground should always be in conical piles. And new grain should never be stored on top of old grain.

Temperature and moisture

“You’ve paid a lot of money for your barley crop, you don’t just throw it in a bin and forget about it,” Alberta Ag crop specialist

Harry Brook says.

Regular monitoring of temperature and moisture are crucial when storing any grain. The maximum moisture content for malting barley is 13.5 per cent; for feed barley, it’s 14.8 per cent. In practice, though, Alberta Agriculture and Rural Development says safe moisture content levels are one to two percentage points below that.

Jay Burrows of Western Feedlots in Strathmore says his company accepts feed barley with a moisture content of up to 15.3 per cent before it starts discounting the purchase price.

Grain that is stored tough should be examined at least every two weeks. One way is to push a hand or a rod into the grain as deeply as possible to feel for warmth or crusting.

Heated or mouldy crops should be dried, says the Grain Commission. If the heated grain cannot be dried immediately, deterioration can be reduced by cooling the grain by aeration or by moving and mixing it with cooler grain.

Chapman says many malting and shochu barley farmers are permanently installing probes in their bins to measure temperature and moisture throughout their bins.

“I know it’s an extra cost but you’ve got to protect your product investment and quality to compete in the international markets for these new premium grains,” Chapman says. “Nobody wants to deal with heated grain—heated grain forces you into the feed market and you end up suffering a major income loss.”

An aeration system will keep grain temperature down as it respire and reduce moisture migration.

If malting barley must be dried, maltsters prefer it dry naturally. Michael Brophy, the executive director of the Brewing and Malting

Barley Research Institute in Winnipeg, says farmers should follow proper procedure when artificially drying their grain.

“Grain is delicate because the germ is living and you don’t want to kill it,” Brophy says.

When using a dryer, the maximum air temperature should not exceed 45° C (113° F) for seeding and malting barley; for feed barley, 80° to 100° C (176° to 212° F).

Pests and excreta

“It’s far easier (and cheaper) to prevent insects, mites and moulds through proper storage than to try and control them later. This includes proper cleaning and preparation of bins and storage containers ahead of time; regularly monitoring bins and grains; taking samples to check for insects and insect damage; aerating or turning grain.

In the event of an infestation, the Grain Commission recommends a number of physical and chemical controls, including fumigation, malathion, cooling, heating and cyclone-based grain vacuators.

Bin- or bag-stored barley is usually well protected from grazing animals, although leaks can attract them and make a perfect gateway for mice and other small rodents. Grain that’s stored outside on the ground should be cleaned of excreta; grain handlers, maltsters and shochu barley buyers have a zero-tolerance; feedlot operators may or may not accept grain with excreta.

For more detailed information, see: *Cereal grain drying and storage* at www1.agric.gov.ab.ca or *Managing the quality of stored grain* at www.granscanada.gc.ca.

Farmer follows nature and tradition

“The crows are grouping early this year. I think we’re in for a wet harvest,” 52-year-old Vegreville farmer and Region 4 delegate Bernie Klammer predicts.

Klammer is a keen observer of nature who studies its “tell tale” signs to shape the decisions that have made his 1,600-hectare (4,000-acre) mixed farming operation a success over the years. This past spring, when conditions turned dry and cold, he chose when to seed by simply paying attention to the world around him.

“I watch the weather patterns. I notice when the ducklings hatch. This year, I seeded when the buffalo beans bloomed, around May 16, well after the calendar’s recommendation,” Klammer says.

The cereal grains he planted in mid-May are doing better than the crops he planted earlier in the season. Still, with 1,200 hectares (3,000) acres committed to wheat, canola, peas and barley, he worries poor conditions this fall will adversely affect his crops’ variability, maturity and production. He’s already had to revise his crop plan: in mid-June, Klammer replanted 200 hectares (500 acres) of canola after five late and killing frosts.

“We reseeded with forage barley within days of the last frost. Our pre-seed and pre-harvest chemical rotations over the years have paid off by



Vegreville barley farmer Bernie Klammer (above) relies on nature as much as established farming practices to raise crops on his family farm. Photo: Audrey Kirtzinger

giving us cleaner fields, helping us be successful in dry years. With 420 hectares (1,050 acres) of barley, we’re going to have enough feed for silage,” Klammer explains. He grows Xena and Trochu feed barley after past attempts at growing malt barley resulted in protein levels too high for acceptance.

Klammer’s trust in nature seems to sprout from his preference to keep things simple, efficient and within tradition.

“Farming takes a lot of persistence, but not a lot of glitz—I remember swathing without a cab. You

don’t need leather seats and a GPS (global positioning system) in your equipment when you’re starting out, although GPS has its benefits. It’s also wise to work under someone’s wing,” Klammer advises.

He has certainly leveraged the wisdom of his late parents, Clarence and Mary, in his farm operations. Klammer, started working the family farm, on which he was raised, after graduating from high school in 1975. In 1978, his parents sold him his first quarter-section of land.

“One thing I learned is not to fool yourself about your situation,” says

Klammer, referring to his parents’ decision to stop raising dairy cows due to labour costs. Using similar logic, Klammer shut down his farrow-to-finish hog operation eight years ago when profits waned. He currently has a purebred herd of 120 Simmental cattle grazing on 200 hectares (500 acres) of pasture.

“My 11-year-old son, Kaleb, is my number one cow man. He’s not so sure about grains yet,” Klammer laughs.

While Kaleb has yet to warm to working in the fields, he recently exhibited Klammer farm cereal grains at the annual Vegreville Country Fair and Exhibition, something that Klammer’s other children – daughters Kaleigh, 20, Karlana, 24, and son Kris, 27 – did when they were younger.

“My mom was an exhibitor at the fair every year for 50 years. It’s a family tradition,” Klammer explains.

While his time is taken up by the farm, wife Georgina is busy with her three dance studios in Vegreville, Viking and Irma. Klammer’s grown children are pursuing their own career paths. But when it comes to harvest, his family pitches in, especially Kris, who hauls grain, and son-in-law Tim, who relieves Georgina on combining when needed.

As it stands, Klammer’s already making observations to determine when to harvest. That’s just his nature.

industry

Feed grain research update 2009

by Kieran Brett

The way Jim Gowans sees it, Western Canada’s pork producers have been in an energy crisis for some time.

“We need improvements in energy digestibility and more energy per acre of grain,” says Gowans, who is involved in a pork production management company and feed mill in Irma, Alta. and sits on the Western Grains Research Foundation’s advisory committee. “Energy is by far the most expensive nutrient, at over 80 per cent of the diet cost.”

Gowans and the country’s pork producers have a message: it’s time to solve the energy crisis.

John Kennelly agrees.

“We want to capture as much of [feed’s] nutrients as possible in the end-product, whether it is meat, milk or eggs,” says Kennelly, dean of the University of Alberta’s Faculty of Agricultural, Life & Environmental Sciences.

As a long-time dairy cow researcher, he sees how processing and feeding strategies can meet new demands from society.

“For one thing, there is concern about nitrogen and phosphorus in manure. If we can capture more of the nitrogen in product it will reduce the amount of nitrogen coming out of the animal,” Kennelly says.

Most everyone knows that different grain varieties embody different attributes, but environmental factors affect grain variability far more than genetics.

“About 80 to 90 per cent of the variability relates to the environment and just 10 to 20 per cent is about genetics. The question is, when you have a range in quality, how do you put a value on feed?” says Ruurd Zijlstra, an associate professor of Agricultural, Food and Nutritional Science at the University of Alberta.

Zijlstra and Jim Helm, Alberta Agriculture and Rural Development’s head of research for Feed Crops, are developing calibrations for feed quality using NIRS (near infrared re-

flectance spectroscopy) which is faster and more affordable than wet analysis. NIRS uses light energy to measure the chemical bonds containing hydrogen within grain. This produces a unique “spectral” fingerprint that is then compared to the chemical composition of a sample to produce a calibration model.

NIRS is not just about knowing what’s in the feed, but about knowing how the feed can be amended to achieve a desired nutritional end.

Feedstuffs can be fermented or steeped in water before being fed to livestock or the fibre can be removed mechanically. One typical amendment to feed is phytate, an enzyme that improves feed grains in at least two ways. First, phytate helps break down the fibre (improving digestibility) and, second, it reduces phosphorous content.

“Phytate breaks down the naturally occurring phosphate in grains that pigs and chickens can’t use,” says Vince Gabert, an animal nutritionist with Unifeed Viterra in Sherwood Park.

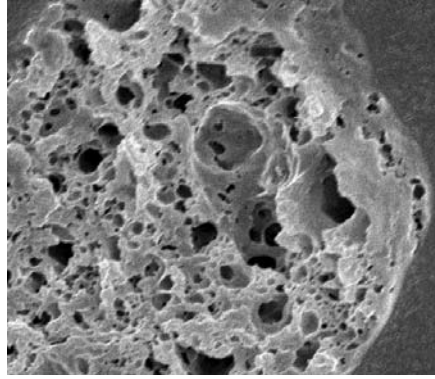
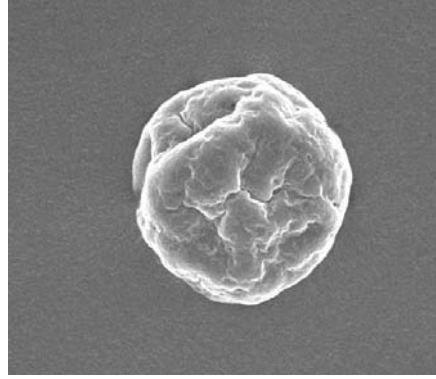
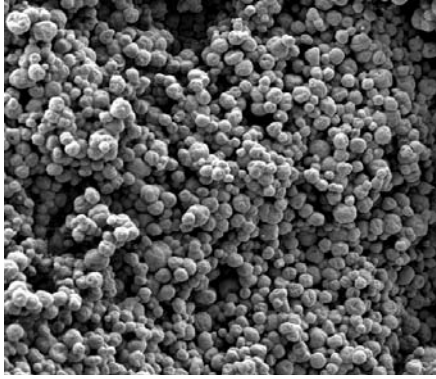
Research shows that phytate enzymes can increase phosphorus uptake in pigs by up to 70 per cent, with a corresponding reduction of phosphorous in the manure.

An important part of daily operations for animal nutrition specialists across Canada, specific enzymes are being used on specific crops such as barley and wheat. Before long, many more enzymes will be available.

“For example, you could have an enzyme that’s specifically for distillers grain from wheat,” says Gabert. “Distillers grain is very high in fibre, and a specialty enzyme will be helpful in breaking down the fibre, to improve nutrient availability for the animal.”

Looking ahead, all these emerging tools, additives and processes serve the same aim: providing greater feed value at lower cost to the producer and with less impact on the environment. While feed grains processing is important today, there’s much more in store for the future.

Using barley protein—on a very small scale



The two photos on the left show barley protein converted into microencapsulations. The photo second from the right shows barley protein microencapsulations uniformly distributed with fish oil. The photo on the far right shows beta-carotene incorporated into a nanoencapsulation of barley protein.

by Lingyun Chen

Through my work in the Cereal Protein Research Program at the University of Alberta's Department of Agricultural and Food Science, it's my job to find new valued-added uses for barley protein.

Barley's second largest component, after starch, is protein, and if it is used to its maximum potential, it can be worth about 10 times more than the whole barley grain. To achieve this potential three things need to happen. One, we have to find a technologically and economically feasible way to extract barley protein from the whole grain. Two, we have to understand the characteristics of barley protein and lastly where (or if) they fit into the marketplace eco-

nomically and functionally.

So far, we've optimized barley protein extraction on a small scale in my University of Alberta Edmonton lab. We've been able to extract 80 per cent or more of highly purified hordein (barley prolamin protein), which makes up 40 per cent of the protein in barley. Hordein is soluble in alcohol but not water, making it ideal for microscopically encapsulating nutrients for food or ingredients for use in bio-plastics.

We have also been able to extract other protein fractions from pearled barley and barley pearling flour.

We were then able to convert barley protein into microencapsulations and fill them evenly with droplets of fish oil (which is high in Omega 3). These fish oil microencapsulations could some day be added to food like yogurt, beverages (such as orange

juice) or sausage to shield against the unpleasant smell of fish oil, which can quickly become rancid when stored. These capsules are so small (just a few micro-metres in diameter) that they are like powder and do not affect the way the food tastes, smells or feels. In the body, however, the capsules would break down and release the healthy components into the bloodstream.

In other research, we were able to use barley protein on an even smaller scale: nanoencapsulations, which are smaller than a human cell. In one instance, the tiny capsules incorporated beta-carotene, which has been shown to have excellent antioxidant qualities that can reduce the risk of cardiovascular disease, cancer and aging-related diseases. Although beta-carotene is abundant in vegetables and fruits, humans can absorb only

about 10 per cent of the beta-carotene in foods. Our nanoencapsulations would significantly improve absorption in the human body of beta-carotene in functional foods.

These findings are innovative and exciting—and they offer some new and dynamic opportunities for barley producers. The next step in development is to optimize barley protein extraction, the microencapsulation and then nanoencapsulation on a larger scale.

To do these, we're currently seeking new research funds for new equipment to make this science a revolutionary advance in food and nutrition.

Lingyun Chen's work at the U of A has been jointly funded by the Alberta Crop Industry Development Fund and the Alberta Barley Commission since October 2007.

Selling barley has its complexities

Continued from page 1...

Dave Seifridt, Marketing and Logistics Manager, Lethbridge Inland Terminal Ltd.

"What do I see right now (in mid-August) for sales? I see really very little and don't expect to see any demand until some calves come in," Dave Seifridt says.

When and if that demand materializes, barley will face some tough competition.

"I just saw 11,000 tonnes of corn distillers grain come in from the U.S. and I've heard trainloads of corn can be loaded and delivered to Lethbridge for \$164 and \$165 a tonne. That's really going to put a ceiling on our feed barley price . . . I can see (prices for barley) starting to soften already."

Farmers who want to hold their feed barley "tight in their hands" in the hopes of rising prices may be disappointed, say Seifridt. "We're seeing cash bids of \$170 or less and that's all the way out to March (2010)."

A recent softening for malting barley also appears to be emerging. "I've had several customers calling about malting barley contracts but maltsters are holding out with what they have and waiting to see what the final crop will be. Again, who knows what the weather will do to malting barley."

Harry Brook, Crop Specialist, Alberta Agriculture and Rural Development

As always, Harry Brook says, barley price will follow corn prices.

With the U.S. Grains Council calling for the second-largest American corn crop, both most grain prices are expected to decrease.

"What happens in Alberta doesn't really affect the prices," Brook says. The result, he says, is that overall (global feed) prices are not particularly attractive at this point.

Making matters worse, he says, is that the "market is dysfunctional" because grain is now bought and sold more by financial speculators than by grain users.

"It's almost like we're seeing a divergence of the future markets from supply and demand . . . it seems like there's no connection between supply and demand," Brook says.

Brad Vannan, ICE

ICE Futures Canada, Inc. has developed a new western barley futures contract, officially called the New Delivered to Lethbridge Area Western Barley Futures Contract—Rule 19. Fundamental in structure and designed specifically to represent the cash trade of barley in southern Alberta, the new contract is "more

relevant to the domestic (feed) market" that its predecessor and was drafted with the help of several industry experts, Brad Vannan, the president and chief operating officer of ICE Futures Canada, says.

"Southern Alberta has the highest feed barley consumption in Western Canada and therefore acts as a benchmark for most of the feed grains consumed in Western Canada," Vannan says. "The design of the contract promotes strong convergence between cash and futures and therefore basis risk should be lower than we have experienced in the past."

He adds the contract will provide barley producers excellent price discovery. Grain companies and feedlots have already told the company they plan to use it to offer basis contracts for both nearby and deferred delivery positions, which will make it an important risk management tool as well.

Vannan stresses it's important for barley producers to know the difference between this and the previous version of the contract (the "old" version will be delisted Dec. 31, 2009). Producers can find those differences in a brochure posted on ICE Futures Canada's website at: (www.theice.com/publicdocs/ICE_Barley_Brochure.pdf). Local eleva-

tor managers and brokers are also well informed about the contract. For feed barley marketers, this is a valuable new tool for price setting and discovery.

Jay Burrows, Western Feedlots

Jay Burrows estimates his company will feed more than 75,000 head of cattle in the next six months. But he predicts the demand for Alberta-grown feed barley will soften for two reasons: cheap corn distiller grains and corn from the United States.

Nonetheless, Western Feedlots expects it will still depend on local feed barley for a good portion of its rations. The company is partial to Xena and Dolly and pays a premium for plumpness. Discounts apply if the grain moisture content is more than 15.3 per cent. Burrows says the company will also consider buying feed wheat, depending on its price. Demand for feed peaks from March through June and Western Feedlots usually contracts six to eight months in advance to meet it.

In August, Burrows was less worried about buying feed barley grain than he was about buying roughage. "The price of hay (in August) about \$150 to \$170 a tonne, although that could change drastically in a month," he says.

Keeping producer priorities alive during an Ottawa summer

Although Parliament did not sit over the summer months, the Grain Growers of Canada (GGC) was able to make significant progress on a number of key files.

Trade

When Canada was in the early stages of talks with some smaller markets in the Caribbean, we met with senior trade officials and members of Parliament to stress the importance of larger markets. In part because of pressure from groups such as the Grain Growers, we helped push the government to start talks with the European Union, a huge potential market for Canada.

Bilateral deals, however, can only do so much. They reduce tariffs, but cannot tackle trade-distorting export subsidies and domestic support programs the same way World Trade Organization (WTO) agreements can. WTO talks are slated to start again in the fall, with the goal of finishing the Doha round. We will be advising our negotiators on the importance of a successful round.

Canadian Wheat Board

We reached out to the Canadian Wheat Board (CWB) to work on improving the director election process. Having a good voter list and a minimum tonnage for ballot eligibility (to screen out non-farmers) is in the best interest of everyone, and we look forward to positive legislative change this fall.

Too much water and too little water

It has been a tough summer with unseasonably cool temperatures and a lack of precipitation in some areas and an abundance of precipitation in other parts. We have pushed the federal and provincial governments to prepare their staff for a busy claim season. Nothing is more frustrating to farmers than calling staff that are unable to answer basic questions. Farm programs have money and there is no reason it can't flow in a very timely basis this fall if training and preparation are in place.

Biotech wheat

Recently, the GGC, the Alberta Winter Wheat Producers Commission and the Western Canadian Wheat Growers Association reached an accord with Australian and American millers and



Richard Phillips

wheat growers to support biotech wheat. Although some years away, the application of biotechnology in wheat research has the potential to improve yields through breeding in traits to address environmental factors (such as drought and cold tolerance), combat weed or insect infestations (midge, sawfly, etc.), improve disease resistance (Fusarium and new strains of stem rust such as Ug99) or improve the plant's nutrient uptake.

Public research

Our biggest issue moving forward is the need for greater funding of A-base public research at Agriculture and Agri-Food Canada. Over the past 10 years, funding has dropped off for basic agronomic research in crops such as wheat, barley, oats, pulses and oilseeds. The private sector does not spend much in this research, as there is often no [commercially advantageous] return on investment, so there is a key role for the public sector to fill.

The GGC has formed a national coalition with other commodity groups to push for a doubling in A-base research funding to ensure our farmers are competitive internationally.

New members

Over the past year, the GGC accepted four new members: the Prairie Oat Growers Association, the Oat and Barley Council of Ontario, the Alberta Grain Commission and the Canadian Young Farmers Forum. We also have several other groups interested in joining the organization as it is seen as an effective voice for farmers in Ottawa.

We will continue to build on our successes and to effectively represent ABC at the table in Ottawa.

Richard Phillips is the executive director of the Grain Growers of Canada and is based in Ottawa.



Save the day!

Plan to join us

Dec. 11/09

for Alberta Barley
Commission's
annual general meeting
in Banff, Alberta

It's your lifeline to Alberta's
barley community and
the latest in barley research,
policy & market development.

To register early, call:
1-800-265-9111

News and events

Australian Barley Technical Symposium

September 13–16, 2009

The Australian Barley Technical Symposium at the Twin Resorts at Queensland's Sunshine Coast is Australia's premium barley-industry event. The symposium addresses a broad range of topics with critical points of discussion on: novel strategies for barley quality; barley breeding and environment, adaptability and biotechnology; innovation and fast tracking for success; marketing and optimizing the value chain; malting, brewing, feed and food future solutions. For details, visit: www.abts.com.au/.

Canadian Fertilizer Products Forum

October 14–15, 2009

The Canadian Fertilizer Products Forum is a stakeholder-led initiative launched in November 2006 to improve the regulatory system for fertilizers and supplements and to build a national consensus with all stakeholders. This year's forum is at the Albert at Bay Suites in Ottawa. For registration, call 1 (800) 423-9088 (booking code 122450); for more forum information, visit: <http://cfpf-fcpf.ca/>.

34th North American and European Union Agricultural Conference

October 19–21, 2009

This year's 34th North American and European Union Agricultural Conference in Niagara Falls, Ont., brings together farm leaders and producers from the European Union, United States, Mexico and Canada to discuss key issues and challenges and to share strategies and solutions to capture opportunities. Speakers include Gerry Ritz, minister of Agriculture, Agri-Food Canada; Juan Carlo Cortés Garcia president of Mexico's National Agricultural Council; and David Walker, chair of the World Trade Organization agricultural negotiations. For more information, visit: www.cfa.fca.ca.

The Royal Agricultural Winter Fair

November 6–15, 2009

The Royal Agricultural Winter Fair is a unique event that takes place every November in Toronto. It is the largest combined indoor agricultural fair and international equestrian competition in the world. Hundreds of thousands of attendees come to learn, compete, shop and have a great time with friends and family. Admission varies from \$14 to \$70; for more information, visit: www.royalfair.org.

Farmfair International

November 6–15, 2009

Experience country life first-hand and enjoy great western hospitality at Farmfair International. Each year, Northlands AgriCom in Edmonton welcomes international guests and local ranchers who come together at Farmfair International to purchase and sell some of the finest animals in the world. Along with all the livestock and industry talk comes a wagonload of western excitement including draft horse pulls, stock dog trials and team penning competitions. Registration is just \$5. For more information, visit: www.farmfairinternational.com.

Alberta Barley Commission regional and annual general meetings

Region 1

Dec. 2, 2009 at Luigi's Steakhouse in Lethbridge. Confirmed speaker to date: Ken Coles from Southern Applied Research Association.

Region 2

Nov. 16, 2009 at the Three Hills Community Centre in Three Hills; joint meeting with Alberta Pulse Growers Commission and Alberta Canola Producers Commission. Confirmed speakers to date: Neil Harker and Kelly Turkington of Lacombe Research Centre.

Region 3

Nov. 23, 2009 at Lacombe Memorial Centre, Lacombe; meeting details to be announced.

Region 4

Date, speakers and location to be announced.

Region 5

Nov. 19, 2009 in Westlock; joint meeting with Alberta Canola Producers Commission.

Region 6

Date, speakers and location to be announced. More details to come on the Commission website: www.albertabarley.com.

Annual general meeting

Dec. 11, 2009 at Banff Park Lodge in Banff. Speakers, agenda and registration details to be announced on the Commission website www.albertabarley.com.

New barley foods will benefit industry

A new website launched in May 2009, www.canadianfoodbarley.ca, is promoting the value and benefits of using barley as a food ingredient. Geared to commercial bakers and food processors, the site offers a range of information gathered and developed in a project by the Canadian International Grains Institute (CIGI) in Winnipeg and the Food Processing Development Centre in Leduc. Launched in April 2008, the project is focused on developing barley products jointly with food and ingredient companies.

"The website is a useful resource on how hullless barley is an excellent ingredient as a whole grain flour in various foods. It covers topics of interest to consumers, producers and food companies such as the nutritional benefits, production, statistics and provides other links," says John Dean, project manager for food barley at CIGI.

"We have been working with companies to include hullless barley, mainly as a whole grain flour ingredient, into established North American foods such as bread, cereal, pasta, baked goods and meat products to create new ones that will provide greater health benefits for consumers."

He says hullless barley varieties can be milled into 100 per cent whole grain barley flour that contains high levels of beta-glucan soluble fibre, which can reduce serum cholesterol and risk for heart disease and regulate blood sugar levels that can help prevent diabetes.

In December 2005, the U.S. Food and Drug Administration approved a health claim allowing U.S. food manufacturers to state that foods containing barley may reduce the risk of coronary heart disease.

The Alberta Barley Commission is leading a coalition to obtain approval for a similar claim in Canada.

The food research project is funded by the Advancing Canadian Agriculture and Agri-Food (ACAAF) Program, Alberta Barley Commission, and Canadian Wheat Board. The project aims to promote the use of Canadian food barley through research and new product development.

The project is expected to finish in October 2009 but Dr. Linda Malcolmson, director of special crops at CIGI, says plans are underway to renew funding.

Government improves access to capital for farmers

The federal government passed new legislation in June to give new farmers, agricultural co-operatives and young farmers full access to \$1 billion worth of government-backed credit.

The funds will be available through Canadian Agricultural Loans Act (CALA) over the next five years.

"Significant changes are occurring in the agricultural sector and programs have to change too," said Jean-Pierre Blackburn, the minister of National Revenue and Minister of State (Agriculture). "With more farmers retiring and financing becoming more difficult, the amendments give timely access to loans for beginning farmers."

With these changes:

Farmers now have access to greater amounts of credit: loan guarantee limits of up to \$500,000, double the previous limit.

New farmers are now eligible for loans that they were previously ineligible to receive.

Agricultural co-operatives with a majority farmer membership are eligible for loans of up to \$3 million for the processing, marketing or distribution of farm products. Loans were previously limited to co-operatives owned 100 per cent by farm members.

Loans of up to \$500,000 are available to help young farmers taking over their family farm. These loans were not available under the previous legislation.

A new online system will be developed to improve program delivery.

For more information on CALA, call 1-888-346-2511 or visit www.agr.gc.ca/cala.

To have your event listed in *Barley Country*, submit it by fax to (403) 291-0190 or by email to barleyinfo@albertabarley.com.

ALBERTA BARLEY COMMISSION KEY CONTACTS

Alberta Barley Commission

#200, 3601A 21 Street N.E.

Calgary, AB T2E 6T5

Phone: (403) 291-9111

Toll free in Alberta: (800) 265-9111

Email: barleyinfo@albertabarley.com

Web: www.albertabarley.com

Chairman & director-at-large

Terry Young, Region 3

RR 2, Lacombe, AB T4L 2N2

Phone: (403) 347-7664

Fax: (403) 347-7354

Email: tcyoung@yourlink.ca

Vice-chairman & director

Albert Wagner, Region 5

Box 2826, Stony Plain, AB T7Z 1Y3

Phone: (780) 963-7753

Fax: (780) 963-8753

Email: ajwccr@xplornet.com

Directors-at-large

Glenn Logan, Region 1

PO Box 249 Lomond, AB T0L 1G0

Phone: (403) 792-3696

Fax: (403) 792-3397

Email: seed@wheatcrest.com

Leo Meyer, Region 6

RR #1, Woking, AB T0H 3V0

Phone: (780) 774-2051

Fax: (780) 774-2246

Email: mgrain@telusplanet.net

Regional directors

Greg Stamp, Region 1

Box 1822 Enchant, AB T0K 0V0

Phone: (403) 739-2646

Fax: (403) 739-2167

Email: stamp.greg@gmail.com

Matt Sawyer, Region 2

Box 97, Acme, AB T0M 0A0

Phone: (403) 546-2259

Fax: (403) 546-2256

Email: sawyer.m@airenet.com

Trevor Petersen, Region 3

RR1, Penhold, AB T0M 1R0

Phone: (403) 886-4717

Fax: (403) 886-4719

Email: wavylakefarm@xplornet.com

John Wozniak, Jr., Region 4

Box 671, St. Paul, AB T0A 3A0

Phone: (780) 645-6955

Work: (780) 645-5915

Email: wozfarm@mcsnet.ca

Albert Wagner, Region 5

Box 2826, Stony Plain, AB T7Z 1Y3

Phone: (780) 963-7753

Fax: (780) 963-8753

Email: ajwccr@xplornet.com

Ron Heck, Region 6

Box 817, Fairview, AB T0H 1L0

Phone: (780) 835-4431

Fax: (780) 835-2168

Email: rheckfarms@hotmail.com

Administration, (403) 291-9111

Mike Leslie, CEO, Ext. 26

Nikki Jeffrey, Manager,

Office & Projects, Ext. 25

Queena Zhang, Accountant, Ext. 24

Darcy Kirtzinger, Policy & Research

Coordinator, Ext. 23; cell (780) 878-3237

Mandi Tilleman, Office Administrator,

Ext. 21

Terry Bullick, *Barley Country* Editor,

(403) 246-5225 tbullick@telusplanet.net

