

**FOOTHILLS FORAGE  
AND GRAZING ASSOCIATION**  
Sustainable Grazing Solutions

# 2011 Annual Report



# **Foothills Forage & Grazing Association**

## **2011 Annual Report**



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*Foothills Forage & Grazing Association encourages a profitable and sustainable forage industry by providing an information network for southern Alberta producers.*

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## Mission Statement

FFGA provides relevant unbiased sustainable forage and livestock information to producers in partnership with industry, government and the agricultural community. FFGA is a producer driven volunteer association leading the industry to long term sustainability through research and development.

## 2011 Board of Directors

President:  
**Morrie Goetjen**  
Cochrane  
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Vice President:  
**Ian Murray**  
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**Alex Robertson**  
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**Candice Manshreck**  
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**Rick Kohut**  
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**Phil Rowland**  
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ARECA Rep  
**Graeme Finn**  
Crossfield  
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**Wayne Robinson**

Staff  
Manager  
**Laura Gibney**  
(403) 652-4900



Top (left to right): Rod Vergouwen, Morrie Goetjen  
Middle: Rick Kohut, Ian Murray, Graeme Finn, Alex Robertson  
Front: Sean LaBrie, Brian Rodger, Laura Gibney (manager), Blaine Treloar, Wayne Robinson  
Missing: Phil Rowland and Candice Manshreck

## President's Report

Well, another year at Foothills Forage and Grazing is in the can and we're already on the brink of our Annual General Meeting. This has been yet another productive year for us, and we sincerely hope that our productivity has aided in the productivity of our membership. We have again done field trips and seminars with some of the highlights including Dr. Gordon Hazard, Charley Orchard, Don Campbell, Andy Sirski and basically wrapped-up the year with Temple Grandin and Brenda Schoepp at Olds College. Although, many of our endeavors are self-funded by door receipts, we continue to receive terrific support from our corporate sponsors, the provincial government, as well as several area counties. As many of you know by now, we have 'expanded our horizons' and continue to assist our membership and producers by arranging international agricultural tours. In November of 2010 we conducted our first international trip, when we arranged for a tour of Brazil and followed that up with a trip down the Mississippi in November of 2011. In November of this year, we are planning an agricultural trip to New Zealand, with spots going fast, so make sure you see Laura about getting your tickets reserved sometime before April 30<sup>th</sup>.

Here at Foothills Forage and Grazing, your Board of Directors (who are all volunteers) continue to search for the latest, newest and most pertinent speakers and general information for our membership. If you have any suggestions that might fall into one of these categories, please contact any member of board and we will investigate further and perhaps, put them on the agenda!! As I said, this past year has just flown by and I'd like to thank all the members of our board for their hard work and dedication. This board of directors continues to amaze me. Also, I'd be totally remiss if I didn't thank our manager, Laura Gibney, for her tireless efforts in the day-to-day operations of this organization. To say that we could not run this organization without her, would be a huge understatement. Thank you Laura and thank you to all our members (board members included) for supporting our programs and field trips.

Yours truly,

*Morrie Goetjen*

## Manager's Note

2011 was quite a year! Plenty of moisture in the spring with things drying out as the summer went on and a fairly long mild fall which saw increases in cattle prices to put smiles on the ranchers' faces! FFGA had another productive year which showed further growth and development of the association. FFGA was in a financial position to continue to grow and expand our programs with funding from the Agriculture Opportunity Fund, support from the counties and MDs in our region and continued support from our corporate sponsors. We also had a boost in our funding in 2011 in the form of an Environmental Stream of funding through Alberta Agriculture and Rural Development. FFGA brought in some great speakers for extension activities throughout the year, highlights included holistic specialist Don Campbell, pasture health with Charley Orchard, buying and selling yearling with Doc Hazard, profiting from stocks with Andy Sirski and we started off 2012 with cattle behavior and handling with Dr. Temple Grandin! Our International Agriculture Tour to Mississippi & Louisiana was another great success following our 2010 tour to Brazil and we are gearing up for our tour to New Zealand this fall!

FFGA has been and continues to build our capacity to do demonstration trials. In 2011 we completed year two of our Winter Grazing Standing Corn Demonstration and headed up a Bale Grazing Demonstration. The Corn Grazing Demo was at Ian and Carman Murray's near Acme and while it was successful in providing nutritious winter feed for their cow calf pairs and was more economical than traditional hay feeding it did not measure up economically to their barley and oat swath grazing. The Bale Grazing Demonstration is being done in conjunction with Sean and Holly LaBrie near Didsbury and just got underway this year. We are focusing on feeding bales on pasture and monitoring how the influx of nutrients affects the soil nutrients, soil biology, pasture yield and the plant community.

Communication is a large part of FFGA's program with our monthly newsletter *GrassRoots News & Views* reaching over 300 producers. The monthly newsletter has been a great way to keep in touch with our members and partners, letting them know what we have going on as well as providing extension material. We have also ventured into the world of social media. FFGA currently has a Facebook page and you can follow us on Twitter. Social media is becoming more and more important in staying connected, especially with the next generation of forage and beef producers. As we move into 2012 we are working to improve or rewrite our website to make it more informative, user friendly and increase its capability to include more visual information like pictures and video.

Thank you to the board members for the time, energy and ideas that they dedicate to the association; they are a huge part of the success and continued growth of FFGA. Thank you to the FFGA membership; it is what keeps this association strong and thriving with the drive to bring producers information, research, tours, workshops and seminars that are valuable and pertinent.

Stay connected for another great year!



# *A year in review...*

## *Message from the Executive Director*



2011 provided significant challenges for excess moisture but then the tap was turned off for a dry harvest. Marketing of barley and wheat poses uncertainty for Alberta producers but will likely offer opportunities for consideration of a new way of business. There has been change within the ARECA member Associations with the loss of Central Peace Conservation Society as a member of ARECA and merger of Southern Alberta Conservation Society and Southern Applied Research Association into Farming Smarter.

For ARECA, a strategic planning workshop in July offered the ARECA Board, Association Managers and ARECA representatives an opportunity to discuss where do we go from here. Four areas were highlighted and they include communication, financial training and administration. The ARECA Board of Directors convened for three Board meetings plus five being conference calls. Discussion has been about dispersement of Association equipment to other Associations, strategic planning, training fund, participation in FarmTech and membership fees.



A website Committee under the chair of Laura Gibney provided direction for refreshment of the ARECA website. Those revisions are being implemented with support from the Associations in terms of content and graphics. Our readership has continued to grow especially since it includes important announcements from Associations.

Regional Variety Trials are under the coordination of Alex Fedko with Alberta Agriculture and Rural Development (ARD) who replaced Gayah Sieusahai this spring. Alex works with ARECA and Associations to ensure the delivery of these trials throughout Alberta. This has ensured that producers can access unbiased, agronomic information for different cereal and pulse cultivars.

This is the last year for the Regional Silage Variety Trial with six Associations (Meghan Elsen coordinated the project) reporting on the nutritional value of annual crops for feed (silage, greenfeed and swath grazing). Six nutritional categories are reported including Crude Protein and Total Digestible Nutrients for different cereal cultivars – the information is available in the Alberta Seed Guide ([seed.ab.ca](http://seed.ab.ca)). The project has been funded by the Alberta Beef Producers (ABP) and a request for continued funding from ABP is in progress.

ARECA and WCFA partnered with Canadian Rangeland Bison and Spring Creek Ranch to develop a 'made in Alberta solution' by the creation of a branded program that verifies environmental sustainability, animal welfare and food safety using a third party external audit system. With funding from ALMA, this project will review options to develop a system that is an all-encompassing, third party audited system with a consumer recognized brand or seal. This system will provide consumers assurance that issues such as wildlife habitat, rangeland health, riparian habitat, and manure are being managed in a responsible manner and animals are treated humanely from birth to slaughter. This system will also assure customers that food safety is paramount at every step of production. The project consists of 3 phases with the first phase to be complete by spring, 2012.

The Energy Conservation and Energy Efficiency project set out to examine energy use on Alberta grain farms. Two studies examined the relationship of tillage practices and energy consumption. The reports explore Ener-



ARECA hosted the first “PRECISION AG 2.0: The Next Generation” Conference at the Deerfoot Inn & Casino in Calgary, February 22-23 2012. As GPS and GIS is now everywhere, the next level is to understand how we can use this technology to make a profit and grow the industry. Topics covered included increased profitability and sustainability, protecting the environment, optimizing your use of agricultural inputs, data management, on-farm research and more. The conference featured...

- 2 full days with over 30 speakers & interactive breakout sessions
- Current information on practices and technologies being adopted by progressive farmers in Western Canada and abroad
- Topics for all skill levels and experience
- 35 tradeshow booths dedicated to precision agriculture
- Meet with progressive and innovative practitioners of precision agriculture

ARECA and Associations were involved in planning workshops such as Cow-Calf Economics, Advanced Agronomy Conference and Forage Agronomy Workshop. Additionally, funding applications were developed for swath grazing, data tools for precision ag and field efficiency and obstructions, barley 180, Regional Silage Trials and FarmRITE.com.

With sustainable and effective member associations, ARECA and Associations are respected leaders in applied agriculture research and extension. Our mission is to collaborate with member associations and partners to enhance delivery of reliable and unbiased applied agricultural research and extension. As we go forward in 2012, I wish to thank everyone for their contributions and efforts in 2011 - may we continue to build on our vision.

A handwritten signature in black ink, appearing to read 'Ty Faechner', with a long horizontal line extending to the right.

Ty Faechner, Executive Director

# Foothills Forage & Grazing Association Events

## FFGA Winter Grazing Tour

In February FFGA hosted a winter grazing tour in Acme. Dale Kaliel of AgriProfit\$ discussed the profitability of various winter grazing programs based on bench mark numbers gathered from producers throughout Alberta. Through his analysis Dale has found many winter feeding programs to be economically beneficial as compared to traditional winter feeding programs of shredding bales for cattle. Kevin Shaw of Pickseed discussed the results from the feed tests and the nutrition quality of winter grazing standing corn. He also supplied information on the practicality of growing corn in the region. After a delicious beef lunch we heard from Chuck McNeil with Crop Productions Services on strategies of seeding and growing corn in central Alberta. Then we heard from producer co-operator and FFGA Vice-President Ian Murray on his experience grazing the corn. Then we went out to the plot to see the cattle grazing the corn.



Sept 9, 2010

Ian found that with the large amount of snow and wind over the winter months that the snow was packed into the corn rows and he had to plow some snow in certain areas to break up the drifts in order to put in his temporary electric fences. Ian fenced off three days of feed at a time and the cows went after the corn cobs immediately. Ian got about 200 Cow Days per acre and a cost of \$1.55/cow/day. He found this to be less economically viable than his oat and barley swath grazing at \$0.78 but still more cost effective than the traditional feeding of shredding hay bales of \$2.22/cow/day. Ian waited until January to graze the corn because he keeps his calves until January but went ahead to graze the next corn crop in December 2011 in order to avoid some of the snow packing issues.



Collecting feed tests  
December, 2010

In December 2011 we went back to the corn grazing demo at Ian's while his cow-calf pairs were grazing the corn crop that was seeded in the summer of 2011. Ian got about 220 Cow Days per acre from this crop but again found the corn at \$1.30/cow/day to be less economical than his swath grazing at \$0.77/cow/day. There was less snow this past winter so the corn was more accessible for the cows however due to the wind storms in the fall there were a lot of broken and bent stocks as well as some leaf loss. For full results see the Corn Grazing Project report on page 15.



Cows Grazing the Corn  
February, 2011



Cow stripping a cob  
December 2011

## Ranching Opportunities 2011

Ranching Opportunities is an annual beef and forage conference held at Olds College in February put on in partnership with Olds College, Red Deer County, Mountain View County, Kneehill County, Wheatland County, Rocky View County, Leduc County, Alberta Agriculture and Rural Development and FFGA. In 2011 the theme was *From Farm to Finish* with a great lineup of topics and speakers including breeding trends with Brenda Schoepp, a Cargill retail and buyer panel, mob grazing with Terry Gompert and producers Nick & Janet Warner. The conference also featured labs sessions on low-stress cattle handling with Dylan Biggs and carcass quality ultrasound with Rod Wendorff. It was an excellent day with over 200 producers, students and industry



attending.

## Cow-Calf Economics: Strategies Moving Forward

On March 8<sup>th</sup> Alberta Agriculture and Rural Development held a one day workshop as part of a province-wide series in Claresholm. The focus was on opportunities and risks in the global and North American markets, kill'em or keep 'em the replacement heifer dilemma, Cattle Price Insurance Program, backgrounding and finishing options, extending the grazing season and financial performance.

## Annual General Meeting

FFGA had our Annual General Meeting on March 29<sup>th</sup> at the Highwood Auction Mart. This was an opportunity to share with the membership some of the highlights and details from the following year. President Morrie Goetjen gave a report on FFGA's current position, projects and direction. Sean LaBrie, FFGA Treasurer, gave a report on the 2010 year end financials which showed FFGA as financially stable with some money in the bank to put towards expanding and developing FFGA's program. Laura Gibney's manager's report gave a review of all the events and demonstrations FFGA was a part of providing in 2010 as well as sharing information on partnerships including counties, corporations and government agencies.

Michael Monner and Graeme Finn both stepped down from the board of directors. On behalf of the FFGA members and board I would like to thank Michael and Graeme for their energy, ideas and hard work over the past several years. These two guys helped FFGA move forward in a positive way and gave guidance for our direction and the successes we celebrated. We welcomed Blaine Treloar of Black Diamond and Candice Manshreck of Stavely to the board. Following the AGM the board meet for a brief meeting in which Morrie Goetjen was re-elected as President, Ian Murray was re-elected as Vice President and Sean LaBrie was re-elected as Treasurer. We appreciate the boards continued commitment and contributions



to FFGA.

Our guest speaker was Holistic Management specialist Don Campbell out of Meadow Lake Saskatchewan. Don shared insight into holistic management from the grass roots of production to running the ranch as a business and the value of the human resources that make the whole operation run. We also had an update on Growing Forward programs and funding opportunities for producers through their local counties and MDs. It was a great day to network, catch up with FFGA and share good information with the 50 producers attending.

## FFGA Spring Tour: Preparing for Another Season

On a warm spring day in April FFGA gathered at the Community Hall in Milo to prepare for the coming grazing season. Information was shared on pasture growth, health and management by Jim Bauer, watering systems with Jason Wright of CAP Solar, Electric fencing trouble shooting with Rob Davidson of PowerFlex and an update on the Cattle Price Insurance Program with AFSC. It was great day with a lot of discussion on strategies for the coming growing season and the future of the industry.



## Ladies Livestock Lessons

2011s Ladies Livestock Lessons was held at Camp Kindle in Water Valley. Despite cool wet weather we had a great couple of days with close to 30 ladies attending; enjoying the opportunity to learn, relax and network with other women in the agriculture industry at the 2 day retreat. There were classroom sessions on livestock genetics, edible plants, weed ID and control, ranching with oil and gas, and evening entertainment provided by the Genuine Cow-



band of Val-Out-sessions



girls out Big ley. door in-



cluded low-stress livestock handling, tame and native pasture health, riparian health, fencing demonstrations and winter watering systems.

## Acme Grazing School with Jim Bauer

Jim and Barb Bauer's 2011 two day grazing school was another great success, measuring up to its renowned reputation! Jim started the school with a warm



welcome and introductions. Then had the group set to work learning about pasture inventory. How to measure what you've got; before you can decide how long to let the cows in for you need to know how much is there. Jim walked us through the process of clipping, drying and measuring the amount of the grass. We then went through the process of determining the number of acres we would need of that height and variety of forage to feed his steers for half a day. The group then went out the pasture and moved the fence for the steers. At the end of the day we went back to evaluate our initial decision and provide the steers their allotment for the night. This was a great activity which ties together the knowledge so many



of us pick up a various schools and conferences and



how to apply it.

That afternoon we discussed pasture health, grazing strategies, rest time, species, soil types and much more. Jim and Barb provide a comfortable and friendly atmosphere in which people are encouraged to ask questions, share ideas and network. Jim has a wealth of knowledge through years as a cattle producer as well as insight into projects and research from his time as the manager

of Grey Wooded Forage Association. This school provides a chance to bring things together, it was a unique opportunity to learn the concepts and try them out all in the same two days.



## Monitoring Pasture Health Workshop

## with Charley Orchard

FFGA hosted Charley Orchard of Land EKG near Strathmore on July 25<sup>th</sup>. Over 20 producers came out to spend the humid day looking at pasture monitoring strategies. Charley discussed ways to measure and monitor your grass more effectively and efficiently for healthier and more productive pastures. There were great discussions on determining rangeland production, stocking rates, scoring of grazing practices and management options. After an afternoon in the field we had a delicious BBQ supper hosted by Rod and Beth Vergouwen before heading back out to the pasture to take a look at Dow's Reclaim plot and some weed control options.



Thanks to the Vergouwen's, Wheatland County and Dow for helping to host this workshop.



### Grazing

The 8<sup>th</sup> annual Alberta Grazing Women was held at the end of July at Provincial Park. It was a beautiful warm day with over 30 attending. It was



### Southern Women's School

Southern Women's School for Grazing was held at the Chain Lakes Provincial Park. It was a fun couple of days in which the participants enjoyed the warm weather and the beautiful back drop of native rangeland and the rocky mountains. Grazing principle and practices were the main focus of the event but there was also discussion on electrofishing, wildlife and ranching, herd bull selection, electric fencing demo, stocking rates, riparian health, range health and local ranching stories.

of days in which the participants enjoyed the warm weather and the beautiful back drop of native rangeland and the rocky mountains. Grazing principle and practices were the main focus of the event but there was also discussion on electrofishing, wildlife and ranching, herd bull selection, electric fencing demo, stocking rates, riparian health, range health and local ranching stories.



## Buying & Selling Yearlings with Doc Hazard

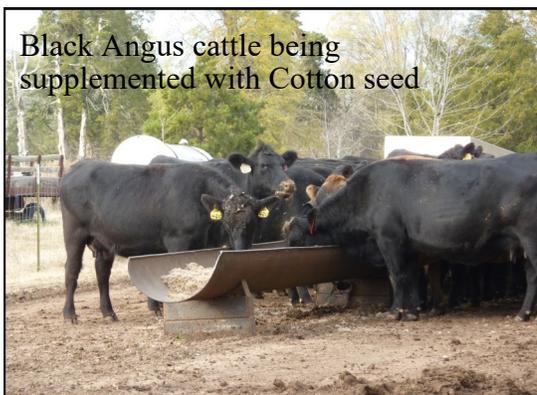
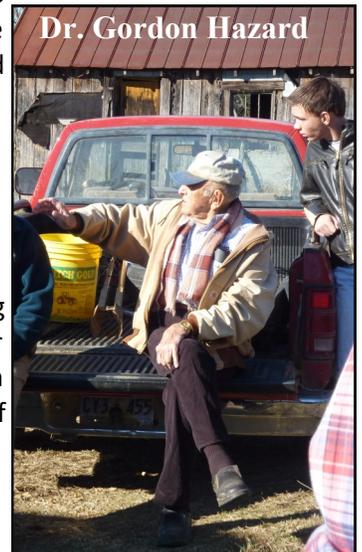


## ings with Doc

In September FFGA brought the 'guru of grass' Dr. Gordon Hazard to Alberta in partnership with the MD of Ranchland. Doc kept us entertained throughout the day with stories and advice on buying and selling yearlings and running his low-input stocker operation in Mississippi. With over 70 years experience in the cattle industry Doc made it a great day; informative, humours and enjoyable. Sandy Stafford also shared some thoughts on *What are you bringing to the table?* from the perspective of a meat inspector. With 80 people in the room you could feel the excitement and the presentations got everything thinking about profitable cattle enterprises!

## Profiting From Stocks Workshop

Due to popular demand FFGA and Mountain View County worked together to bring in renowned Andy Sirski of *Stockstalk* from Manitoba. On a fall day in a computer lab at Olds College we sold out 4 sessions, with a total of 80 people, of hands-on training buying and selling covered calls with Andy. It was a busy day focused on off-farm investing.



Black Angus cattle being supplemented with Cotton seed

## Feed & Fodder Conference

The 2011 Capturing Feed Grains and Forage Opportunities Conference was held in Strathmore at the end of November. The focus for the conference was *Feeding is a Changing Game* referring to many changes in winter feeding systems that we've seen across the province in the past 10 years. This movement has seen both successes and continues to face challenges. It was a great two day event with over 150 people attending!



## Agriculture Tour to Mississippi & Louisiana

This year's FFGA trip took 20 lively and enthusiastic people to the shores of the Mississippi and into the deep depths of Bayou country in Louisiana. I once read that there are more cattle east of the Mississippi, than west of the mighty river. Our first stop was with Dr. Gordon Hazard, DVM. He explained that with an average herd size of between 15 and 20 in the state of Mississippi, and other southeast states, there are a lot of part time cattle farms. He said that when they need to buy a new washing machine, they sell a calf; schools about to start and the kids need new shoes and clothes, so they sell a calf. The truck needs new tires . . . sell a calf. This leaves Grazers' like Dr. Hazard a great opportunity to buy these small lots and assemble them into larger groups. He then grazes them



at a total herd size of about 1500 steers, for a year, and markets to the large feedlots North and West of the Mississippi. He has done this, profitably and consistently, for more than 40 years, owning no more tools than a pair of fencing pliers and a couple of hammers. He has said he thought he may even have too many hammers at that. His colorful and informative tour took us across his farmland throughout the day, to the hunting lodge for dinner, and back to his beautiful Antebellum home for

# Foothills Forage & Grazing Association Demonstration Projects

## Winter Grazing Corn Demonstration 2010 - 2011

Producer Co-operator: Ian & Carman Murray

### Background

Winter feeding is the largest cost in maintaining a cattle herd. There are many ways to extend the grazing season in Alberta through the use of stockpiled forages, crops and crop residues to reduce production costs. There has been growing interest in the value of grazing standing corn as part of a winter feeding program.

### Objective

To determine if grazing corn in central Alberta can be a nutritionally, economically and logistically effective part of a winter feeding program.

### Methods

In 2010 and 2011 14 acres near Acme were seeded to grazing corn in May. Three varieties of corn were planted; 2219RR, 2230RR and 2501RR at a seed depth of 11/4 inches with 6 inches between seeds. The corn seed was round up ready and was sprayed once in 2010 and twice throughout the growing season of 2011. The seed was donated by Pickseed and planted by CPS for a planting fee. The corn was left standing and froze in September both years. In the first trial Ian turned 154 cows into the corn for 14 days in February 2011, in the second trial 150 cow-calf pairs grazed it in December 2011 for 20 days.

### Results:

**Table 1.** Feed Tests - Hybrid Results for 2010 and 2011 (Dry Matter)

Hybrid	2230		2219		2501	
	2010	2011	2010	2011	2010	2011
Crude Protein (%)	10.55	7.55	9.38	8.34	9.9	9.34
Calcium (%)	0.13	0.13	0.19	0.23	0.16	0.21
Phosphorus (%)	0.22	0.18	0.16	0.19	0.21	0.19
Magnesium (%)	0.21	0.20	0.28	0.21	0.26	0.24
Potassium (%)	1.43	0.71	1.29	1.24	1.15	1.06
Sodium (%)	0.01	0.01	0.07	0.01	0.03	0.01
Sodium Chloride (%)	0.03	0.02	0.17	0.02	0.08	0.02
Nitrates (%)	0.15	<0.01	0.12	0.12	0.05	0.26
Acid Detergent Fibre (%)	32.17	24.69	36.06	28.09	41.81	33.17
Neutral Detergent Fibre (%)	57.45	47.17	61.2	56.91	71.18	58.86
Non Fibre Carbohydrates (%)	21.2	34.48	18.62	23.95	8.11	21.00
Total Digestible Nutrients (%)	62.1	65.84	60.15	64.14	57.28	61.60
Metabolizable Energy (Mcal/kg)	2.24	2.38	2.17	2.31	2.07	2.22
Digestible Energy (Mcal/kg)	2.73	2.90	2.65	2.82	2.52	2.71
Net Energy for Lactation (Mcal/kg)	1.4	1.49	1.35	1.45	1.28	1.39
Net Energy for Maintenance (Mcal/kg)	1.37	1.50	1.31	1.44	1.21	1.36
Net Energy for Gain (Mcal/kg)	0.8	0.90	0.74	0.86	0.65	0.78
Relative Feed Value	103	137	92	110	74	100

To maintain a cow in mid pregnancy feed should contain 7% crude protein and 55% TDN. For late pregnancy feed should contain 9% crude protein and 60% TDN and after calving feed should contain 11% crude protein and 65% TDN (Yurchak 2004).

Based on crude protein and TDN of all three corn varieties in this study would provide suitable forage for cows during pregnancy but would need a supplement to be adequate for cows with a calf at her side. Variety 2230 has the highest feed quality as it matures more quickly than the other two.

**Table 2:** Cost comparison between corn grazing, cereal swath grazing and traditional winter feeding

Input	2010		2011	
	Oat/Barley	Corn	Oat/ Barley	Corn
Seed corn		\$ 78.00		\$ 72.00
Seed Oats @ 1 Bu/Ac	\$ 4.50		\$ 4.50	
Seed Barley @ 1.5 Bu/Ac	\$ 13.13		\$ 13.50	
Fertilizer	\$ 45.88	\$ 56.29	\$ 50.00	\$ 80.00
Round-up (spray & custom spraying)	\$ -	\$ 8.60		\$ 9.50
Round -up (spray & custom spraying)				\$ 9.50
Curtail M & custom spraying			\$ 18.20	
Pre-seed Burn off	\$ 12.31	\$ -		
Cultivating			\$ 10.00	
Seeding	\$ 20.00	\$ 30.00	\$ 20.00	\$ 66.00 *
Swathing	\$ 3.20		\$ 4.00	
Crop Insurance	\$ 8.40	\$ 9.64		
Land	\$ 50.00	\$ 50.00	\$ 50.00	\$ 50.00
<b>Total Input Cost</b>	<b>\$ 157.42</b>	<b>\$ 232.53</b>	<b>\$ 170.20</b>	<b>\$ 287.00</b>
Approx Crop Yield	200CD/Ac	150CD/Ac	220CD/Ac	220CD/Ac
Cost per cow day	\$ 0.78	\$ 1.55	\$ 0.77	\$ 1.30

\* \$30.00/ac corn planting charge- min charge \$1000.00. \$1000/15 ac = \$66.00

#### Cost of traditional feeding

Hay @ \$75.00/ton – 35lbs = \$1.31  
 Yardage: - Tractor @ \$70.00/hr at 2hours to feed 154 head  
 -1 mile from home  
 -pulling stings off bales \$0.91  
**\$2.22/cow/day**

#### Conclusions

This project shows that grazing corn can be utilized in central Alberta and that the nutritional quality is adequate to support cows in mid to late gestation. Despite its high input costs in this case grazing corn at about \$1.42/cow/day over the 2 years was more cost effective than the traditional winter feeding of hay at \$2.22/cow/day, however it was less cost effective than swath grazing at \$0.78/cow/day. This demonstration found that growing corn in the Acme area can be utilized as part of a winter feeding program however due to the high inputs it is a higher risk crop that did not seem to be an advantage over the swaths so Ian and FFGA will not be continuing this demonstration trial in the future. Using a variety of winter feeding strategies allows producers some flexibility in the case of a poor growing season and enables them to better manage their operation in varying winter conditions.

Thank you for your support on this demonstration:



## CPS planted the corn in May



## FFGA Summer Tour, September 2010



## Collecting Feed Samples, November 2010



## FFGA Winter Grazing Tour, February 2011



## FFGA Winter Grazing Tour, December 2011



# Bale Grazing Project 2011 - 2015

## Producer Co-operator: Sean & Holly LaBrie

**Background:**

In 2011 FFGA and producer co-operators Sean and Holly Labrie started up a bale grazing demonstration near Didsbury Alberta. Since this is the first year of the trial the data gathered is preliminary. It has been included below however it will be more informative after consecutive years of data are gathered for comparison.

When Sean and Holly bought this land the pasture had been grazed heavily and was not as productive as they feel it can be. In an effort to increase the pasture health and productivity in a practical way they decided to bring in hay, greenfeed and straw bales and feed them on the pasture during the winter months.

**Objective:**

To look at the effects of winter bale grazing on plant community, productivity and soil quality on the pasture over several years.

**Methods:**

Sean feeds bales of hay, greenfeed and straw in the pasture throughout the winter months while marking their location in the pasture by GPS. There are three treatments in this trial, the control which has had no bales fed on it, the high quality feed areas where hay is fed and the low quality feed areas where the straw is fed.

In the summer FFGA takes forage clipping of the three treatments to measure the yield and production of each treatment as well as do feed tests on the three groups for analysis on forage nutrients. At this time the plant community in each area is assessed to watch for changes in the plant species over time by bringing in the bales. At this time soil samples are taken and analysed for soil microbes.

In the fall feed tests are done on the hay and straw bales in order to track the nutrients that are being brought onto the land. Soil samples are also taken from the three treatments and analysed for soil nutrient content.

**Results:**

**Table 1.** Pasture Forage 2011 (Dry Matter Basis)

	<b>Control</b>	<b>Hay Bale</b>	<b>Straw Bale</b>
<b>Average Yield (lbs/ac)</b>	2277	2960	3858
<b>CP (%)</b>	11.6	18.4	12.9
<b>Calcium (%)</b>	0.54	0.5	0.42
<b>Phos (%)</b>	0.14	0.18	0.22
<b>Potassium (%)</b>	2.03	3.17	2.97
<b>Mg (%)</b>	0.14	0.18	0.14
<b>ADF (%)</b>	39.5	33.4	37.8
<b>NDF (%)</b>	61.9	55.2	62.4
<b>TDN (%)</b>	65.7	62.2	58.3
<b>Relative Feed Value</b>	87	106	89

**Table 2:** Soil Analysis - Fall 2011 (0-6inch depth)

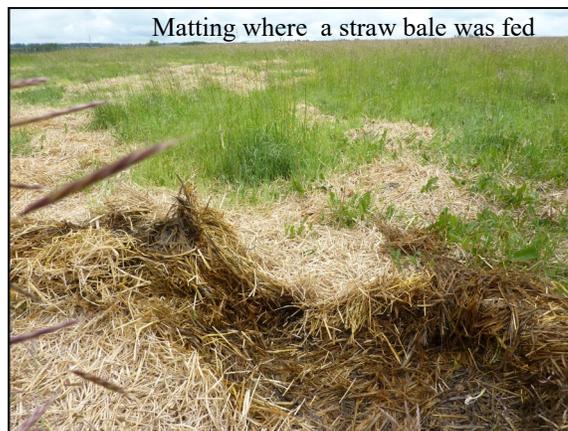
	Control	Hay	Straw
<b>Organic Matter (%)</b>	7.5	7.7	7.2
<b>Nitrate (ppm)</b>	<2	4	9
<b>Phosphorus (ppm)</b>	<5	<5	8
<b>Potassium (ppm)</b>	164	387	393
<b>Sulfate (ppm)</b>	5	5	6
<b>Copper (ppm)</b>	0.4	0.7	0.07
<b>Iron (ppm)</b>	58	50	53
<b>Manganese (ppm)</b>	6.6	6.5	5.3
<b>Zinc (ppm)</b>	3.3	2.9	2.8



Soil sampling fall 2011

**Observations:**

It is noted that the location of the bale grazing in the winter of 2010 and 2011 was a relatively small area of the field so the samples may not be representative of the entire pasture. Where the lower quality feed was fed (straw) the matting was thicker and took longer to break down. Moisture amounts also contribute to the rate of decomposition. After just one year of data it is difficult to see trends. However it was noted that both the forage and soil analysis show fairly low levels on nutrients with the exception of potash. This is not surprising as the LaBrie's are working towards increasing the level of nutrients in both the soil and the forage as well as increasing productivity over time. We expect to see the bale grazing to help accomplish the objective of adding thatch cover and additional nutrients as well as help build up the organic matter in the soil but this will be a slow process. In looking at the results it would seem that there is increased production and growth where the straw bales were fed and that the forages growing up from where the hay bales had been fed were higher in quality as a feed source. This demonstration will be more informative once consecutive years of study have been done.



# Foothills Forage & Grazing Association Partnerships

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