



Canfax Research Services

A Division of the Canadian Cattlemen's Association

Publication Sponsored By:



Marketing Calves & Culls

Do you have a marketing plan? Every fall you gear up for selling calves. Are you ready? Have you prepared? Prepared for what? The price of calves changes daily. For every one cent change in the exchange rate, calf prices change approximately three cents per pound. When live cattle futures increase by \$1/cwt it adds around \$2.50/cwt to calf prices. Volatile markets have provided opportunities to lock in higher prices, but they also present risks. Excess feedlot capacity and lower feed prices have given more bargaining power to the cow/calf producer. *How are you going to take advantage of that?*

FEEDLOT WILLINGNESS TO PAY FOR CALVES

Feeder and calf prices are directly tied to the fed cattle market and therefore the live cattle futures, exchange rate and basis. There is pressure from lenders for feedlots to have a risk management plan. Many look for the selling price to be locked in at the time feeder cattle are bought. This means a feedlot willingness to pay is a reflection of the expected fed cattle price, cost of gain (COG) and optimism.

Feeder price = Projected Fed price - COG

If you are selling a 550 lb steer calf in November: what is the feedlot currently willing to pay for that calf?

Projected June Fed Price based off the futures

\$125.36/cwt * 1350 lbs = \$1,692.31

Cost of Gain

\$95/cwt * 800 lbs = \$760.00

What can you pay for feeders?

\$1,692.31 - \$760.00 = \$932.31

Breakeven price on 550 lb calf

\$932.31 / 550 lbs = \$169.50/cwt

If bought for \$165/cwt (\$907.50/head)

= \$24.81/head profit

The market price for calves can tell us how optimistic feedlots are. Increased volatility of commodity markets (and the dollar) has increased the risk producers are exposed to, making risk management important. However, risk management, just like any other tool, costs money – increasing operating costs for feedlots. Feedlots are at risk from the time calves are bought until they are sold. “Sold” can include when those animals are hedged

on the futures and dollar is locked in, a basis or forward contract, or sold on the cash market.

So the first question is: *What projected fed cattle price are feedlots expecting or able to lock in?*

Projecting Alberta Fed cattle prices:

June 2014 Live Cattle Futures - \$126.95

June 2014 Canadian Dollar - \$96.33

Estimated Future price in CDN \$ = \$131.78

Less the seasonal cash to futures basis of -\$6.43

Projected Alberta Fed price = \$125.36

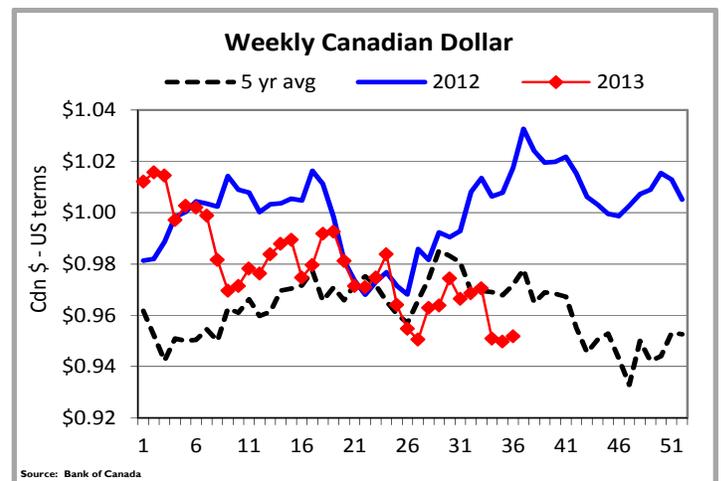
All Canadian cattle prices are based off the CME Live Cattle Futures as the Canadian beef industry operates in a North American marketplace with prices set in the US.

When live cattle futures increase by \$1/cwt it adds around \$2.50/cwt to calf prices.

Exchange Rate

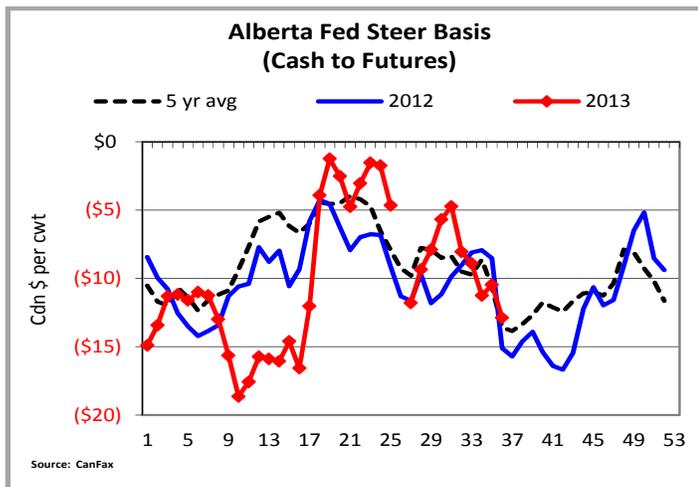
While the exchange rate does not have the wild swing we saw five years ago it still presents consider fluctuations. So far in 2013 the dollar has ranged between \$0.95 and \$1.01. But unlike last year which had a bottom of \$0.96 the end of June, this year the dollar has continued to move lower supporting feeder and calf prices as we move into the fall run.

For every one cent change in the exchange rate, calf prices change approximately three cents per pound in the opposite direction.



What is Basis?

The fed cattle basis is the difference between the Live Cattle Futures in Canadian dollars and the local cash price. Basis accounts for transportation and transaction costs, local supply and demand dynamics and the thickness of the border (which is impacted by export costs, COOL, etc.). Understanding the fed basis is critical to using market information to evaluate market opportunities.



How much risk does basis present?

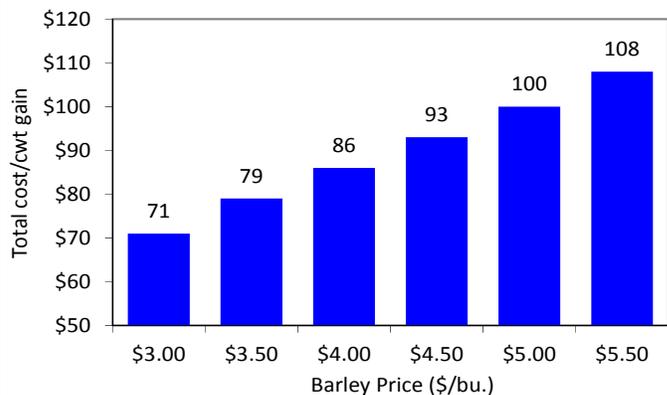
The five year (08-12) average basis tends to be weak in the first quarter, the strongest in the second quarter, the weakest in September, before strengthening into December. But every year, can be different with outside market influences (supply/demand). In March 2013 the basis was abnormally weak at $-\$16.97$ compared to the five year average of $-\$7.88/\text{cwt}$. *How does this impact the bottom line?* If a feedlot had locked in prices on the live cattle futures and Canadian dollar anticipating a seasonal basis the expected price would have been $\$9.09/\text{cwt}$ higher than the cash prices received or $\$122.68$ on a 1350 lb finished animal. This can mean the difference between a profit and a loss in the feedlot industry.

What will COG be?

The price a buyer is willing to pay for calves depends on the cost of gain. If the calf is going onto a finishing ration based on barley prices, this can be very different from a calf going onto a backgrounding ration based on hay prices.

For every $\$0.50/\text{bu}$ increase in barley prices, the cost of gain increases by 7-8 cents per pound of gain on a barley/barley silage ration.

Barley Price Impact on Total Cost of Gain



Backgrounding on a high roughage ration (hay or silage) will have significantly different costs than a finishing ration based on grain prices. With around two-thirds of calves backgrounded each fall, calf prices are as much determined by hay prices as by grain prices.

The tremendous hay crop last summer had many producers selling hay at very good prices going south. However, after depleting hay supplies last winter with feeding well into the spring months – Alberta hay prices this year are actually 17% higher than last year. This is going to limit some of the upward movement in calf prices this fall.

MARKETING IS NOT SELLING!

Selling is the exchanging of inventory (cattle) for cash. Marketing is planning what you are going to sell and when, based on information long before and up to when you actually sell your cattle.

Marketing is not predicting the high price!

MAKE A PLAN

- Know your per unit cost of production
- Set Target Prices:
 - Survival, Acceptable, Favorable
- Know your cash flow needs
- Know your product:
 - Quality, Attributes, Performance history

Cost of Production

Calculating your per unit cost of production does not have to be hard. It needs to include both costs and productivity measures. It can be as simple as the below table with costs taken from your accounting software (include depreciation). Ideally you include opportunity costs for things like unpaid labour and living costs.

	Then...	Now...
Total Costs	\$600	\$590
Reproductive Efficiency	90%	89%
Death Loss to weaning	3%	3%
Weaning Weight	525 lbs	525 lbs
COP (\$/lb)	1.31	1.30

Knowing what your costs are and comparing them against industry benchmarks can help identify areas where improvement can be made, sometimes at minimal cost but with a significant impact on the bottom line. Having the history to see the trend on your operation provides the biggest value. Changing management, changes costs but also potentially performance. While most producers can identify where the higher cash costs came from in any single year, without combining this with the productivity measures means you only have part of the whole picture.

Knowing your per unit cost of production allows you to be confident in accepting a bid for calves, but also tells you about what to do next year. Every farm is unique. Good COP information allows producers to make better marketing and production decisions – and it is easier to make these decisions than having no COP information.

Set Target Prices

Price is the signal telling producers what to produce, when and how much. The survival price is the cash cost; this is the lowest price to pay the bills. Prolonged exposure to survival prices drains farm equity and is the signal to liquidate the herd. An acceptable price covers the COP and covers a share of living costs. A favorable price is the acceptable price plus a return to management. If prices are above the favourable level the market signal is clearly produce more.

A good marketing plan has production implications as it responds to price signals. It answers the question “Do I sell weaned calves?” “Do I background?” “Do I sell bred heifers?”

Stick to the Plan

Discipline is one of the toughest skills in marketing. While plans will change with market signals they must be based in fact. It is not about second guessing the market. Changing the plan can have cost implications. Know the pricing alternatives that exist. It is not an all or nothing event.

MARKET AWARENESS

A marketing plan does not require you to follow the markets, or wait out the markets until they reach your ideal price (which may never happen). But it does require

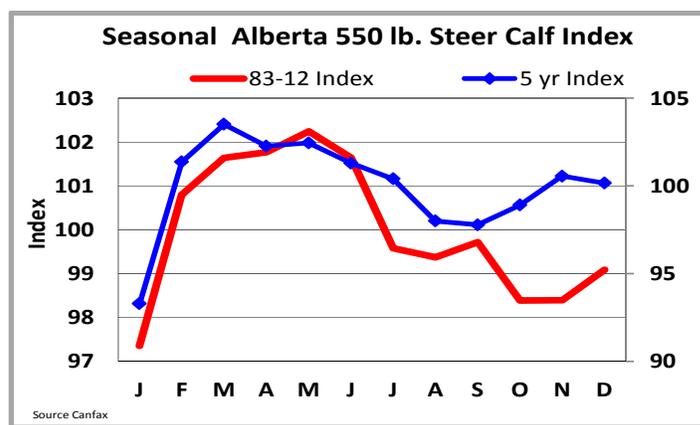
market awareness and timely market information. Outlooks and price forecasts can help you prepare and adjust your marketing plan. Knowing the price alternatives and strategies beforehand will help you to adjust in a timely manner.

There are many tools to use:

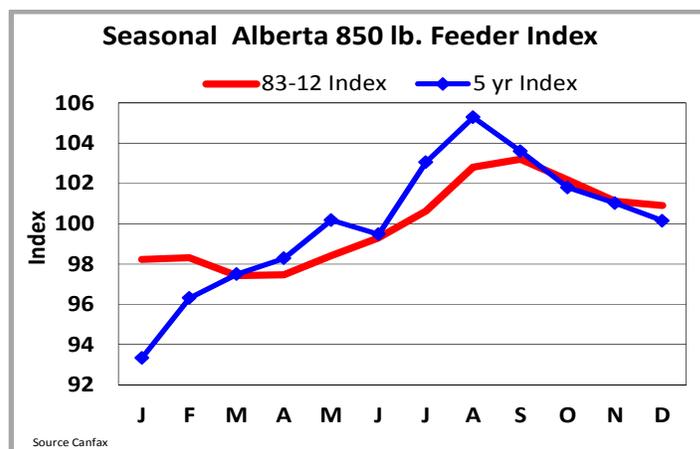
- Market Information: Seasonality
- Risk Management
- Selling Options
- Ownership strategies

MARKET INFORMATION: SEASONALITY

Seasonality of cash prices for calves and feeder cattle have been increasingly influenced by the futures market as feedlots use more risk management tools and lock fed cattle prices in earlier in the feeding cycle.



Over the last five years calf prices have made their annual high in March with demand for grass cattle, and their low in September. Historically calf prices declined going into October and November as larger volumes came to market. In recent years tighter supplies have resulted in stronger competition and prices actually increase from September through November as quality calves support market prices.



The 850 lb feeder price index historically increased from April to peak in August or September. Over the last five years the peak has shifted slightly with the peak consistently occurring in August.

Being aware of market information can tell you when outside events are impacting the market, and it is not a good time to sell.

RISK MANAGEMENT

Risk management is about protecting your equity.

The US Feeder futures are based on a 650-850 lb feeder and due to seasonality of what is being sold the average price of the feeder futures varies throughout the year. The most robust pricing occurs in August and September as yearlings come off grass. Those using the feeder futures need to be aware of margin calls, exchange rate and basis risk.

An option (put or call) limits exposure of margin calls associated with hedging the futures directly; but the cost of the call or put also cuts into the margin. You still have exposure to exchange rate and basis risk.

The Cattle Price Insurance Program (CPIP) is currently only available in Alberta but there is potential for this to be expanded to all western provinces in the future. ASFC currently offers fed price, fed basis, feeder and calf price insurance. For fed cattle there are two options. The basis insurance offers producers who are comfortable with hedging the futures and dollar, an option to lock in the basis. The full price coverage offers a level of risk management without using other forms such as futures, options or packer contracts. However, this provides a floor price with the live cattle futures, exchange rate and basis all locked in at once.

For calves, insurance is only available to purchase between February 5 and May 30 for coverage between September and December. It is based on an average 550-650 lb steer price (no slide). Feeder insurance can be purchased year round but there are no settlements in June, July and over Christmas. It is based on a 850 lb steer price (always adjusted back to 850 lbs). Heifers can be insured with both the calf and feeder levels but they will be based on the steer settlement.

Coverage levels go up to 95% of the expected forward price. The price risk program is designed to give you the opportunity to minimize your loss per head by providing a floor price and leave the upside open. They work like a put option with the premium cutting into margins.

The producer can decide the best time to buy insurance and select the coverage level, length of the policy, and how much weight to purchase (available in 100 lb increments so you don't have to buy all at once). During the last four weeks of the policy the producer can look at the settlement index to determine if a claim should be filed. The cattle do not need to be sold for a claim to be filed, leaving all options of retained ownership open to the producer. CPIP feeder and calf weekly settlements are calculated using lot level data from auction markets.

Another alternative is to forward contract directly with a feedlot. Feedlots may offer target pricing options. They follow the markets regularly for their own risk management programs. If you want \$1.75/lb for your steers in October, feedlots can monitor the futures, and can contact you if they are willing to pay your target price. Developing a relationship with feedlots is important for this to work. Feedlots are interested in knowing that their pens will be full.

"Watching" the market is not risk management.

SELLING OPTIONS

"What does it really cost a producer to market his cattle?" There is tremendous variation within the auction industry alone, let alone the hidden costs associated with some options. Costs can change significantly over a relatively short distance. These costs may also be lower for larger operations that can spread their marketing costs over more animals.

Marketing Costs, including shrink, auction fees, brand inspection, A-paper inspection, vet inspection, clearing fees and transportation, can range from \$1 to \$20 per head.

Shrink - Is extremely variable depending on the feed cattle are on, if they have tanked up on water, how long the haul is and how long they stand at auction. This typically ranges between 3-6%, but can be significantly more.

Auction Fees - These are also variable, depending on location and competition. Fees tend to be higher in Northern Alberta and Saskatchewan than in Southern Alberta where there are more independent auctions in close proximity creating a competitive market. Auction fees are defined as including commission and clearing fees and are estimated to range between \$15-20 per head. Cows tend to be a flat fee of \$20.

It should be noted that electronic markets operate differently in that they tend to be lower and based on volumes, taking advantage of the economies of scale.

Electronic fees are estimated to range between \$12.50-17.50 per head. Electronic auctions do charge sellers a clearing fee of \$1 per head.

Brand Inspection - The Livestock Inspection Service (LIS) provides brand inspection in Alberta at a flat fee of \$20 or \$1/head. They will make farm visits for those selling privately.

Export Costs - LIS also provides A-Papers for exporting cattle to another province or to the United States. A-Paper inspection is required on all cattle leaving the province or destined for the US. A vet inspection is required for all cattle being exported to the US by a CFIA certified vet and costs \$1/head.

US buyers can be present at any of the below selling options. Cattle that are bought “as presented” then have the additional costs paid by the US buyer.

Transportation to Auction/Buyer - Transportation is estimated at costing \$5 per loaded mile. With 100 calves or 45 fed cattle per load this is a cost of \$0.05/head/mile for calves and \$0.11/head/mile for fed cattle. Total costs will vary for each producer depending on location.

Auction markets, electronic/video sales, direct selling, and supply chains all have costs and benefits. Electronic sale costs tend to be slightly lower than auction markets; but overall are relatively similar and depending on the group of cattle electronic marketing could be higher or lower. Direct sales have the lowest cash costs but can have hidden costs of developing relationships and time spent following up on cattle performance.

Auction Market volumes represent a significant portion of the feeder cattle market trade¹.

Pros: Competitive bidding, price transparency, opportunity to market small lots

Cons: Biosecurity, stress on weaned calves, shrink

Producers have the option of live auctions or electronic auctions (e.g. TEAM, DLMS, CSLA) in Western Canada.

Electronic and satellite video auctions require more planning and market knowledge than using the local auction. A major advantage of these market alternatives for feeder cattle producers is that they increase the potential number of buyers and sellers. They also can be less expensive to use and often attain higher market prices for good quality feeder cattle. However, the seller

¹ A list of auction markets in Western Canada can be found at <http://canfax.ca/AuctionMarkets.aspx>

must offer truckload lots (60 to 70 head) of uniform, good quality feeder cattle to ensure competitive bidding from buyers. These sales sometimes use a sliding price scale based on weight. Producers should be able to closely approximate the average sale weight and should be knowledgeable about the appropriate magnitude for the price slide. Deferred delivery through electronic and video auctions can act like a forward contract pricing mechanism for sellers and buyers.

Pros: Broader geographic base of buyers, save freight to auction market, economies of scale for larger lots, opportunity to sell with a deferred delivery date and ability to pass bids.

Cons: Do not know how many bidders are watching

Direct Selling - Producers that tender privately or direct to feedlots incur certain risks including the fact that they do not know if they are receiving a representative price if they have a limited number of bids. Consequently sellers tendering cattle privately or selling direct to feedlots need to be knowledgeable about market prices and practices. There is also time in developing a list of contacts of potential bidders (e.g. feedlots and order buyers) and understanding what they are looking for. However the cash cost is usually minimal and the seller controls the marketing process to a greater extent than through an auction process.

Pros: Selling directly or by satellite auction gives producer's the opportunity to keep their cattle on the farm until they are moved directly to the buyer's location. They can also select weighting conditions and delivery times and offer cattle to buyers in distant markets.

Cons: Potentially low number of bids, risks associated with payment, not guaranteed to be paid right away

Direct Selling insights

Offer cattle when you are ready to sell – not to “test” prices. Feedlots will lose interest if the same cattle are offered multiple times. So be transparent on sales and passes.

Make the bidding process simple so you can boil it down to price - specify base weight, delivery time, slide, bid location. Understand shrink and the implications on the base weight is important especially if they have to travel any distance before being weighed.

Feedlots will be watching the futures, exchange rate, and estimate basis to develop bids. Feedlots will literally want an hour window. This can be very important to them! Relationships have value and understanding the feedlots

needs when sending out a tender on cattle can be helpful in the future.

Get multiple bids and see if there is any opportunity to go east, west or south depending on your location.

VALUE-ADDED

Regardless of how you sell know the attributes buyers are looking for and the attributes your cattle best offer.

Have details of your cattle. Past information on animal health, performance, grade and yield make a feedlot more confident on bidding on your calves. Historical performance information may trump breed.

Accuracy on the description is important (frame and flesh condition), it can be costly to feedlots if they were expecting something else and they won't bid in the future.

Feedlots will "judge" producers, on the fact that if a producer is doing all the little things in managing their cattle - consistency of the group on vaccination and implant protocol, no horns, bulls or stags. There is no guarantee of a premium on any of these factors – the cattle still have to be right kind for the buyer.

- Region – location to destination
- Physical Characteristics
 - Breed, frame, flesh condition, no horns, no bulls or stags present
- Management
 - vaccine programs, implant protocols, age verified status, uniform lots
- Historical information
- Lot size

A study by Dr. Jared Carlberg from the University of Manitoba and Dr. Robert Hogan from Texas A&M University found there were significant premiums for age-verified (over \$3.00/cwt) and pre-conditioned calves (over \$5.00/cwt) in the October 2011 to October 2012 period. At the other end of the spectrum, horns were discounted between \$2.00-15.00/cwt compared to the average price. There were also specific circumstances (auction market) where home-raised and hormone-free cattle generated significant premiums.²

² http://alma.alberta.ca/cs/groups/alma/documents/document/bnqt/mji4/~edi_sp/aguemint-228357.pdf

Studies in the US³ show that certain breeds/characteristics bring a premium (Black hided, British or British cross) or a discount (Brahman influence).

Non-uniform lots were discounted while uniform lots saw premiums, particularly for video sales where buyers are accustomed to purchasing sale lots to fill large feedlot pens. Variability within a large pen of feedlot cattle increases inefficiency and makes per head feeding costs higher. It is possible that there is more focus on uniformity with the use of individual animal management at feedlots.

Discounts and premiums on frame and flesh condition were seasonal, changing throughout the year. Estimating flesh condition on forward contract sales seemed to be difficult.

Vaccine protocols received premiums that reflected the program requirements. Some of the highest premiums were for a combination of vaccination and weaning protocols. Weaning more or less than 30 days did not have a significant difference in the premium received.

Larger lots received a premium but the majority of lots in the study (60%) were between 50 and 100 head.

At the time of the study (04-09 data) age and source verified did bring a slight premium. That may no longer be the case with market access to Japan increased to under-30-months (UTM) of age.

OWNERSHIP STRATEGIES

Retaining ownership needs to consider not just feed availability but also labour availability, cost of gain, and future cattle prices.

To Sell or Hold?

Cow/calf producers tend to look at retaining ownership when prices are low or feed is available in order to increase returns by selling into a different market environment. However, this creates price risk. Producers retaining ownership should consider a risk management strategy to protect their equity.

Retaining ownership also changes cash flow and may need to be planned well in advance as an overall change in management and marketing approach versus a one-time event.

Even if feed is available it should be valued at the current market price to represent the opportunity cost of simply selling the extra feed. Just because you are feeding it

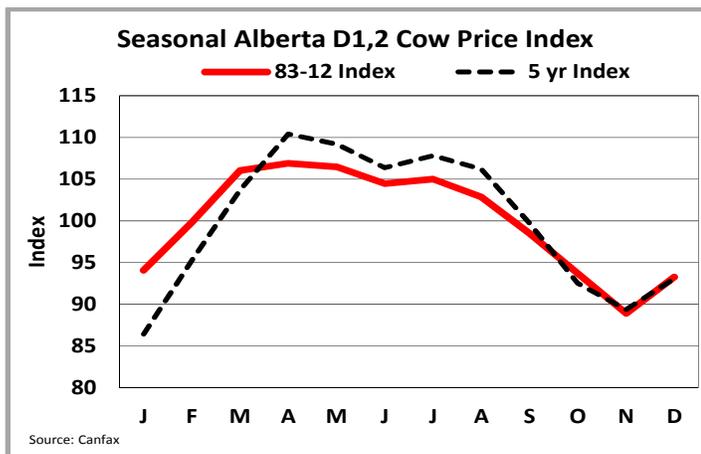
³ Zimmerman 2010. Factors Influencing the price of value-added calves at Superior Livestock Auction. Kansas State University. Master's Thesis

does not necessarily mean additional value is being gained. If a producer does not know how their cattle will perform as they get older retaining ownership can be disappointing but also instructive.

CULL COWS

Cow prices tend to be the strongest from March through July with a steep drop going into the fall run. The low typically occurs in November when the bulk of the cows are on the market. The drop from the summer high to the fall low can vary. On average in the last 15 years it has declined by 29%, but that varies from 15% to 40%. In 2010 it dropped 15%, in 2011 the drop was 21% and in 2012 it was wider yet at 26%. As this drop increases there is incentive to wean and sell culls early. Currently the three year average at 21% is less than the historic average of 29%.

Although prices seasonally soften into the fall, North American cow slaughter is expected to be tight this year with improved feed supplies and stronger calf prices encouraging retention. US cow slaughter has been below year ago levels since July when pasture conditions improved. This will support cow prices.

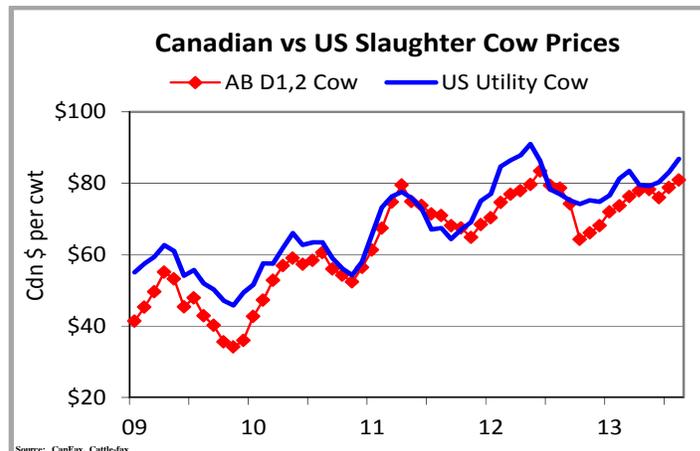


While cow prices seasonally decline from July to November. Prices then typically increase 14% from the November low to a spring high in March.

If you had a 1250 lb cull cow in November with a price of \$65/cwt that is \$812.50/head. If you sold her in March with an average spring rally to \$75/cwt with 100 lbs of gain at 1350 lbs, that is \$1,012.50/head. So there is a \$200 gain for 4 months on feed (120 days). Assuming a basic feed cost of \$1/day (\$120) leaves \$0.67/day to cover yardage.

This is assuming these are regular culls that are going to grade D1,2 regardless of when you sell them. If you have a D3 cow they are typically discounted by \$7/cwt. The

question becomes is that cow able to gain weight over the winter on a basic ration or is additional feed needed.



Over the last couple of years there have been times when it is worthwhile to go south with cows. Particularly last fall when the Lakeside plant was closed and domestic prices were soft, there were premiums available in the US. In 2011, the Alberta/US price spread was basically par but widened to -\$6.19/cwt in 2012. This has narrowed to -\$4.60/cwt in 2013.

CONCLUSION

A feedlot's willingness to pay for calves is dependent on the projected fed cattle price and cost of gain. A backgrounder will be as much concerned about roughage prices as grain prices in determining what they will pay for calves.

Marketing is not selling. Marketing is planning what you are going to sell and when. Knowing your per unit cost of production is critical in making production and marketing decisions.

Cow/calf producers have many marketing options!

From market information to risk management there are things a cow/calf producer can do to protect his equity before the sale even occurs. When it comes to the actual sale there are a number of selling options that a cow/calf producer can take advantage of depending on what works best for his operation.

For cull cows, from early weaning to feeding into the New Year there are ways to avoid the fall glut. However, 2013 may be the year it does not matter if prices remain strong.