

CATTLE FINISHING RETURNS

S E R I E S

March 2010

CATTLE FINISHING NET RETURNS

This article discusses recent trends in feeding cost of gain and cattle finishing profitability. Several sources of data were used to compute the cattle finishing net return series discussed below. Feeder and fed cattle prices are obtained from the seasonal cattle price spreadsheet updated monthly by Kevin Dhuyvetter. Average daily gain, feed conversion, days on feed, in weight, out weight, and feeding cost of gain were obtained from monthly issues of the *Focus on Feedlots* newsletter. Interest rates were obtained from the Kansas Federal Reserve Bank of Kansas City.

Figure 1 presents monthly steer finishing net returns from January 2000 to February 2010. It is important to note that net returns were computed using closeout month rather than placement month. The last closeout month with a positive net return was September 2008. Losses per head in 2009 ranged from \$38 in November to \$302 in January. The losses in January and February of 2010 were approximately \$86 and \$25 per head, respectively. Breakeven prices for March through June closeouts are expected to range from \$86 to \$88. At these breakeven prices, net returns per head are expected to range from \$35 to \$60 for these closeout months. Due to higher feeder prices in recent months, breakeven prices for July through September closeouts (\$89 to \$92) are expected to be quite a bit higher than those for the second quarter.

Correlation coefficients can be used to examine the relationship between net returns, feeding cost of gain, and the feeder to fed cattle price ratio. Correlation is a statistical measure of how

variables move together and is bounded by -1.0 and 1.0. A value of -1.0 indicates two variables move together perfectly, but in opposite directions, while a value of 1.0 indicates two variables move up and down together proportionally. Values close to zero indicate two variables have little relationship to each other.

Net returns are significant and negatively correlated with feeding cost of gain ($r = -0.401$). Figure 2 illustrates monthly feeding cost of gain from January 2000 to February 2010. The relatively high feeding cost of gain in 2008 and 2009 certainly contributed to cattle finishing losses during these two years. Feeding cost of gain for February 2010 closeouts was approximately \$78 per cwt. Feeding cost of gain is sensitive to changes in feed conversions, corn prices, and alfalfa prices. Regression analysis was used to examine the relationship between feeding cost of gain and feed conversion, corn prices, and alfalfa prices. Results are as follows: each 0.10 increase in feed conversion increases feeding cost of gain by \$1.00 per cwt, each 0.10 per bushel increase in corn prices increases feeding cost of gain by \$1.13 per cwt., and each \$5 per ton increase in alfalfa prices increases feeding cost of gain by \$0.31 per cwt.

Net returns are also significant and negatively correlated with the feeder to fed cattle price ratio ($r = -0.819$). The strong correlation between these variables reveals the importance of this price ratio to net returns. The feeder to fed cattle price ratio is illustrated in figure 3. The average price ratio over the 10-year period

was 1.18. Of course, it is not possible to fully anticipate what fed cattle prices will be when purchasing feeder cattle. Large deviations from the mean price ratio indicate periods for which expected and actual fed cattle prices were quite different. The closeout months with ratios above 1.40 exhibited cattle finishing losses ranging from \$149 to \$179 per head. The extremely large losses from December 2008 to February 2009 were the result of relatively high feeding cost of gain (\$87 to \$91 per cwt) and relatively high feeder to fed cattle price ratios (1.34 to 1.35).

This article discussed recent trends in feeding cost of gain and cattle finishing returns. Net return information for beef cow and backgrounding operations is available on the Kansas Farm Management Association web site (www.agmanager.info/kfma).

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Figure 1. Historical Net Returns for Finishing Steers

Source: Michael Langemeier, Kansas State University

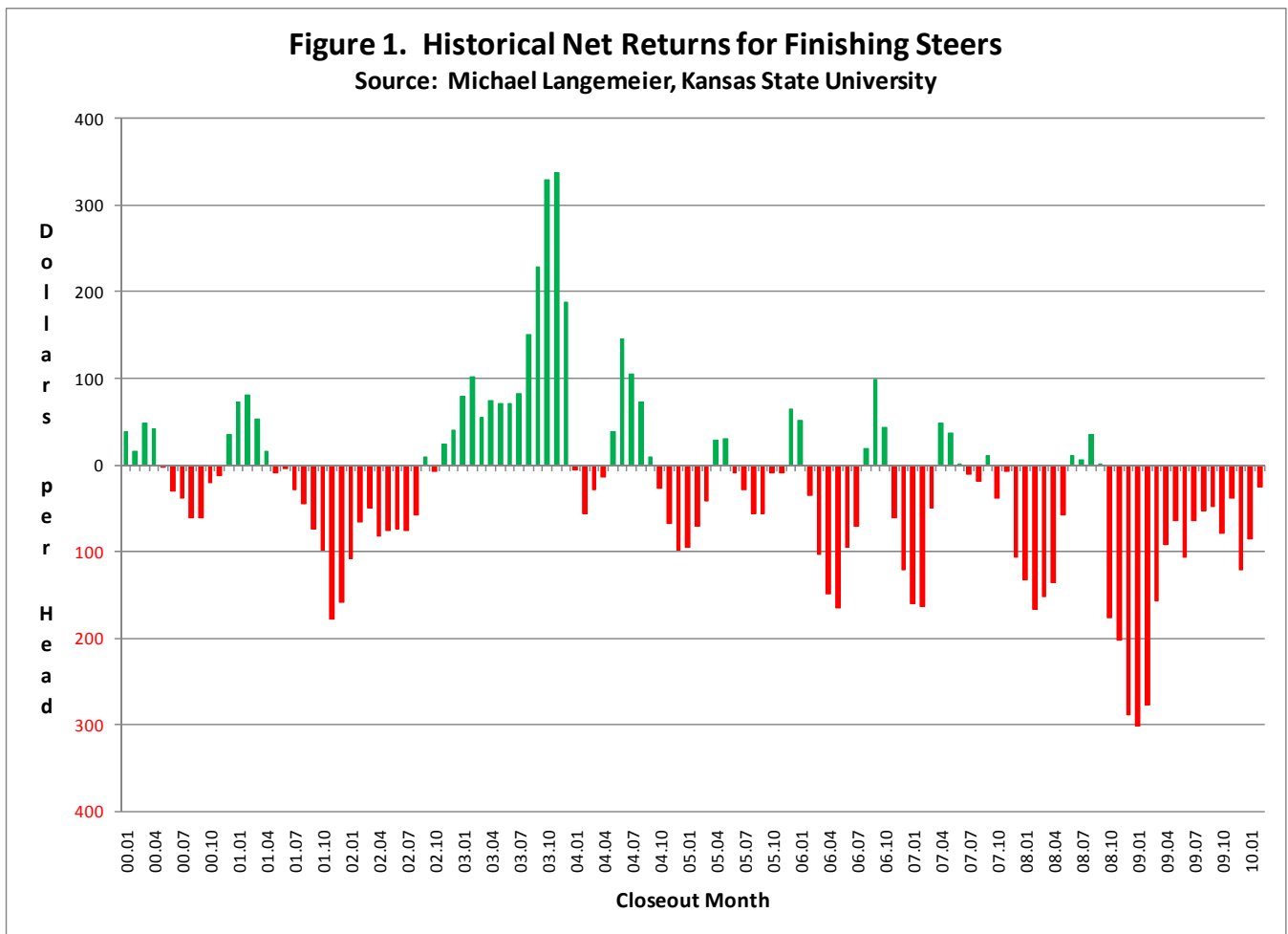


Figure 2. Feeding Cost of Gain for Steers

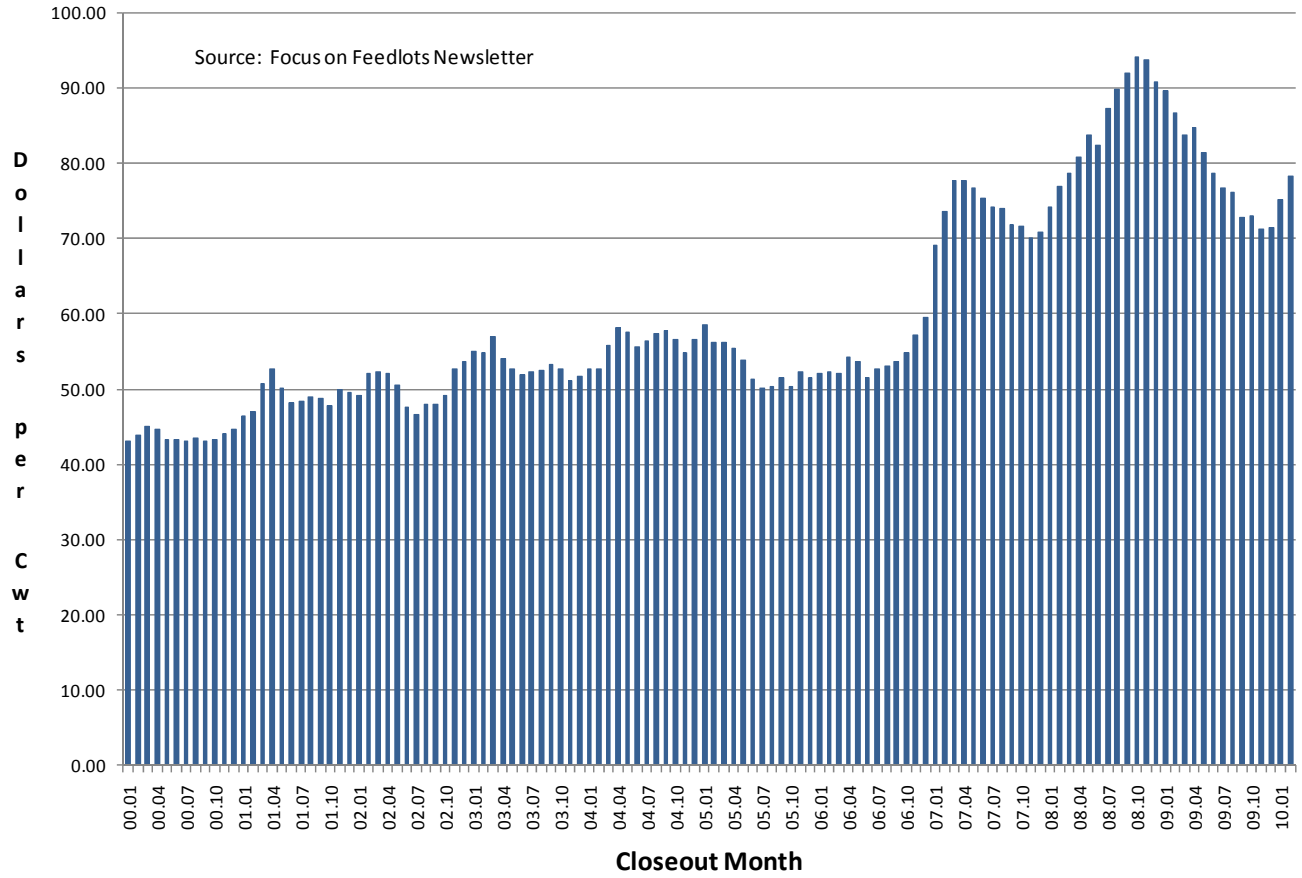
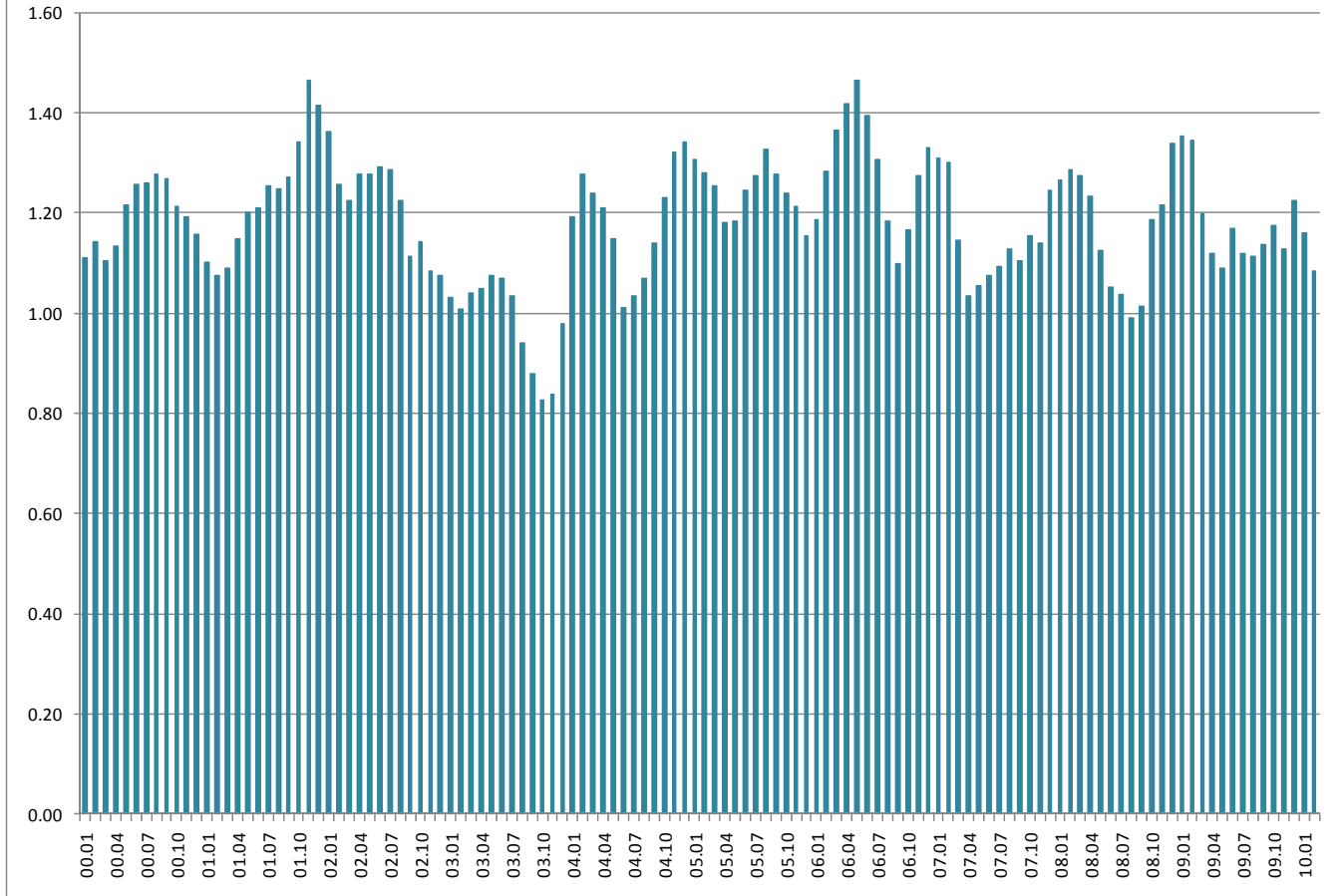


Figure 3. Ratio of Feeder Prices to Fed Cattle Prices



The Cattle Finishing Returns Series is distributed monthly to provide information to farm decision makers. Further information can be found on the Extension Agricultural Economics website: www.agmanager.info.



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