Effect of Adding AGRADO™ to the Receiving Ration on Morbidity and Performance of Calves New to the Feedlot Environment

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Abstract

Ninety-six mixed beef heifer calves (206 +/- 1.4 kg initial body weight) were used to determine the effect of adding AGRADO™ (Solutia, St. Louis, MO) to the receiving ration on average daily gain (ADG), feed efficiency, incidence of morbidity, duration of morbidity (those animals pulled at least 3 times), and cost of medical treatment. Heifers were purchased at several salebarns in central Arkansas and delivered as one group to the university research facility in Savoy, Arkansas. Animals were blocked by weight and randomly allocated within 8 weight blocks to treatment. Six heifers were placed in each of 16, pens for a total of 48 heifers per treatment. All animals were fed a total mixed ration for 42 days containing 30% cottonseed hulls, 53% cracked corn, and 11% soybean meal. Treatments consisted of 0 or 150 mg AGRADO™/kg of diet. Heifers were observed daily for signs of morbidity and treated for morbidity according to an established protocol. Data were analyzed using analysis of variance. There was a significant difference in morbidity between the treated and non-treated group (73 vs 83%, P < 0.05). The number of days to the first pull between the treated and non-treated group approached significance (3.1 days vs. 4.7 days, P < 0.06). The cost of medical treatment between the treated and non-treated group was significantly different ($5.75 vs. $8.63, P < 0.04). There were no significant differences between groups with regards to duration of morbidity, ADG, and feed efficiency. These data suggest that the addition of AGRADO™ to the receiving ration decrease morbidity, subsequently decreasing medication costs and the labor associated with treatment. It would be expected that an increase in performance would accompany decreases in morbidity, however this was not observed in this trial.