

Phase Two: Analysis of Effects of Carbo Activatus on Broiler Weight and Carcass Protein Content

Wise-Dent, Olivia (School: Westminster Christian School)

It was hypothesized that if White Cornish Rock Cross Broilers are fed 1 percent of total weight of feed given, of powdered activated charcoal homogenized in their feed, the protein nutritional levels in the broilers' carcass will not be altered. No activated charcoal was given the first five days during a 49 day testing period. Three different groups were tested: 1) a control group, 2) a half strength group and 3) a full strength group. To prevent respiratory problems, heated lard was added to the feed of each group. After 49 days, the broilers were transported properly and harvested by a qualified USDA processing facility in order to conduct the carcass evaluation. At the conclusion of the testing period, protein levels in each of the carcasses were tested utilizing the Food Safety Net Services (FSNS) laboratory Kjeldhal method. Data was analyzed and it was shown that the activated charcoal (Toxiban) did not have a negative effect on the carcass protein levels supporting hypothesis 1. Hypothesis 2 stated that if broilers are fed 1 percent of total weight of feed given, of powdered activated charcoal then the weight gain in the carcass will not be altered. After the 49 days of collecting weight from each of the groups, it was found that there was no substantial effect on the weight gain. In conclusion, data supports hypothesis 2, indicating poultry producers would not lose income from the use of activated charcoal in feed.