





CONSTRUINDO SABERES, FORMANDO PESSOAS E TRANSFORMANDO A PRODUÇÃO ANIMAL

THE USE OF GUAR (*CYAMOPSIS TETRAGONOLOBA*) IN BROILERS FEED: EFFECTS IN GROWTH PERFORMANCES AND DIGESTIBILITY

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The aim of this study was the evaluation of Guar meal korma (with and without heat treatment) in broilers feed, by replacing the soybean meal and studying its effects on growth performance and diet digestibility. A group of 320 broilers Ross with 14 days of age was used in the performance trial. At the end of this trial (42 days of age) 40 broilers were used in the digestibility assay. In the performance assay, the broilers (LW 444 \pm 25 g) were divided in 5 treatments (64 per treatment, 8 replicates). In each collective pen were placed 8 animals (0,08 broilers/m²). It was determined the daily feed intake, the live weight, the average daily gain and the feed conversion ratio. In the digestibility assay, the 40 animals (LW 2843 ± 228 g) were Housed individually in metabolic cages, 8 animals per treatment (diet). The feces were collected for 4 days, after another 4 days of cage adaptation. In both assays, the animals were parted in 5 treatments, according to the diets provided. The control group was given a conventional feed; the GMK5 and GMK10 diets incorporated guar meal korma untreated (5% or 10%); and the GMKt5 and GMKt10 a heat treated guar meal korma (5 or 10%), by substitution of soybean meal, with all diets being isoproteic and isoenergetic. During the two first weeks, all broilers received a commercial diet and the tested diets were given between the 14th and 42nd days. At the end, the live weight of GMK5 (2931g) and GMKt10 (2936 g) was higher (P<0.05) than GMK10 (2605 g). In the daily weight gain we observed the same results. The daily feed intake and the feed conversion ratio do not differ. The mortality was about 2.2% and do not differ between treatments. The OM and CP digestibility of GMK5 and GMK10 were lower than control diet. The fat content digestibility was higher in the control diet than in all other diets. No differences in the NDF digestibility between treatments. According to the data obtained, we can show that the replacement of soybean meal by guar meal decreases slightly the diet digestibility but does not affect the performances of broilers.

Key words: digestibility, feeding, guar, performances, poultry

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