

Effect of feeding Lupin (*Lupinusangustifolius*) on carcass composition of Boer goat

ABSTRACT

This study was undertaken to measure the effects of different dietary treatments on carcass composition of Boer goats. The main protein source in the diet was *Lupinusangustifolius* and other ingredients were palm kernel expeller (PKE), soya bean meal, fish meal, wheat pollard, corn, molasses, crude palm oil, broken rice, and *Brachariahumidicola* hay. The protein level and energy level in all treatment diet was isocaloric and isonitrogenous (Crude Protein ~ 16.3% and Metabolizable Energy ~ 10.3MJ/kg). The Lupin composition in three treatment diets was 0%, 10% and 30%, respectively. Twenty four Boer goats, age 8-9 months old were used in this study which was divided into three equal groups. The adaptability period was 14 days and the feeding trial goes for 103 days. All goats were slaughtered according to Malaysian Halal Protocol 2009. The results revealed no significant differences ($P < 0.05$) in the initial weight, final weight, weight gain, hot carcass weight, cold carcass weight and dressing percentage among the groups. There was also no significant difference on carcass composition: production of lean meat, and bone to fat ratio among the groups. Thus, this study showed that Lupin can be used as an alternative for protein source in goats reared in tropical condition and its performance in term of weight gain and carcass composition is as good as soybean meal.

Keyword: *Lupinusangustifolius*; Boer goat; Carcass composition