

## HAIR LENGTH OF DAIRY CATTLE

### COMPRIMENTO DE PÊLOS EM BOVINOS LEITEIROS

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Hair length is an important characteristic of cattle. It is related to heat tolerance and ectoparasite infestation, such as by the horn fly, *Haematobia irritans*, and the tick *Rhipicephalus microplus*. Due to the importance of this trait, this study was carried out with the dairy herd of the Instituto de Zootecnia, located in Nova Odessa, São Paulo state. A total of 95 cows (over one year old) and 13 heifers (under one year old) of black and white Holstein breed, 10 cows and 7 heifers of the Jersey breed, and 16 cows and 8 crossbreed heifers were sampled. The crossbreed animals had at least 50% European genotype. Three hair samples were collected from the middle scapula between October 13 and 24, 2016, using specially adapted electric pliers. The hair were put in plastic sachets and then; the 10 longest hairs of the sample were measured. The analysis of variance (GLM) performed by SPSS 16.0 considered the fixed effects of breed, age (animals older or younger than one year old) and the interaction of these effects, with post-hoc comparisons of means (least significant difference,  $P < 0.05$ ). The dependent variable was tested for normality by the Kolmogorov Smirnov test and for homoscedasticity by the Levene test. The trait was affected by all the effects ( $P < 0.001$ ). Holstein cows had  $\bar{x}$  of  $13.64 \pm 0.42$  mm; Jersey cows:  $12.55 \pm 1.31$  mm, and crossbreed:  $12.19 \pm 1.03$  mm. The heifers had  $\bar{x}$ s of  $22.77 \pm 1.15$  mm,  $14.61 \pm 1.56$  mm and  $14.10 \pm 1.46$  mm, respectively for Holstein, Jersey and crossbreed. It is known that cattle's hair length declines as they mature. This work confirmed this phenomenon, in addition to showing that the Holstein breed has the longest ( $P < 0.05$ ) hair (HPB =  $18.20 \pm 0.61$  mm; Jersey =  $13.58 \pm 1.02$  mm; crossbreed =  $13.15 \pm 0.89$  mm). There was no significant difference ( $P > 0.05$ ) in hair length between the Jersey and crossbreed, but both differed from the Holstein. New assessments of the hair length of this herd will be carried out and they will be related with performance and resistance to ectoparasites.

Keywords: bovine, length, hair.