

SEMINAL CHARACTERISTICS FROM NELORE BREED BULLS CONFINED AND TREATED WITH RECOMBINANT BOVINE SOMATOTROFIN (r-bST)

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The present experiment evaluated the effect of the r-bST (LACTOTROPIN® - Sometribove Zinc 500,0 mg, ELANCO SAÚDE ANIMAL, Brasil) on the physical characteristics (whirl - TUR, motility - MOT and vigor - VIG) and morphologic (major defects - DM, minor - Dm and total - DT) from semen of 16 Nelore breed bulls, confined individually, and allocated in a completely randomized factorial design of 2 x 2, with two ages (young and adults) and two levels of r-bST (0 and 500 mg). The r-bST or saline s.c injections were accomplished every 14 days, with a total of nine injections per animal, during a period of 120 days. The semen collections were accomplished every 15 days by electro-ejaculation. The MOT and VIG were evaluate by a non parametric analysis of variance and Kruskal-Wallis test. The TURB, DM, Dm e DT were evaluated by analysis of variance (ANOVA), having as a variation source the collection day and the ages. The observed differences by ANOVA were studied with Tukey test, using the SAEG 8.0 program. The semen characteristics (physical and morphologic) of young bulls treated or not with r-bST were not affected ($P>0.05$) TUR (1.60 ± 1.29 vs 1.63 ± 1.27); MOT (48.75 ± 33.47 vs 45.94 ± 35.61); VIG (2.16 ± 1.67 vs 2.81 ± 3.40); DM (33.78 ± 28.6 vs 36.87 ± 23.87) e DT (39.6 ± 29.9 vs 46.83 ± 22.41), however, the Dm were significantly smaller ($P<0.05$) in animals treated with r-bST (5.82 ± 2.96) compared to the control ones (11.17 ± 7.84 ; $P<0.05$). The semen physical characteristics from the adult animals (MOT and VIG) were influenced by the r-bST treatment (79.70 ± 11.56 vs 64.06 ± 23.65 ; 3.80 ± 0.88 vs 2.92 ± 1.25 ; $P<0.05$) respectively, however the TURB was not affected by the treatment (3.12 ± 1.25 vs 2.12 ± 1.46 ; $P>0.05$). The DM (8.73 ± 5.68 vs 19.60 ± 15.78); Dm (5.98 ± 4.44 vs 7.98 ± 7.00) and Dt (14.72 ± 7.95 vs 27.58 ± 19.89), did not differ ($P>0.05$) among treatment. The results showed that GH is effective in improving the physical and morphologic characteristics of adult bulls, but it decreased the minor defects in young bulls.

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