The increase of world-wide meat consumption has caused a bigger concern about the meat and meat products texture. The objective of this study was to evaluate the following parameters: shear force (SF), water holding capacity (WHC) and weight loss by cooking (WLC) of Longissimus dorsi muscle obtained from the carcasses of confined animals with controlled feeding and from animals raised on pasture. The carcasses of 10 Nellore breed male (Bos taurus indicus) at 24 months of age were used in this study, of which 05 were obtained from confined animals in termination phase and fed with high energy diet (high grain content) and 05 from animals raised on pasture feed with Tifton grass and mineral salt. The SF analysis was conducted in the Universal TA.HD-plus texturometer equipped with Warner Bratzler blade. WHC was performed according to Hamm (1960) and WLC was calculated by the relation between raw weight and weight after cooking. Student’s t-distribution (p ≤ 0.05) was used to average’s comparisons. The results of SF, WLC and WHC for the confined and terminated animals were respectively: 73.78±19.23 N, 27.12±1.83% and 69.81±0.95%, while that for the animals raised on pasture, the results for the same analyses were: 139.00±19.77 N, 32.95±2.21% and 78.93±3.53%, respectively. For all parameters evaluated (SF, WHC and WLC), statistical analysis identified significant difference between the animals confined and grazing animals. Therefore, it was observed that the farming method influenced significantly the assessed characteristics of the Longissimus dorsi muscle, and confinement with high grain was more suitable for quality improvement.