SYSTEMS ECONOMIC EVALUATION OF PASTURE CUTTING CATTLE PRODUCTION SYSTEMS


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Among the production systems we see the need to analyze through the quantitative method, which production system is more efficient and profitable. The simulation effect on the productive performance and the characteristics of the adopted management system was evaluated and the economic evaluation of beef cattle raised with strategic supplementation, using protein supplementation in the dry season and mineral supplementation in the waters and finished in pastures of Brachiaria brizantha cv. MG-5. Two extensive and semi-intensive production systems were simulated using 429 and 458 calves, respectively, all of them between 8 and 10 months old and of the Nellore breed, with a mean body weight of 180 kg in the extensive system and 225 kg in the semi-intensive system, with average slaughter weight 585 kg for both systems. The development of the simulative comparative system with two slaughter cycles in each production system and 6 periods per system, starting from year zero to year six. By calculating the stocking rate / stocking rate it was able to determine how many animals the property supports during the year. The difference of the equivalence from the extensive to the semi-intensive is associated with the lower weight of the lower weight of the semi-intensive animals, because it is exclusively pasture, with no additional dietary ration. In the intensive system, the animals were slaughtered at 32 months of age, and in the extensive system they reached slaughter weight around 44 months of age. The mean daily gain (ADG) differed between the extensive and semi-intensive systems with averages of 0.370 and 0.490 kg / day, respectively. The economic analysis of the production systems pointed to the semi-intensive system with the best economic result, while the extensive system presented the worst result, with net margin and profit / ha of R $ 209 and R $ 107.03 per cycle. Gross income was acquired through the disposal and slaughter of the animals, generating a total of R $ 874,206.00 in the extensive and R $ 1,057,877.00 in the semi-intensive per cycle. At the end of the two cycles, the semi-intensive system presented a profit of R $ 22,371.58 more than the extensive system. The results suggest that the cattle rancher develops the semi-intensive production system. For it would be adopting a business portfolio that would bring stability to the property in terms of risk and would allow a median gain between the two analyzed systems.
Keywords: Economic Analysis, Beef Cattle, Profitability, Supplementation, Economic Viability.