





BOOK OF ABSTRACTS

17TH INTERNATIONAL SYMPOSIUM OF BIOLOGY AND ANIMAL NUTRITION





September 29th 2023, INCDBNA Balotesti, Romania

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Some Carcass Quality Characteristics of Anatolian Buffaloes

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Buffaloes contribute significantly to meat and milk production where they live. However, buffaloes feeding and their products have been studied insufficiently compared to cattles. This study was carried out to determine physico-chemical properties of muscle samples taken from Longissimus dorsi trochis of Anatolian water buffalos slaughtered in the Kayseri region. In the study, 34 buffaloes that were sampled in slaughterhouse in March and April 2023. In the study, it was determined that 28 of the buffaloes sent for slaughter and female (82.4%) and 6 male (17.6%). The average condition score in females was 4.02 and the body condition scores ranged between 3.0 and 5.0 and for males body condition score was 3.25 and the range between 3.0 and 3.75. The average hot carcass weight in females was 245.68 kg and in males 220.31 kg. The slaughter age in female buffaloes (between 2 and 5 years old) is higher than that of males (2 years old) and they are sent to slaughter after an intensive feeding. The thickness of the carcass fat was 9.35 mm in females and 7.39 mm in males, and the meat pH24 value was similar 5.49 in females and males. The L* (lightness) 40.62 and 42.06, a* (redness) value 20.63 and 17.44, and b* (yellowness) value varied between 12.31 and 11.19 in females and males respectively. As a result, it was determined that slaughter age, condition score and carcass fat thickness and a* and b* values in meat were higher in females, meat pH values were similar and L* values in meat were lower than males.

Keywords: buffalo, carcass, meat quality, sustainability