Different Haematological Condition, Immune System and Comfort of Muscovy Duck and Local Duck Reared in Dry and Wet Seasons

Title	Different Haematological Condition, Immune System and Comfort of Muscovy Duck and Local Duck Reared in Dry and Wet Seasons
Author Order	of
Accreditation	
Abstract	Muscovy and local duck belong to Indonesian local waterfowl a meat and egg production purpose, whose physiological condition is strongly affected by genetic and environmental factors in which physiological condition determines duck productivity. Due to the global climate change including in Indonesia this study is important. This research aimed to study the different haematological condition, immune system and comfort of muscovy and local duck reared in dry and wet seasons. 128 muscovy and local ducks of one-day old of male and female were involved in this study with Completely Randomized Factorial Design (2x2x2). Two factors : breed of ducks (muscovy and local), sex (male and female) and season (dry and wet). The variables included the amount of erythrocyte, leukocyte, differential leukocyte, heterophile-lymphocyte ratio, hemoglobin level, hematocrit value, and total plasma protein. Data were analyzed using Analysis of Variance followed by Duncan test for any different treatment shown in the variables. The result showed that interaction among the duck order, sex and seasons significantly influenced the heamatological condition and welfare of the ducks. Muscovy duck and local duck reared in wet season had a higher haematological status than those of dry season. Leukocyte amount was higher in Muscovy duck than local duck, while Muscovy duck had a lower heterophile-lymphocyte ratio than that of local duck. In conclusion, haematological condition in wet season and dry season was different, the most influential immune system was heterophile and Muscovy duck and local duck were more in comfort in wet season.ÃƒÂ,Ã‚Â Keywords: muscovy duck, haematological, immune system, comfort, dry season, wet seasonÃƒÂ,Ã‚Â Animal Production 14(2):111-117
Publisher Name	Universitas Jenderal Soedirman, Faculty of Animal Science, Purwokerto-Indonesia
Publish Date	2012-12-09
Publish Year	2012
Doi	
Citation	
Source	ANIMAL PRODUCTION
Source Issue	Vol 14, No 2 (2012): May
Source Page	
Url	http://animalproduction.net/index.php/JAP/article/view/371
Author	Dr ISMOYOWATI, S.Pt, M.P