ABSTRACT

IKA VINA ROSEVITA (B04062635). Histopathology Study of Bursa of Fabricius and Spleen of Broiler which were Challenged by H5N1 Avian Influenza Virus After Treatment Sambiloto Extract (Andrographis paniculata Nees). Under direction of Agus Setiyono and Wiwin Winarsih

This research aim was to study the histopathology of lymphoid organ bursa of Fabricius and spleen of broiler which were challenged by H5N1 AI virus after treatment medicinal plant extract of Sambiloto (Andrographis paniculata Nees). Fourteen chickens were divided into four groups with different treatment that are K1 (without the extract of Sambiloto, without the AI virus infection), K2 (without the extract of Sambiloto, infected with AI virus), P1 (given the extract of Sambiloto without the AI virus infection), and P2 (given Sambiloto extract and infected with AI virus). Bursa of Fabricius and spleen were taken for histopathological preparations, and then were observed using light microscopy. Histopathological observations showed that the H5N1 AI virus infection causes oedema, necrotic, and depletion of lymphoid follicles on the bursa of Fabricius; and congestion, hemorrhage, and depletion of lymphoid follicles in the spleen. The treatment of extract of Sambiloto before H5N1AI virus infection can reduce lesion in the bursa of Fabricius and spleen. Sambiloto extract indicated potentially inhibit the infection of H5N1 avian influenza viruses.

Keywords: sambiloto extract, Avian Influenza, bursa of Fabricius, spleen