



Profile of Protein Tyrosine Kinase in Seminal Plasma of Merino Sheep using Technique of Sodium Dodecyl Sulphate Polyacrilamide Gel Electrophoresis

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Abstract : The research aims to find out profile of protein tyrosine kinase in seminal plasma of Merino sheep. The semen was obtained from two Merino sheep collected by using artificial vagina. Next, separation of spermatozoa from seminal plasma was carried out using centrifugation with the speed of 4000 rpm for 40 minutes. Seminal plasma obtained was purified using centrifugation with the speed of 3000 rpm for 10 minutes, then media of PBST-PMSF were added as much as 5 times of seminal plasma volume and after that, vortex was done to mix them homogeneously. Then, sonication for 10 minutes and centrifugation with the speed of 6000 rpm for 10 minutes were carried out on them. Supernatant obtained was added with ethanol with the ratio of 1:1. Finally, analysis of protein tyrosine kinase tapes was conducted using the technique of SDS-PAGE. The research showed that there were 13 protein tapes in each sample of seminal plasma, that is, 49.63 kDa, 139.7 kDa, 114.97 kDa, 109.3 kDa, 97.33 kDa, 93.83 kDa, 86.23 kDa, 77.6 kDa, 64.6 kDa, 52.3 kDa, 41.93 kDa, 38.13 kDa, dan 34.5 kDa. The research concluded that protein tyrosine kinase in seminal plasma of Merino sheep was on the 6th tape with molecular weight of 93.83 kDa.

Key words : protein tyrosine kinase, SDS-PAGE, Merino sheep.

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