EFFECT OF INFUSUM SALAM LEAVES (Eugenia polyanta) ON THE APPEARANCE OF TESTICULAR SPERMATOGENIC CELLS WHITE RATS (Rattus norvegicus) WAS INDUCED WITH ALLOXAN

Gahastanira Permata Solikhah

ABSTRACT

This research was aimed to know the effect of infusum salam leaves (Eugenia polyantha) on the appearance of testicular spermatogenic cells white rats (Rattus norvegicus) with diabetes mellitus. A number of 25 white rats (*Rattus norvegicus*) strain Wistar were divided into 5 groups. The pancreas of 4 groups was damaged using a doses of alloxan 200 mg/kg intraperitoneally. After state hyperglycemia condition, 3 groups was treatment with a dose therapy of infusum salam leaves (P1) 412.5 mg/150gbb, treatment (P2) 825 mg/150gbb and treatment (P3) 1237.5 mg/150gbb dose, one group as a control negative as the normal group and one group as a control positive was induced with alloxan but without infusum salam leaves treatment. The treatment was for 48 days, the mice were killed and were taken the testes organs to made a histopathology preparations using Hematoxylineosin staining (HE). The result of the study showed that infusum salam leaves (Eugenia polyantha) giving on treatment groups led to an increase in the number of spermatogenic cells (p <0.05) at all doses compared to positive controls. Treatment (P3) 1237.5 mg/150gbb dose can increase the amount of the highest spermatogenic cells compared with P2 and P3 group (412.5 mg/150gbb dose and 825 mg/150gbb).

Keywords: diabetes mellitus, alloxan, infusum salam leaves, spermatogenic cells