Influence Of Melatonin To Histopathology Pancreas In Rat (Rattus Norvegicus) Experimentally Diabetes Mellitus Type I

Abstrak:

The aim of this study was obtained the influence of melatonin on histopathology pancreas in rat (Rattus norvegicus) experimentally diabetes mellitus type I. Thirty healthy wistar male rat (Rattus norvegicus) with 100–150 gram average body weight and two - three month old were used in this study. This rat were adapted for seven days and divided into six group of treatment, that was P0, P1, P2, P3, P4, and P5. Treatment on group P0 as control negative, P1 which injected by alloxan 150 mg/kg body weight as positive control of diabetes mellitus type I. Melatonin was given intraperitoneally. Treatment on group P2 was injected by alloxan 150 mg/kg body weight and melatonin 5 mg/kg bodyweight, P3 was injected by alloxan 150 mg/kg body weight and melatonin 10 mg/kg body weight, and P4 was injected by alloxan 150 mg/kg body weight and melatonin 15 mg/kg body weight, to observe the effective dose of melatonin as a therapy of diabetes mellitus type I. Treatment on group P5 was injected by alloxan 150 mg/kg body weight and by injecting forbetes which has known as drug of choice for diabetes mellitus type I, orally. This study used Complete Random Design and the result analyzed by using ANOVA (Analyzed of Variance) continued with Duncan's Multiple Range Test method and processed by using SPSS computer software program. The base result showed that melatonin can reduce Langerhans island cell damage in rat (Rattus norvegicus) experimentally diabetes mellitus type I. This showed the use of melatonin as the cure for diabetes mellitus type I is very good and effective.

Keyword:

Daftar Pustaka:

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