THE EFFECTS OF GARLIC EXTRACT (*ALLIUM SATIVUM*) IN DECREASING TRIGLYCERIDE RATE IN MALE WHITE MICE (*RATTUS NORVEGICUS*) OF THE *SPRAGUE DAWLEY* STRAIN ON HIGH FAT DIET

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Abstract

Background: Dyslipidemia is one of the risk factors of atherosclerosis incidence. In several studies, garlic shows many positive effects on the risk factors of cardiovascular disease such as dyslipidemia, hypertension, and hyperglycemia. This research is meant to discover the effects of garlic extract in decreasing the triglyceride rate on white mice that is given high fat diet for a certain amount of time.

Methods: This is research was conducted for 28 days using 25 male white mice (*Rattus norvegicus*) of the Sprague Dawley strain that was divided onto 5 different groups, with equally 5 mice in each group. The negative control (N) group was given standard diet. While the positive control (KT) was given high fat diet intermittently. As for the rest of the groups, which are P1, P2, and P3, are given high fat diet also intermittently, and also exposed to garlic extract in the concentration of 0.5 ml, 0.025 ml, and 0.1 ml.

Result : Kruskal-Wallis test showed the result as p>0.05 (p=0.075) means that the result of the conducted research as of above was insignificant.

Conclusion: The exposure of garlic extract was statistically measured and proven to be insignificant towards the decreasing of triglyceride rate.

Keywords: Dyslipidemia, garlic, triglyceride