Effectivity of bio pesticide made from coconut shell waste liquid smoke to control Cnaphalocrocis medinalis Guenne in Ciamis

Muhammad Vikram

Department of Education of Biology, University of Pasundan Bandung

ABSTRACT

The aim of this study is to investigate the effectivity of bio pesticide made from coconut shell waste liquid smoke to control Cnaphalocrocis medinalis Guenne population in Ciamis. The methodology and design of this study is based on mortality test and true experimental design, respectively. The study was performed by means of completely randomized design consisting of three actions (2%, 5%, and 8%) and one control with six repetitions for three days of observation. Twenty four groups of samples with six Cnaphalocrocis medinalis Guenne were tested in these experiments. ANOVA and DMRT test (Duncan's Multiple Rangen Test) using SPSS (Statistical Package for the Social Sciences) were used to analyze the obtained data. Our results show that samples in control experiment do not induce any sign of mortality while at concentration of 2%, 5% and 8% the average of death of Cnaphalocrocis medinalis Guenne is 64%, 83% and 100%, respectively. In conclusion, the higher the concentration of coconut shell waste liquid smoke, the more effective it will be to control the population of Cnaphalocrocis medinalis Guenne.

Keywords: bio pesticide, Cnaphalocrocis medinalis Guenne, effectivity, liquid smoke