## IR-PERPUSTAKAAN UNIVERSITAS AIRLANGGA

## ABSTRACT

The bioactivity of Aglaia odorata leaf extract were studied as insecticide to larval stage of Crocidolomia binotalis. In the research leaf cabbage was used for food of C. binotalis.

Observation and experimental research were done at the laboratory. Research design used for experimental research is Completely Randomized Design. Data analysis for the bioactivity test was evaluated by using probit analysis and analysis of variance. The results of the antifeedant test for non selective food was calculated using t- test.

The test extract acted strongly, larval mortality increased markedly 2 days after treatment, then the mortality increased gradually and reached more or less a constant level 4 days after treatment. At this time, LC50 of crude extract againts instar III was 3.73 % and 1.98 % for topical and oral application, respectively.

The extract of A. odorata affected the development of C. binotalis larval stages. The effect of antifeedant showed significantly to the total larval survival of the treated and untreated. The extract of A. odorata affected the decrease of the food activity. The higher concentration of the extract used, the higher bioactivity of the extract to C. binotalis.

Key word: A. odorata, leaf extract, botanical insecticide, C. binotalis.