Demography of the bagworm, Pteroma pendula Joannis on an exotic tree, Acacia mangium Willd in Malaysia

ABSTRACT

Demography of Pteroma pendula (Lepidoptera: Psychidae) feeding on Acacia mangium was examined in the laboratory. The species undergoes six instars. The mean total lifespan of P. pendula was 44.8±1.5 days, with males at 47.7±1.4 days and females at 41.8±1.6 days. The length of cases was significantly correlated with the larval head capsules width with R2=0.97 for male and R2=0.92 for female. Its short life cycle allows this species to have a minimum of eight generations yearly. Generally, its growth and developmental performances on A. mangium are relatively similar to those developing on oil palm. Thus A. mangium is a good alternate host for the pest population to build up its numbers. In addition to its invasiveness, A. mangium serves not only as a refugium for the pest but also a source of infestation to agricultural crops within the vicinity.

Keyword: Bagworms; Pteroma pendula; Life history; Acacia mangium