



RESEARCH ARTICLE :

Biology of cotton pink bollworm, *Pectinophora gossypiella* (Saunders) Lepidoptera: Gelechiidae

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SUMMARY : The biology of *Pectinophora gossypiella* was studied at three different temperature regimes of viz., 25±1, 30±1 and 35±1°C. The study revealed that the time taken for developmental stages was less with increase in temperature. At 25±1 °C, the incubation period, larval period and pupal period were 3.77 ± 0.78 days, 23.15 ± 3.23 days and 8.75 ± 0.55 days, respectively. While at 35± 1 °C, the incubation period, larval period and pupal period were comparatively low (1.95 ± 0.51 days, 12.8 ± 1.96 days and 5.20 ± 0.47 days, respectively). The longevity of adult male was 9.00 ± 0.5 days at 25 ± 1 °C and 3.57 ± 0.4 days at 35 ± 1 °C, whereas female longevity was 9.5 ± 1.0 days at 25 ± 1 °C and 3.45 ± 0.6 days at 35 ± 1 °C. The total life cycle from egg to adult emergence was high at 25 ± 1 °C (52.3 ± 6.51 days) and low at 35 ± 1 °C (29.8 ± 4.28 days). The oviposition period was ranged from 1.5 to 2.5 at different temperature but the fecundity was high (112.85 ± 16.1 eggs/female) at 25 ± 1°C and less (49.80 ± 8.69 eggs/female) at 35 ± 1°C. The influence of decreasing in temperature was evident in extending the duration of the life cycle.

KEY WORDS :

Pink bollworm,
Biology, Varied
temperature regimes

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