*BIOASSAY OF *BACILLUS THURINGIENSIS* ISOLATES WITH THE GREATER WAX MOTH *GALLERIA MELLONELLA*

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Isolates of *Bacillus thuringiensis* were screened against the wax moth, *Galleria mellonella* to find a better bacterial strain than the best commercial product. For bioassays bacterial powders supplied by Dr. H. T. Dulmage from U.S.A. were used. An artificial food was used for the assays. Evenly sized larvae, 7 days old at 30°C, of average weight about 0.2 mg were used. After incubation at 30°C for 7 days the larval mortality was assessed.

The mean L c_{50} value for the standard was 0.00091% bacteria in the food. The L c_{50} of the test isolates ranged 0.0013% – 11.0%. The active isolates were in the serotypes 5 and 7. No isolate was more active than H-serotype 5a 5b which was used once in commercial "Thuricide" and as standard in these bioassays.

24 assays with 12 relatively inactive isolates had probit lines with a mean slope of 3.06 ± 0.40 while the twelve assays with six active isolates had a mean slope of 3.3 ± 0.20. Thus the slopes of probit lines of active and inactive isolates were not significantly different. The average slope of about 3 indicates that both infectivity due to spores and toxic effect due to crystals were responsible for the larval mortality. The L c_{50} values indicate that the toxins from different isolates of *B. thuringiensis* had different level of insecticidal activity against *G. mellonella.*

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