

Biological Activity and Characterization of Nucleopolyhedrovirus Isolates of *Spodoptera litura*

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Geographical isolates of *Spodoptera litura* (Fabricius) (Noctuidae: Lepidoptera) nucleopolyhedrovirus (SplNPV), collected from different parts of India and maintained at Tamil Nadu Agricultural University, were compared for their biological activity and subjected to Restriction Endonuclease (REN) analysis. Neonate and second instar bioassay studies revealed similarity in biological activity as shown by the overlapping fiducial limits of LC₅₀ values. However, there were differences in yield among isolates: significantly higher yields were obtained from isolates UAS and CBE than from the BARC isolate. REN analysis of the four isolates with *Pst* I, *Hind* III, *Bam* HI and *Eco* RI enzymes indicated genotypic variation among the isolates. Based on the commonality of the bands, the isolates could be broadly divided into two groups: isolates AU and CBE formed one group, and the other group comprised UAS and BARC based on genetic relatedness.

KEY WORDS: Baculovirus; biological activity; geographical isolates; restriction enzymes; *Spodoptera litura*; *S. litura* NPV; yield.

Received Aug. 30, 2004; accepted July 26, 2005; <http://www.phytoparasitica.org> posting Nov. 21, 2005.

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