

# Insecticidal Activity of Synthetic Amides on *Spodoptera frugiperda*

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The phytochemistry of the genus *Piper* (Piperaceae) has been widely studied due to the biological properties of amides from these plants. In this work, we have synthesized and evaluated the toxic effect of 11 amides against the fall armyworm *Spodoptera frugiperda* larvae. The naturally occurring piperine was also evaluated. The most active amide was *N*-[3-(3',4'-methylenedioxyphenyl)-2-(*E*)-propenoyl]piperidine with a LD<sub>50</sub> of 1.07  $\mu\text{g mg}^{-1}$  larvae. This amide was also evaluated by ingestion.

*Key words:* Cinnamoyl Amides, Insecticide, *Spodoptera frugiperda*