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CHAPTER 11

NATURAL AND SYNTHETIC PROP-2-ENE-1-ONE SCAFFOLD BEARING COMPOUNDS AS MOLECULAR ENZYMATIC TARGETS INHIBITORS AGAINST VARIOUS FILARIAL SPECIES

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ABSTRACT

Lymphatic filariasis, often termed as elephantiasis disease which has affected over 140 million people across the world. It spreads primarily through three pathogenic species *Wuchereria bancrofti*, *Brugia malayi*, and *Brugia timori* via vector species *Culex quinquefasciatus*, *Anopheles species*, *Aedes aegyptii*, and *Mansonia annulifera*/*Mansonia uniformis*. The disease is quite common in the tropical regions with larger dominance in the continent of Asia, Africa, and South America. Pharmacotherapeutic through natural products may believe to offer better potency and reduced