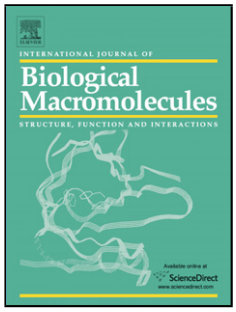


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# Chlorophyll rich biomolecular fraction of *A. cadamba* loaded into polymeric nanosystem coupled with Photothermal Therapy: A synergistic approach for cancer theranostics.

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## Abstract

Development of multifunctional biodegradable nanomaterials to encapsulate hydrophobic drugs and their triggered release in cancer theranostics is a challenge. In the current study, we report the encapsulation of potent anticancer - chlorophyll rich biomolecular fraction from the plant *Anthocephalus cadamba* into a polymeric nanosystem. The biomolecular fraction was combined with an NIR dye IR-780 to make it photo-thermally active. It was evaluated for its combinatorial (biomolecular extract and photothermal mediated) synergistic cytotoxicity in skin cancer cells.