PHARMACOLOGICAL MODIFICATION OF BTHTX-I INDUCED BY **LAPACHOL**

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Lapachol (naphthoquinone) is a compound naturally encountered as constituent of many Bignoniaceae family plants. It has been the subject of much interest for a number of the years due its various biological activities. The present study investigated the activity of lapachol in *B. jararacussu* venom and in the K49 PLA_2 isoform (BthTx-I) in edematogenic and hemorrhagic activity. Edema was induced by intradermal injection, in the foot pad of Swiss mice, of *B. jararacussu* venom and purified BthTx-I. Inhibition studies were performed by incubating venom and BthTx-I with Lapachol at different ratios (1:1 and 1:2). Hemorrhagic activity was assayed according to the method of Nikai et al. (1984). This study showed that the hemorrhagic activity caused by intradermal injection of *B. jararacussu* venom were significantly neutralized by the Lapachol at a ratio of 1:2 (w/w venom:extract). However we can conclude that Lapachol was capable of neutralizing the hemorrhagic activity induced by crude venom, and the BthTx-I inflammatory activity in paw edema also was inhibited by Lapachol. Although, more studies are demanded to elucidate its mechanism of action.

Key words: Antiinflamatory, BthTx-I, lapachol, *B. jararacussu*.