New Chemical Derivatives of the Natural Compound Dictyophlebine Inhibiting Acetyl- and Butyrylcholinesterase

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The acetyl- and butyrylcholinesterase inhibiting natural product dictyophlebine **1** was subjected to different *N*-alkylation and hydrochlorination reactions by which five new and bioactive chemical derivatives (**2** – **6**) with pentyl, pent-4-en-1-yl, hex-5-en-1-yl, 4-chloropentyl and 5-chlorohexyl substituents at the 3-*N* position were obtained with high yield. The alkylated and chlorinated products **3** – **6** were found to have significantly higher inhibitory potential towards cholinesterase than the parent compound **1**.

Key words: Dictyophlebine, Acetyl- and Butyrylcholinesterase, Chemical Derivatives, *N*-Alkylation, Hydrochlorination