

Separation of Bioactive Biflavonoids from *Rheedia gardneriana* Using Chitosan Modified with Benzaldehyde

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Z. Naturforsch. **60c**, 408–410 (2005); received September 29, 2004/January 31, 2005

This paper shows the influence of benzenic groups on the chitosan surface for the separation of bioactive biflavonoids from *Rheedia gardneriana* leaves. The yield of the biflavonoids using chitin modified with benzaldehyde (CH-Bz) as adsorbent in column chromatography was higher than that achieved with silica gel and chitosan. The presence of benzenic groups decreases the polarity of chitosan and consequently the interaction of hydrogen bonding between phenolic hydroxyl (OH) of biflavonoids and amine groups of the adsorbent. Therefore, the separation of these compounds appears to be the result of hydrophobicity and π - π interaction among electrons from the aromatic ring in sorbent and biflavonoid molecules.

Key words: Chitosan-benzaldehyde, Biflavonoids, *Rheedia gardneriana*