

عنوان مقاله:

The Prediction of Adsorption Properties of a Solid Phase-Microextraction Fiber by Chemometrics methods

محل انتشار:

نشریه پیشرفته شیمی، دوره 2، شماره 3 (سال: 1398)

تعداد صفحات اصل مقاله: 13

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خلاصه مقاله:

A new method for estimation of adsorption properties of a solid phase microextraction fiber by artificial neural network (ANN) has been studied for the first time ever. An etched steel fiber which is simple prepared and durable was selected and adsorption of 12 analytes that were in four different chemical categories, was studied. 9 of them were selected as the training and 3 as the test. The amount of adsorptions were obtained through the direct extraction from aqueous and then GC analysis. The adsorption were analyzed by ANN. The results are quite satisfactory and the mean absolute percentage error of tests was 18.0 %. The method was simple, practical, straightforward, economical, and accurate. The method did not require many analytes

کلمات کلیدی:

Artificial Neural Network, Solid phase microextraction, Adsorption prediction

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