

عنوان مقاله:

Cobalt hexacyanoferrate / Poly 1-naphthol nano-composite for cadmium removal

محل انتشار:

دومین کنفرانس ملی ژئولیت ایران (سال: 1394)

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خلاصه مقاله:

Cadmium is a highly toxic heavy metal even at a trace level. In this study, a novel composite, poly 1-naphthol grafted cobalt hexacyanoferrate (CoCHF) , has been applied as an adsorbent to remove cadmium ions from aqueous solutions. Nano composite was characterized by Fourier transform infrared spectroscopy(FT-IR) and scanning electron microscopy (SEM) technique. The maximum removal efficiency of the newly derived material for cadmium ions has reached 99% at an initial pH 6. From the batch experiment results it can be found that the initial concentration of the working solution played significant role in the adsorption process The results show that this material can effectively remove cadmium ions from effluent

کلمات کلیدی:

Cadmium removal, Adsorption, Nanocomposite, poly 1-naphthol

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