

1. Record Nr.	UNINA9910458929503321
Autore	Siebers Nina
Titolo	Bentonite Functionalised with 2-(3-(2-aminoethylthio)propylthio)ethanamine (AEPE) for the Removal of Hg(II) from Wastewaters [[electronic resource]] : Synthesis, Characterisation and Hg(II) Adsorption Properties // Nina Siebers
Pubbl/distr/stampa	Hamburg, : Diplom.de, 2008
ISBN	3-8366-1847-8
Descrizione fisica	1 online resource (73 p.)
Disciplina	628.5
Soggetti	Bentonite Electronic books.
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Title from cover.
Nota di bibliografia	Includes bibliographical references.
Nota di contenuto	Bentonite Functionalised with 2-(3-(2-aminoethylthio)propylthio)ethanamine (AEPE) for the Removal of Hg(II) from Wastewaters; Content; Abbreviations; Physical characteristics; Index of figures; Index of tables; Index of schemes; Index of equations; Abstract; 1 Introduction; 2 Aims; 3 Experimental; 4 Results and Discussion; 5 Conclusion and Outlook; 6 References; 7 Appendix
Sommario/riassunto	In this study, natural bentonite clay was first purified and then functionalised with the chelating ligand 2-(3-(2-aminoethylthio)propylthio)ethanamine (AEPE) to improve the adsorption capacity and selectivity towards Hg(II) ions. The surface modification was characterised with the help of powder X-ray diffraction (XRD), Fourier transform infrared spectroscopy (FT-IR), BET isotherm to determine the specific surface area while the thermal stability of the samples was studied using thermogravimetric analysis (TGA). FT-IR and TGA demonstrated the presence of the chelating ligand on the modified c