

The invention relates to a synthesis of high-molecular compounds, particularly, to polyurethane foams being produced from isocyanates and which may be used in medical practice as biologically active materials. A process for preparing polyurethane foams is realized by an interaction of compounds with more than 2 active atoms of hydrogen, toluylene diisocyanate, amine type and that tin containing catalysts, water, organosilicon foam stabilizer, in which according to the invention as a compound with more than 2 active atoms of hydrogen 1.4-di-N-oxide 2.3-bis(oxymethyl)quinoxaline, dihydrazide disulphonyldibenzo-18-craune-6 and a mixture of complex and simple polyesters are used with a molecular mass from 800 to 5000, and additionally as a foam stabilizer – a petrolatum. Polyurethane foams produced according to this process are bio compatible and have a prolonged action bactericidal activity.