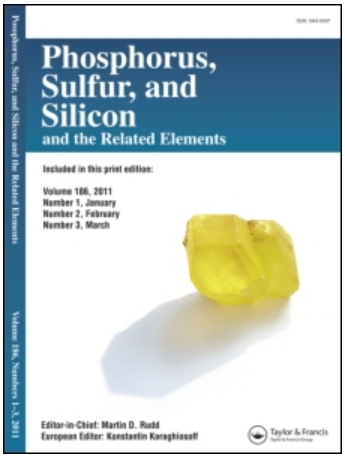

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New Method of Halogenation of Organophosphorus Compounds

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NEW METHOD OF HALOGENATION OF ORGANOPHOSPHORUS COMPOUNDS

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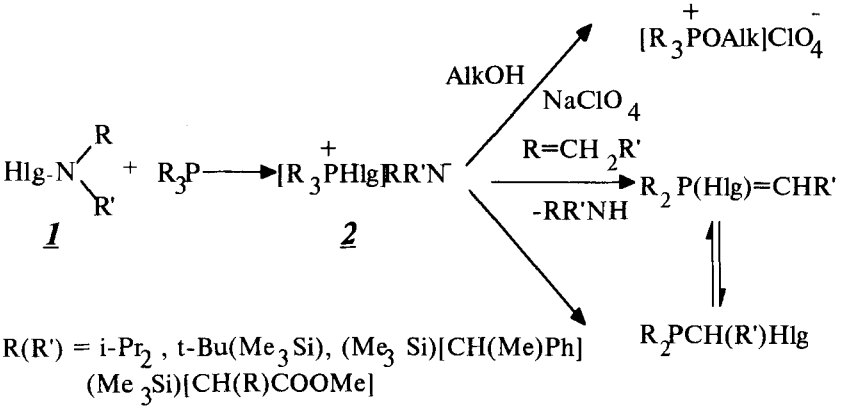
N-Chloroalkylamines react usually with tervalent phosphorus compounds to afford products, containing the phosphorus-nitrogen bond. We found that the sterical hindrances favour to the nucleophilic attack of the tervalent phosphorus atom on the "positive" halogen atom with the formation of phosphorus halogenated products. Sterical hindered N-halogenoalkylamines ***1*** (Hlg=Cl,Br) possess active halogenating properties to react with tervalent phosphorus compounds similarly to methane tetrahalides. Reaction proceeds via the formation of halogenophosphonium intermediates ***2***, containing an anion R_2N, which reacts with alcohols to afford alkoxyphosphonium salts, transforms into halogenophosphonium salts or P-halogenoylids. Advantages of N-halogenoalkylamines ***1*** over methane tetrahalides are more high chemical selectivity. Moreover the inclusion of chiral substituents R into N-halogenoalkylamines gives enantioselective halogenating reagents.



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