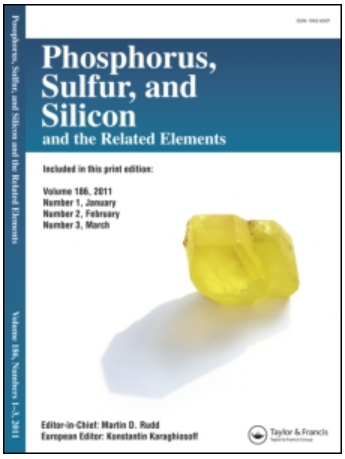

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ARYLATING PROPERTIES OF DERIVATIVES 2,4 - BIO(THRIFLUOROMETHANESULPHONYL)BENZENESULPHONYL ACID

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Compounds 2,4-$(CF_3SO_2)_2C_6H_3X$ while X = Cl (I), SO_2Cl (II), SO_2F (III), $SO_2NHC_6H_5$(IV), $HNSO_2C_6H_5$(V) are synthesized with the aim of finding active arylating means. Kinetics of the interaction of these compounds with the nucleophylic reagents, the character of the leaving group and the properties of medium are investigated by the spectrophotometric method.

The presence of dual reactive ability for compounds II-IV in the reactions with amines which appears according to the principle of rigid and soft acids and bases is established more basic nucleophylic reagents attack carbon of the aromatic ring (bond C_{Ar} - S is broken) less basic but more nucleophylic reagents attack sulphur of sulphonic group (bond S-X is broken). Arylating ability of compounds IV,II in 1-4 order are higher than corresponding derivatives 2,4 -dinitrobenzensulphonyl acid. Leaving groups according to the influence on the speed of arylation n-butylamine are arranged in succession $SO_2Cl > SO_2F > Cl > SO_2NHC_6H_5$

The usage of alcohols in the quality of dissolvents gave the opportunity of establishing the presence of the basic catalysis by dissolvent which is realized on the account of formation of hydrogen bond between nucleophylic reagent and alcohol.

The idea of the mechanism of the reaction is represented here