



## Activity Coefficient Behaviour of Nonelectrolytes in Sulphuric Acid Solution

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### ABSTRACT

*Hydroxamic acids behave as nonelectrolytes in the presence of electrolyte solution. The activity coefficient behaviour of N-p-Tolyl-4-Bromobenzohydroxamic acid is investigated by the measurement of its distribution ratio between organic solvent and sulphuric acid-water mixture. Activity coefficients are directly related to the partial molar free energies of organic species in various media, they are important in providing information about typical solute-solvent interactions as a function of medium and about relative solvation energies of various species in a given medium on the basis of activity coefficient data, salting-constants of hydroxamic acids have been evaluated in terms of Setschenow Constant.*

**Keywords:** Hydroxamic acid, Activity coefficient, Hammett's activity coefficient postulate, Setschenow constant, Distribution ratio.

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