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Solvation Effects on Structure and Charge Distribution in Anionic Clusters[1]

J. MATHIAS WEBER, JILA and Department of Chemistry & Biochemistry, University of Colorado at Boulder

The interaction of ions with solvent molecules modifies the properties of both solvent and solute. Solvation generally stabilizes compact charge distributions compared to more diffuse ones. In the most extreme cases, solvation will alter the very composition of the ion itself. We use infrared photodissociation spectroscopy of mass-selected ions to probe how solvation affects the structures and charge distributions of metal-CO_2 cluster anions.

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