GAS PHASE ELECTRONIC SPECTROSCOPY OF 5-FLUOROSALICYLIC ACID.[a]

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Methyl salicylate and its derivatives have generated large amounts of interest due to the possibility of intramolecular proton transfer in their electronically excited states (ESPT). Here, the excited state dynamics of 5-fluorosalicylic acid and its dimer will be discussed within the context of their vibrationally and rotationally resolved electronic spectra. Stark effect studies of the latter permit identification of specific conformers of 5FSA. However, some species exhibit broadened spectra, whereas others do not, suggesting a species-specific ESPT reaction.

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