

Thin films of sodium salicylate were deposited by spin coating from a solution prepared by dissolving sodium salicylate in methanol. The films were characterized by X-ray photoelectron spectroscopy, X-ray diffraction, scanning electron microscopy, UV-visible spectroscopy and spectrofluorometry. The films were crystalline with a strong blue fluorescence peaked at an emission wavelength of 419.3 nm. The influence of solution concentration, spin speed and annealing temperature on the fluorescence intensity was studied. Optimum results were obtained with a solution whose concentration was 2.5 M. It was found that lower spin speed resulted in higher fluorescence intensity. Moreover, the fluorescence intensity decreased as the annealing temperature was increased. The durability of the films over a period of 30 days was also investigated, and films annealed at higher temperatures were found to be less degraded with time.