Chromatographic Chamber Saturation in Micellar Thin-Layer Chromatography

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In the present article the influence of chromatographic chamber saturation on the rate properties of the mobile phase front was investigated with using hydrous and hydrous-organic micellar mobile phases. It was demonstrated that chromatographic chamber saturation in the room temperature in micellar TLC is not influence on flow constant value, which in the most depends on surfactant type and organic modifier volume fraction. The saturation technique can be removed when investigation with micellar TLC was done, and at the temperature 20-30 °C chromatographic separation can be done in unsaturated chromatographic chamber.

Keywords: thin-layer chromatography; micellar mobile phase; chromatographic chamber saturation