

NEW TECHNOLOGIES FOR COSMETIC APPLICATIONS

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Rapid Stability Analyses of Concentrated Dispersions

Characterization of colloidal systems and investigation of their stability in their native state (i.e. without denaturation) is of prime importance for the formulator who wants to optimize the development of new products. A new technique has been developed, based on Multiple Light Scattering (MLS), to fulfill this purpose. It has been designed to measure and elucidate instability phenomena in liquid colloidal dispersions from 0 to 95% in volume fraction, with particles from 0.1 μ m to 1mm, 5 to 50 times quicker than the naked eye. It has also proven to be a useful technique to characterize the dispersion state of colloidal samples (for quality control purposes) and the mean diameter of the particles in the dispersion. The Turbiscan technology is fitted with a fully automated ageing station enabling to monitor the stability of various formulations at three different temperatures and to get automatic data processing, helping the formulator to save time and test more formulations. This ageing station can be used for high throughput screening tests, determination of expiry dates or quality control.

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