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## 角層と洗剤のインタラクション

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### The Interaction between Surfactants and Stratum Corneum

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#### Abstract

The surfactant is widely used as a cleaning agent of the skin. Surfactant that dissolves to water takes various behavior such as adsorptions and washing by the structure that the water makes. In washing oil, the influence of the rolling-up and emulsification depends on the structure of the oil and the surfactant. It introduces the analytical technique that uses the surface tension and the contact angle.

The adsorption of nonionic surfactant (alcohol ethoxylate: AE) on an electrostatic surface significantly increased when sodium dodecyl sulfate (SDS) was present. The enthalpy of adsorption of the SDS-AE mixed system on BSA as determined with a microcalorimeter clearly differed from that of pure SDS or AE. The AE effect on SDS-induced BSA denaturation is thus due to the adsorption of AE on the alkyl chain of SDS electrostatically bound to BSA. It introduces the correlation to these adsorption phenomena, and changes of the influence on the skin.

**Key words:** surfactant, surface tension, contact angle, adsorption, sodium dodecyl sulfate.