Metrohm

Ti Application Note No.   T- 46

Title:	Soap content of soap noodles

Summary:	Determination of the soap content of soap noodles by potentiometric titration with TEGO®trant A100 using the Ionic Surfactant Electrode.

Sample:	Soap noodles

Sample Preparation:	Weigh exactly ca. 2.5 g sample (precision 0.1 mg) into a 1000 mL volumetric flask, then add ca. 800 mL methanol and some drops of phenolphthaleine colour indicator. Neutralise by adding NaOH until the solution turns pink. Remove the magnetic stirring bar, fill the flask to the mark with methanol and mix the contents.

Instruments and Accessories:	702, 716, 736 or 751 Titrino or 726 Titroprocessor, 727 Titration Stand, 722 Propeller Rod Stirrer, 6.0507.120 Ionic Surfactant Electrode

Analysis:	Pipette 5.00 mL of the prepared sample solution into a beaker, add ca. 95 mL dist. water and titrate with c(TEGO®trant A100) = 0.004 mol/L.

Calculation:	RS1: meq soap / 100 g = EP1 * C01 * C02 / C00
	RS2: % soap = RS1 * C03
	EP1 = titrant consumption in mL
	C00 = ca. 0.0125 (g of original sample contained in the sample volume used for the titration)
	C01 = 0.004 (concentration of the titrant in mol/L)
	C02 = 100 (conversion factor)
	C03 = 0.261 (M(soap) / 1000 in g/mol)

Remarks:	Results:
	AVG(3) = 304 +/- 3 meq soap / 100 g
	AVG(3) = 79.3 +/- 0.78 % soap