



DETERMINATION OF ASCORBIC ACID AND ITS SALTS IN FOOD ADDITIVES AND FODDER ADDITIVES

Lumex Method M 04-86-2016

INTRODUCTION

The method is used for the determination of the mass fraction of ascorbic acid and its salts in **food additives and fodder additives (feed additives)**.

The present method does not allow the determination of ascorbic acid in premixes.

For the determination of acetic, benzoic, butyric, citric, formic, fumaric, lactic, malic, oxalic, propionic, sorbic, and succinic acids in fodder additives and butyric acid in silage and haylage use the method M 04-74-2012 (Lumex Instruments set, order No 0300001897).

MEASUREMENT METHOD

The measurement method is based on capillary zone electrophoresis with direct UV detection at the wavelength of 254 nm.

MEASUREMENT RANGE

The measurement range for ascorbic acid is **5–100%**.

EQUIPMENT AND REAGENTS

The CAPEL capillary electrophoresis system is used in measurements. Data acquisition, collection, processing and output are performed using a personal computer running under WINDOWS® XP/7/8/10 operating system with installed dedicated software package ELFORUN.

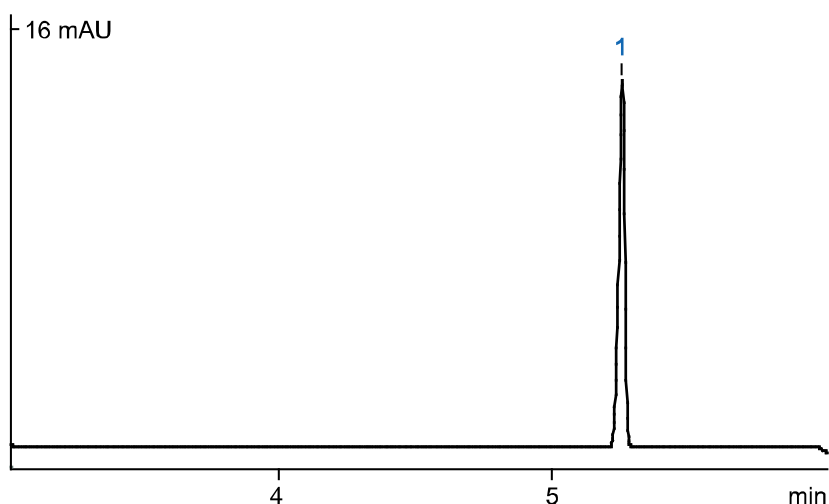
Lumex Instruments set, order **No 0300002717**.

EXAMPLES OF REAL ANALYSES

BGE: borate
Capillary: $L_{\text{eff}}/L_{\text{tot}}$ 40/50 cm, ID 50 μm
Injection: 150 mbar x sec
Voltage: + 20 kV
Temperature: + 20 °C
Detection: 254 nm

Sample: fodder additive

Measurement results:
1 – ascorbic acid (98.6%)



The contents on this paper are subject to change without notice.

To get more specific information, please contact the representative by sales@lumexinstruments.com