# MICROS

# Prednisone quantitation method by LCMS - AppNote

# Simple and easy prednisone analysis with LCMS detection

This method does not require any type of derivatization. Two Gradients are presented which will allow you to choose one depending on other components in the sample and your Method objectives. Retention can be achieved on a very short column (50 mm) as shown. Linear gradient conditions were used for analysis of this important Corticosteroid.



Prednisone 359.1853 m/z (M+H)+



## **Method Conditions**

Column: Cogent Bidentate C18<sup>™</sup>, 4µm, 100Å

Catalog No.: 40018-05P-2

Dimensions: 2.1 x 50 mm

#### **Mobile Phase:**

A: DI Water+ 0.1% Formic Acid

B: Methanol + 0.1% Formic Acid

### Gradient 1:

Time (minutes)	%B
0	10
5	100
7	100
8	10

### Gradient 2:

Time (minutes)	%В
0	10
10	100
11	100
12	10

 Post Time: 5 minutes

 Total Time: 12 minutes

 Injection vol.: 1μL

 Flow rate: 0.4mL / minute

 Detection: APCI - POS - Agilent 6210 MSD TOF Mass Spectrometer

 Sample Preparation: Prednisone 100ng / mL prepared in 100% B and diluted 1:10 before analysis

*Note:* The administration of Prednisone, a synthetic analog of Cortisone, suppresses production of Cortisol and monitoring the concentration of this Corticosteroid has significant therapeutic and clinical importance. Prednisone and Prednisolone were introduced by Schering Corporation in the mid-1960s under the brand names Meticorten® and Meticortelone®, respectively. These prescription medicines are now available from a number of manufacturers as generic drugs.



Attachment

Quantitation of Prednisone with LCMS pdf

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