Waters Application Library

Solvent Savings: Method Transfer from 3.9 to 3.0mm ID Column

HPLC Application Library

Compound: **Pentobarbital; Methohexital; Secobarbital; Talbutal; Benzonal; Secbutabarbital**
Type: Impure Standards
Matrix: Water
Secondary Matrix:

Conditions:

This Analysis Uses Isocratic Conditions

Column / Capillary: **Symmetry C18**
Column / Capillary Dimensions: 3.0 and 3.9 by 150 mm
Column / Capillary Part Number: WAT054200, WAT054325
Flow Rate / Voltage: 0.6, 1.0 ml/min (scaled for column ID)
Temperature: 30 degrees cent.
Injection Volume / Type: 5 and 20 ul
Injection Conditions: Scaled for column ID
Sample Concentration: .25 ug/ml ea
Sample Preparation: none
Run Time: variable

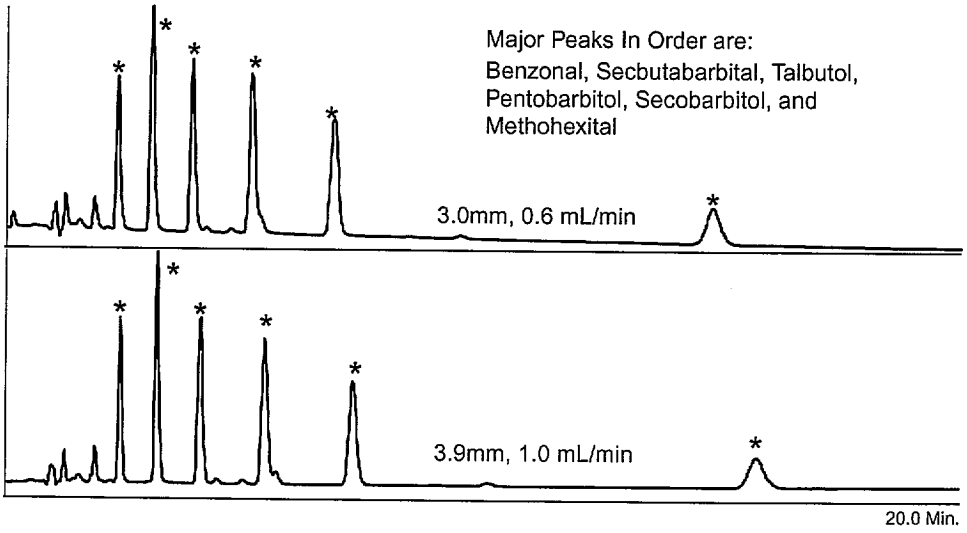
Mobile Phase / Electrolyte: water/ACN/0.2M potassium phosphate pH 7.0, 60/30/10
Gradient Conditions: none
Detection (Primary): UV @ 214
Detection (Secondary): PDA

Instrumentation /System:

2690, 996, Millennium 2010

Chromatogram / Electropherogram:

Isocratic Separation of Barbiturates: 3.9 Vs. 3.0mm Column ID



Objectives:

Determine transferability of isocratic barbiturate separation from 3.9 to 3.0mm ID column.

Details:

Solvent savings of 40% without a sacrifice in separation can be realized by decreasing column diameter.

Ordering Information:

Part Number	Description	Quantity