

## Analysis of Analgesics Using Atlantis T3

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Waters Corporation



This is an Application Brief and does not contain a detailed Experimental section.

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### Abstract

This application brief highlights the analysis of analgesics.

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## Introduction

Compounds analysed in this application brief :

1. Acetaminophen
2. Caffeine
3. 2-Acetamidophenol
4. Acetanilide
5. Acetylsalicylic acid
6. Phenacetin

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## Experimental

### Test Conditions

Column:	Atlantis T3, 4.6 x 150 mm, 5 µm
Part Number:	186003747
Mobile Phase A:	H <sub>2</sub> O
Mobile Phase B:	ACN
Mobile Phase C:	1% HCOOH in H <sub>2</sub> O, pH 2.3
Flow Rate:	1.0 mL/min
Injection Volume:	10 µL
Sample:	Acetaminophen (20 µg/mL), Caffeine (20

µg/mL), 2-Acetamidophenol (50 µg/mL),  
Acetanilide (20 µg/mL), Acetylsalicylic acid  
(50 µg/mL), Phenacetin (20 µg/mL) in H<sub>2</sub>  
O

Column Temperature: 30 °C

Sample Temperature: 15 °C

Detection: UV @ 260 nm

Sampling Rate: 5 point/sec

Filter Response: 0.2

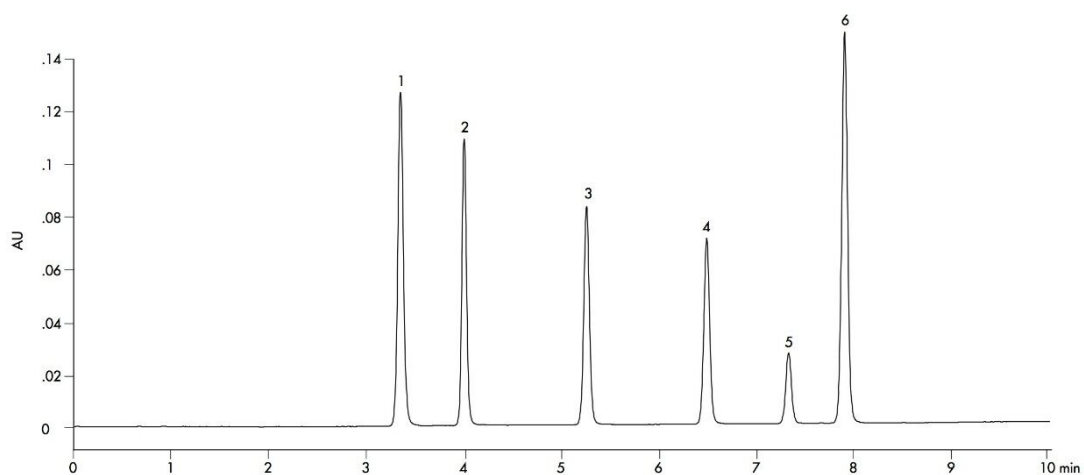
Instrument: Waters Alliance 2695 with 2996 PDA

## Gradient

Time (min)	Profile
	%A
0.00	75
10.00	30
11.00	75
15.00	75

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## Results and Discussion



1. Acetaminophen, 2. Caffeine, 3. 2-Acetamidophenol, 4. Acetanilide, 5. Acetylsalicylic acid, 6. Phenacetin

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## Featured Products

Alliance HPLC System <<https://www.waters.com/534293>>

2998 Photodiode Array (PDA) Detector <<https://www.waters.com/1001362>>

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