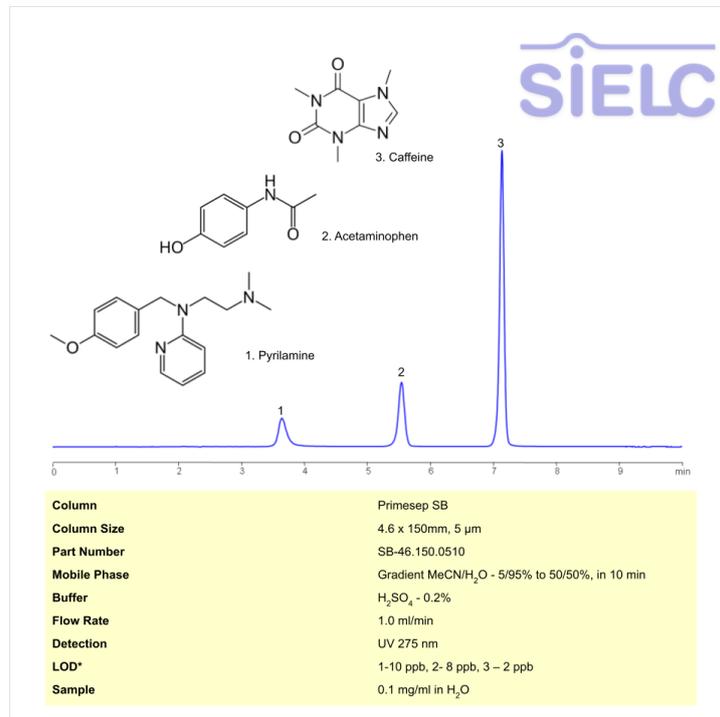


HPLC Method for Analysis of Pylramine, Acetaminophen, and Caffeine on Primesep SB Column



High Performance Liquid Chromatography (HPLC) Method for Analysis of Caffeine , Pylramine , Acetaminophen (Paracetamol)

Pylramine , also known as mepyramine , is a first-generation antihistamine with the molecular formula C₁₇H₂₃N₃O. It works through targeting the H₁ receptor and blocking effects of histamines. It can relieve allergy symptoms like sneezing, runny nose, and itchy, watery eyes. Due to it's ability to cross the blood-brain carrier, it might have a strong drowsiness side-effect after ingestion. When used topically, it is used to treat skin reactions to bug bites, stings, nettles rashes, and more.

Acetaminophen , also known as Paracetamol, is a medication with the molecular formula C₈H₉NO₂ . It is an over-the-counter pain killer that also reduces fever. Unlike Ibuprofen and naproxen, it is not an anti-inflammatory drug.

Caffeine is a natural stimulant and methylxanthine alkaloid. with the molecular formula C₆H₁₀N₄O₂ . Caffeine can be found in a variety of plants, including tea, coffea, cocoa, kola nuts, and guarana. Ingestion of it can increase alertness and cognitive function. It can also cause worsening anxiety, heart palpitations, and headaches

Caffeine , Pylramine , Acetaminophen (Paracetamol) can be retained and analyzed using the Primesep SB stationary phase column. The analysis utilizes a gradient method with a simple mobile phase consisting of water and acetonitrile (MeCN). Detection is performed using UV 310 nm and LCMSESISIM286.

You can find detailed UV spectra of Caffeine , Pyrilamine , Acetaminophen (Paracetamol) and information about its various lambda maxima by visiting the following links Acetaminophen , Caffeine , and Pyrilamine

Method Parameters

Column	Primesep SB, 4.6 x 150 mm, 5 µm, 100 Å, dual ended
Mobile Phase	Gradient MeCN – 5% to 50%, 10 min
Buffer	Sulfuric Acid
Flow Rate	1.0 mL/min
Detection	UV 275

Quelle: <https://sielc.com/hplc-method-for-analysis-of-pyrimilamine-acetaminophen-caffeine>