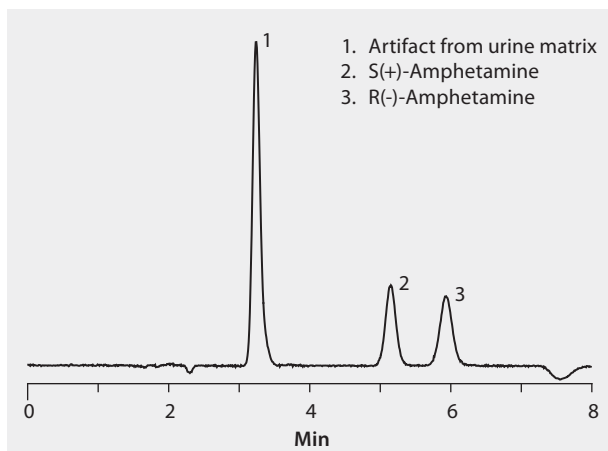


LC/MS Analysis of Amphetamine Enantiomers on Astec CHIROBIOTIC® V2 in Urine after Solid Phase Extraction (SPE) using Supel™-Select SCX

Shown here is the chiral separation of amphetamine enantiomers under MS-compatible conditions on Astec CHIROBIOTIC V2 after extraction from urine using Supel-Select SCX SPE 96-well plates. Fluka CHROMASOLV mobile phase solvents and additives were used to supply low background interference and low particulate contaminants for robust, trouble-free operation. Cerilliant CRMs provided reliable identification and quantification.

market focus	Forensics and Toxicology
sample preparation	SPE (Solid Phase Extraction)
sample/matrix	1 mL of synthetic urine spiked with 50 ng/mL of each enantiomer
SPE well plate	Supel-Select SCX, 96-well plate, 30 mg/well (575664-U)
condition	1 mL 1% formic acid in acetonitrile followed by 1 mL water
sample addition	1 mL spiked urine sample
washing	2 mL water followed by 1 mL 5 mM ammonium phosphate dibasic in 50% methanol followed by 1 mL 25% v/v methanol in water
elution	1 mL 10% w/v ammonium hydroxide in acetonitrile
eluate post-treatment	evaporate to dryness under nitrogen at 40 °C, reconstitute in 1 mL mobile phase
column	Astec CHIROBIOTIC V2, 15 cm x 4.6 mm I.D., 5 µm particles (15023AST)
mobile phase	[A] methanol; [B] water; [C] acetic acid; [D] ammonium hydroxide; (95:5:0.1:0.02, A:B:C:D)
flow rate	1 mL/min
pressure	1220 psi (84 bar)
column temp.	20 °C
detector	MS, ESI(+), SIR m/z 150.1
injection	2 µL
Application No.	G006432



Related Products

analytical column

Astec® CHIROBIOTIC® V2 Chiral HPLC Column ([Supelco 15023AST](#))

eluent

Ammonium phosphate dibasic ([Aldrich 379980](#))

mobile phase component

Acetic acid ([Fluka 49199](#))

Ammonium hydroxide solution ([Fluka 44273](#))

Methanol ([Fluka 14262](#))

Water ([Fluka 14263](#))

SPE tube or plate

Supel™-Select SCX SPE 96-well Plate ([Supelco 575664-U](#))

standard

(±)-Amphetamine solution ([Cerilliant A-007](#))

Surine™ Negative Urine Control ([Cerilliant S-020](#))