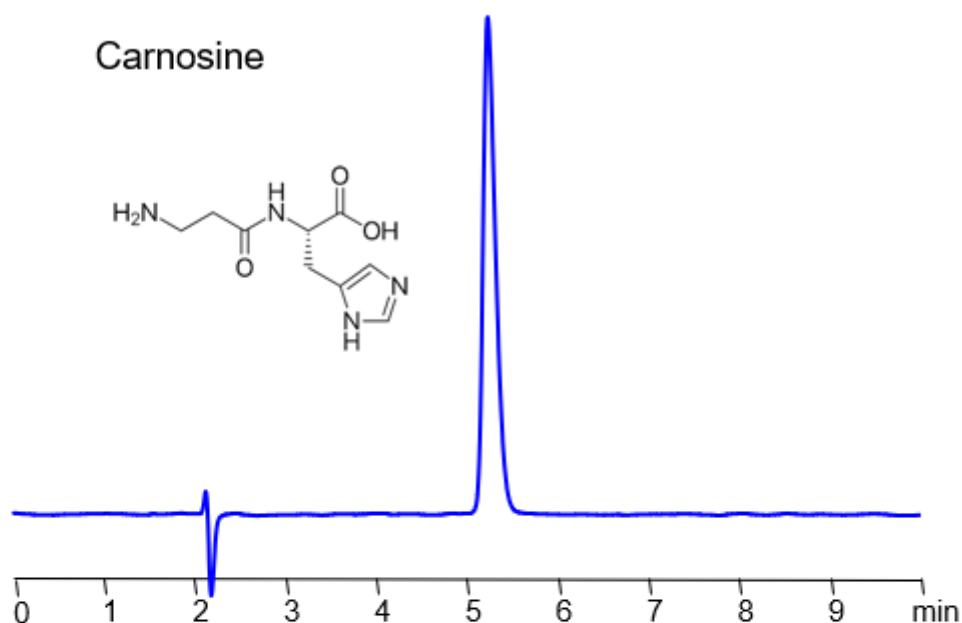


HPLC Method for Analysis of Carnosine (beta-alanyl-L-histidine) on Primesep 100 Column

<https://sielc.com/hplc-determination-of-carnosine-ps-100>

Chromatogram



Column:	Primesep 100
Column size:	4.6 × 150 mm, 5 µm
Column part number:	100-46.150.0510
Mobile phase:	MeCN/H ₂ O – 20/80%
Buffer:	TFA - 0.6%
Flow rate:	1.0 mL/min
Detection:	UV 215 nm

Description

HPLC Method for Analysis of Carnosine (beta-alanyl-L-histidine) on Primesep 100 Column by SIELC Technologies

Carnosine is a dipeptide molecule with the chemical formula C₉H₁₄N₄O₃. It is synthesized from beta-alanine and histidine. It is a naturally occurring pH buffer. It is found in muscles and brain tissue, but is produced in the liver. Some use it as a nutritional supplement, but it can be used in topical applications to reduce wrinkles.

Carnosine (beta-alanyl-L-histidine) can be retained and analyzed on a mixed-mode Primesep 100 column with a mobile phase consisting of water, Acetonitrile (MeCN), and Trifluoroacetic acid (TFA). This analytical method can be UV detected at 215 nm with high resolution and peak symmetry.

Method Parameters

Mobile Phase	MeCN/H ₂ O – 20/80%
Buffer	TFA – 0.6%
Flow Rate	1.0 ml/min
Detection	UV 215 nm
Peak Retention Time	5.21 min
Class of Compounds	Phenols
Analyzing Compounds	Carnosine (beta-alanyl-L-histidine)

HPLC Column Used

Primesep 100, 4.6 x 150 mm, 5 µm, 100 Å, dual ended

[Order this column at hplc-shop.de →](#)