

BioBasic SEC Columns

Superior separation of water soluble compounds

- Covers separation of analytes over a wide molecular weight range
- Long column life and high column efficiencies
- Simple mechanism of interaction based on molecular size and shape
- Ideal for sample clean-up
- Straightforward method development, simple mobile phases

BioBasic Size Exclusion Chromatography (SEC) columns provide high efficiency separations for a wide range of samples from 100 to 10,000,000 molecular weight. The columns come in a range of pore sizes (60, 120, 300 and 1000 Å) and employ proprietary-coated silica to ensure excellent recoveries, the highest efficiency and accurate molecular weight data. BioBasic SEC columns are ideal for high efficiency gel filtration separation of proteins and other biological water soluble molecules where the absence of secondary interactions, such as adsorption, is essential for accurate analysis.

BioBasic SEC columns contain a chromatographic silica which is mechanically rigid, does not swell or shrink with changes in solvent and shows higher efficiencies than polymer-based columns. The proprietary, highly

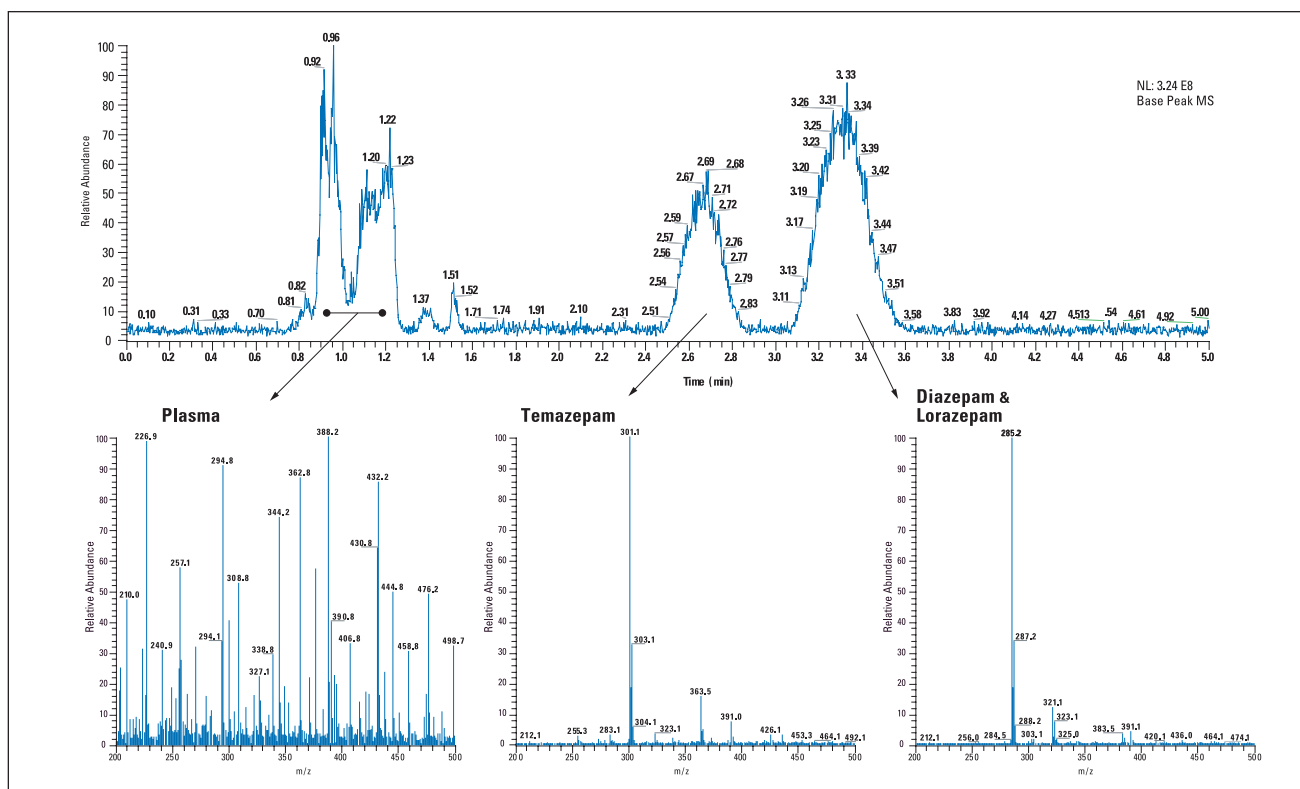
base-deactivated 5µm silica of BioBasic SEC columns is coated with a "hydro-link" polymer to ensure separation occurs only on the basis of molecular size.

BioBasic SEC columns have been shown to be stable over 6000 to 7000 column volumes using a 0.1M KH_2PO_4 mobile phase at pH 7 before any loss in efficiency is observed. The number of injections performed before column performance deteriorates can be significantly increased with a guard column to protect the analytical column from mobile phase contaminants, as well as sample impurities and particulates.

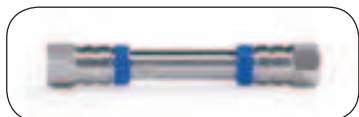
BioBasic SEC columns are often used as a sample clean-up step before reversed phase analysis. This method allows direct injection of samples such as blood, plasma or urine because

matrix interference will be removed before the separation occurs on a reversed phase column such as BioBasic 18 or 8 column.

Every BioBasic SEC silica lot is tested chromatographically with a range of proteins to confirm accuracy of retention volumes. Every column also receives an efficiency test to confirm compliance with efficiency specifications. Each column is shipped with a test certificate containing both the silica lot and column efficiency test data.

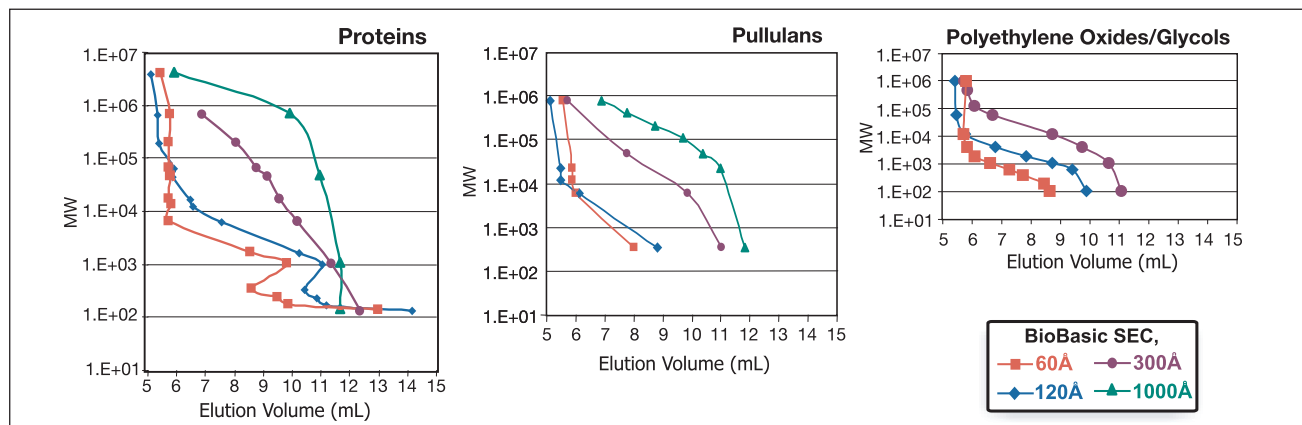


Fractionation of benzodiazepines in plasma using SEC

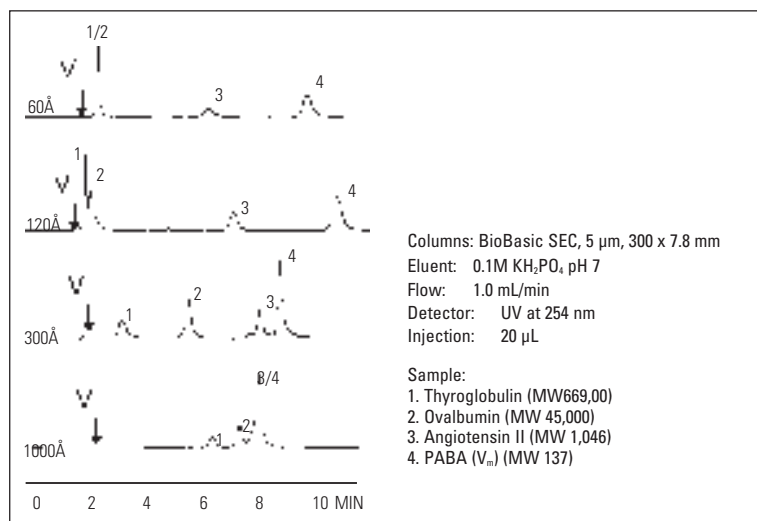


BioBasic SEC Columns				
Description	Pore Size	I.D.	Length	Cat. No.
BioBasic SEC 60				
Analytical	60Å	7.8mm	300mm	73305-307846
Analytical	60Å	7.8mm	150mm	73305-157846
Guard	60Å	7.8mm	30mm	73305-037821
BioBasic SEC 120				
Analytical	120Å	7.8mm	300mm	73405-307846
Analytical	120Å	7.8mm	150mm	73405-157846
Guard	120Å	7.8mm	30mm	73405-037821
BioBasic SEC 300				
Analytical	300Å	7.8mm	300mm	73505-307846
Analytical	300Å	7.8mm	150mm	73505-157846
Guard	300Å	7.8mm	30mm	73505-037821
BioBasic SEC 1000				
Analytical	1000Å	7.8mm	300mm	73605-307846
Analytical	1000Å	7.8mm	150mm	73605-157846
Guard	1000Å	7.8mm	30mm	73605-037821

For information on bulk quantities, please inquire.



Molecular weight calibration curves



Effect of pore size on SEC resolution