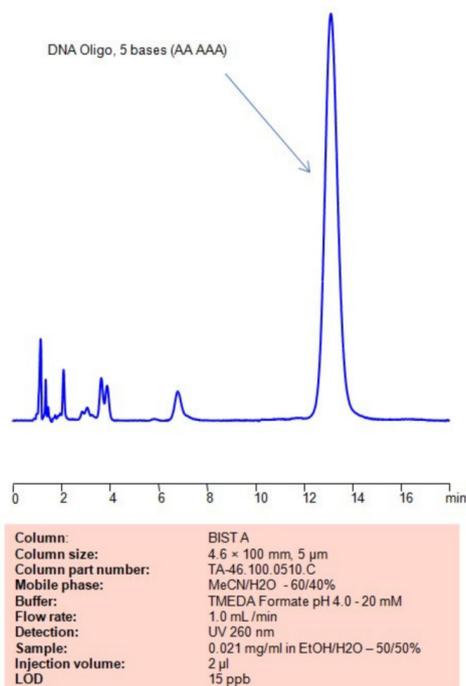


## HPLC Method for Analysis of Oligonucleotides dA 5 mer on BIST A Column



Separation type: Bridge Ion Separation Technology, or BIST™ by SIELC Technologies

Synthesis of DNA Oligonucleotide (AAAAA)

The application of a DNA oligo with a sequence “AAAAA” can vary based on the context:

Using SIELC’s newly introduced BIST™ method, this oligonucleotide can be retained on a negatively-charged, cation-exchange BIST™ A column. There are two keys to this retention method: 1) a multi-charged, positive buffer, such as TMEDA formate, which acts as a bridge, linking the negatively charged dye to the negatively-charged column surface and 2) a mobile phase consisting mostly of organic solvent (such as MeCN) to minimize the formation of a solvation layer around the charged analytes. Using this new and unique analysis method, oligonucleotide can be separated, retained, and detected at 260 nm.

### Method Parameters

<b>Column</b>	BIST A, 4.6 x 100 mm, 5 µm, 100 Å, surface coated
<b>Mobile Phase</b>	MeCN – 60%
<b>Buffer</b>	TMEDA Formate pH 4.0 – 20 mM
<b>Flow Rate</b>	1.0 mL/min
<b>Detection</b>	UV 260 nm
<b>Sample</b>	0.021 mg/ml in EtOH/H <sub>2</sub> O – 50/50%
<b>Injection Volume</b>	1 µl

Quelle: <https://sielc.com/hplc-method-for-analysis-of-oligo5a>