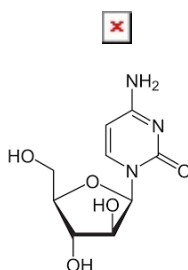


Cytarabine assay by HPLC- AppNote

A reliable assay for detection of a chemotherapeutic

Cytarabine belongs to the category of chemotherapy called antimetabolites. Antimetabolites are very similar to normal substances within the cell. When these substances are incorporated into the cellular metabolism, they are unable to divide. Antimetabolites are cell-cycle specific and target cells at very specific phases in the growth cycle.

This simple Isocratic method may be used to quantitate this important drug. The method maintains consistent and reliable results as the peak values were measured for week-long intervals. The %RSD for retention times for both standards and sample were less than 0.4%.



Peak:

Cytarabine

Method Conditions:

Column: Cogent RP C18™ 5µm 100Å

Catalog No.: 68518-25P

Dimensions: 4.6 x 250mm

Mobile Phase: 5:95 methanol / buffer

Buffer: 0.73g / L of monobasic sodium phosphate and 1.4g / L of dibasic sodium phosphate in DI water

Injection vol.: 10µL

Flow rate: 1.0mL / minute

Detection: UV @ 254nm

Sample Preparation: Cytarabine 0.1mg / mL in DI water

Note: Cytarabine is an anti-cancer ("antineoplastic" or "cytotoxic") chemotherapy drug. This medication is classified as an "antimetabolite." Cytarabine is used to treat different forms of leukemia, some of these include acute and chronic myelogenous leukemia (AML and CML), acute lymphocytic leukemia (ALL), acute promyelocytic leukemia (APL). and also, Hodgkin's Lymphoma.

This method was developed by and is presented courtesy of **ARL- Eutech Scientific Services, Inc.**