

HAT Activity Fluorometric Assay Kit

Product Information

Cat

Kit-0408

Common Name

HAT

Cat.No.

Kit-0408

Product Overview

Simple, rapid & convenient

The assay can detect HAT Activity as low as 6 mU in a variety of samples

Description

Histone Acetyltransferases (HATs) are enzymes that acetylate histone substrates resulting in important regulatory effects on chromatin structure and assembly, and gene transcription. Modifications of these proteins by HATs play an important role in the control of gene expression, and their dysregulation has been linked to cancer, neurodegeneration, and other diseases. HAT Activity Assay Kit utilizes Acetyl CoA and H3 histone peptide as substrates. In this assay, HAT enzyme catalyzes the transfer of acetyl groups from Acetyl-CoA to the histone peptide, thereby generating two products-acetylated peptide and CoA-SH. The CoA-SH reacts with the developer to generate a product that is detected fluorometrically at Ex/Em = 535/587 nm. The assay can detect HAT activity as low as 6 mU in a variety of samples.

Applications

Measurement of HAT activity in Nuclear Extracts

Measurement of HAT activity of purified enzyme preparations

Usage

For Research Use Only! Not For Use in Humans

Storage

HAT Activity Fluorometric Assay Kit

-80°C

Size

100 assays

Kit Components

- HAT Assay Buffer
- Acetyl CoA (Lyophilized)
- H3 Peptide (Lyophilized)
- Substrate Mix (Lyophilized)
- Developer
- PicoProbe
- CoA Standard (Lyophilized)
- Positive Control (HeLa Nuclear Extract)

Target Species

N/A

Detection method Fluorescence (Ex/Em = 535/587 nm)

Compatible Sample Types

- Nuclear extracts from cells and tissue
- Recombinant enzyme