



Firefly HTS Assay Kit (Lyophilized)

Product Information

Cat.No.

Kit-0471

Product Overview

Glow-type luciferase assays like Steady-Luc have lower luminescence signal compared to flash-type assays. The sensitivity and limit of detection of the assay will depend on luciferase expression levels in your experimental system as well as luminometer sensitivity. The Firefly HTS Assay Kit (Lyophilized) is comparable to our original HTS Assay, but with assay buffer provided in lyophilized format for economical shipping and convenient storage. Simply dissolve the lyophilized assay buffer in the supplied reconstitution buffer before use.

Size

120 assays, 1,000 assays, 10,000 assays

Description

Firefly luciferase is widely used as a reporter for studying gene regulation and function, and for pharmaceutical screening. It is a very sensitive genetic reporter due to the lack of endogenous activity in mammalian cells or tissues. However, the light production resulting from the reaction leads to formation of suicidal adenylyl-oxyluciferin at the enzyme surface. It results in very short half-life of the light emission with a flash-type kinetics. Because of this, flash-type luminescence must be detected immediately after initiating the reaction, which is not compatible with batch analysis of samples. HTS assay system is a proprietary mixture of substances that modify the enzymatic reaction to produce a long lasting signal (steady glow) by preventing the formation of adenylyl-oxyluciferin at the enzyme surface. It is a homogeneous high sensitivity firefly luciferase reporter gene assay kit with a half-life of about 3 hours for the quantification of firefly luciferase expression in mammalian cells, allowing batch processing in microplates.

Storage

Store Steady-Luc Firefly HTS Assay Kit at -70°C. Kit components are Stable for at least six months from date of receipt when stored as recommended. Avoid repeated freeze-thaw cycles. Store Steady-



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Luc Firefly HTS Assay Kit (Lyophilized) at -20°C. Kit components are Stable for at least six months from date of receipt when stored as recommended.

Kit Components

Steady Luc Firefly HTS Assay Kit (Lyophilized):Component (120 assays):D-Luciferin: 3 x 1 mg;Steady-Luc Assay Buffer (Lyophilized):B1, 1 bottle;Steady-Luc Reconstituion Buffer: C1, 12 mL;Component (1000 assays):D-Luciferin: 25 mg;Steady-Luc Assay Buffer (Lyophilized):1 bottle;Steady-Luc Reconstituion Buffer: 100 mL;Component (10,000 assays):D-Luciferin: 10 x 25 mg;Steady-Luc Assay Buffer (Lyophilized):10 bottles;Steady-Luc Reconstituion Buffer: 10 x 100 mL;Number of assays is based on 96-well plate format.

Features & Benefits

Simple: single step homogeneous assay.Glow kinetics: luminescence half life of about 3 hours.Convenient: lyophilized assay buffer for convenient shipping and storage.Economic: save up to 45% compared to other brands.