

fructokinase

Cat. No. EXWM-3069

Lot. No. (See product label)

Introduction

Description

Fructokinase, also known as D-fructokinase or D-fructose (D-mannose) kinase, is an enzyme (EC 2.7.1.4) of the liver, intestine, and kidney cortex. Fructokinase is in a family of enzymes called transferases, meaning that this enzyme transfers functional groups; it is also considered a phosphotransferase (or, frequently, a kinase) since it specifically transfers a phosphate group. Fructokinase specifically catalyzes the transfer of a phosphate group from ATP (the substrate) to fructose as the initial step in its utilization. The main role of fructokinase is in carbohydrate metabolism, more specifically, sucrose and fructose metabolism. The reaction equation is as follows: $\text{ATP} + \text{D-fructose} = \text{ADP} + \text{D-fructose 6-phosphate}$. This is notable because in most tissues this reaction is catalyzed by hexokinase (EC 2.7.1.1).

Synonyms

fructokinase (phosphorylating); D-fructokinase; D-fructose(D-mannose)kinase

Product Information

Form

Liquid or lyophilized powder

EC Number

EC 2.7.1.4

CAS No.

9030-51-7

Reaction

$\text{ATP} + \text{D-fructose} = \text{ADP} + \text{D-fructose 6-phosphate}$

Notes

This item requires custom production and lead time is between 5-9 weeks. We can custom produce according to your specifications.

Storage and Shipping Information

Storage

Store it at +4 °C for short term. For long term storage, store it at -20 °C~-80 °C.